

MEETING MINUTES

LIGNITE RESEARCH COUNCIL ADMINISTRATIVE MEETING

Wednesday, July 19, 2023 - 11:00 a.m. (CT)

Microsoft Teams

LRC VOTING MEMBERS PRESENT:

Jason Bohrer – Lignite Energy Council
Randy Christmann – North Dakota Public Service Commission
Representative Todd Porter – North Dakota House of Representatives
Gavin McCollam – Basin Electric Power Cooperative
Mike Heger – BNI Energy
Charlie Gorecki – Energy & Environmental Research Center (EERC)
Ed Murphy – North Dakota Geological Survey
Jay Skabo – Montana-Dakota Utilities Co.
Bryan Walther – North American Coal Company
Tom Oakland – North Dakota Commerce
Brenden Brinkman - Coyote Creek Mine
Jay Kost – The Falkirk Mining Company
Tim Hagerott – Minnkota Power Cooperative
Al Christianson – Nexus Line LLC
Joseph Heringer – Land Board
Rita Faut – North Dakota Farm Bureau
Brad Tollerson – Otter Tail Power Company

OTHERS PRESENT:

Reice Haase – North Dakota Industrial Commission
Brenna Jessen – North Dakota Industrial Commission
Mike Holmes – Lignite Research Council
Angie Hegre - Lignite Energy Council
Jonathan Fortner – Lignite Energy Council
Chuck Hyatt – ND Department of Environmental Quality (NDDEQ)

GUESTS:

Kevin Connors, EERC

I. CALL TO ORDER

Meeting called to order:

Lignite Research Council (LRC) Chairman, Jason Bohrer called the LRC meeting to order at 11:03 a.m. (CT) on July 19, 2023.

II. APPROVAL OF MINUTES

Approval of May 11, 2023, LRC Meeting Minutes:

Jason Bohrer asked for a motion to approve the minutes from the above-listed meeting. Al Christianson so moved; seconded by Rita Faut. Motion carried.

III. PROGRAM FINANCIAL SUMMARY

Program Financial Update:

Reice Haase shared a brief financial summary regarding the Lignite Research, Development and Marketing Program. With the full financial summary shared the prior month, Haase gave the summary of where we stand to date. After the last grant round the projects totaled \$11.4 million. At that meeting the LRC had \$9.3 million available but since that time we have had some project decommitments and repayments that totaled over \$3 million so that left the committee at the end of the biennium with \$366,000 in uncommitted cash left in the lignite research fund. Haase said it was a good story that we were able to commit so much of our dollars efficiently to great projects. That also means you have enough funds to approve the amendment requests today. Haase shared that now that we are in the new biennium you will also start to see new income starting to fill the lignite research bucket again.

IV. ELECTION OF THE EXECUTIVE COMMITTEE MEMBERS AND CHAIR

With the update of the Executive Order; a Chairman, Vice Chairman as well as a five-person Executive committee needed to be voted on. For continuity and convenient sake, Bohrer shared the discussion was to move forward with the current committee members.

Executive Committee Members consist of:

- Jason Bohrer – Lignite Energy Council
- Randy Christmann – North Dakota Public Service Commission
- Ed Murphy – North Dakota Geological Survey
- Jay Kost – The Falkirk Mining Company
- Gavin McCollam – Basin Electric Power Cooperative
- Brad Tollerson – Otter Tail Power Company
- John Bauer – Rainbow Energy Center

Approval of Chairman and Vice Chairman:

Jason Bohrer asked for a motion to approve the Chairman and Vice Chairman positions to continue with himself and Randy Christmann. Mike Heger so moved; seconded by Al Christianson. Motion carried.

Bohrer explained that the Executive committee exists in the statute, and it functions to move quickly if decisions are needed and in the absence of the full committee. For the sake of transparency and engagement, Bohrer shared his preference is to use the full committee rather than making use of the Executive committee.

Approval of Executive Committee:

Jason Bohrer asked for a motion to re-establish the Executive committee as previously established with the last Executive Order. Jay Skabo so moved; seconded by Rita Faut. Motion carried.

V. ADMIN TOPICS

A. Conflict of Interest

Bohrer reviewed the statute and explained that if your company was to benefit from one of these projects by directly participating, if you are listed on the project, have direct connection from your individual company or entity, it would be a conflict of interest.

Bohrer shared a lot of these technologies and projects have a significant benefit to the rest of the industry, many things can be applicable to your business model or facility, but it is the direct one level of removal from your companies' finances that is consistent with the state statute on conflict of interest for individual who serve on Boards and commissions.

Bohrer shared that if there is a personal conflict of interest that would also need to be disclosed.

B. Alternates

This topic was discussed at length at the last committee meeting. Bohrer said the LRC is the only council that has alternates. It is not the way other Boards and committees' function. Bohrer shared we are not going to reestablish a consistent list of alternates. With the updated Executive Order, we have updated the list to meet quorums. This will allow for consistency with other state operations as far as their boards and commissions.

C. Remote Access

Bohrer said we will make the two meetings a year in-person, not virtual. The dates of these two meetings are shared months in advance. Should there be a special grant round or special administrative meeting, we will offer remote access.

D. Post Recordings of LRC Meetings

The state is required to keep records and has an open access requirement. The LRC meetings, as the other boards and commissions, will be recorded on Microsoft Teams. This allows for our governance to be more transparent. Reice Haase agreed that these meetings are open to the public and they can attend in-person, or they will have access to the recordings on the NDIC website.

E. Tours of Projects

Bohrer discussed whether our committee would have an interest in touring projects and hosting meetings at those locations. This would allow for increased knowledge of projects and can be incorporated in projects of the future. Haase shared that some other advisory boards are currently doing this, and it is nice for the board members to see firsthand what they are voting on. Bohrer asked for feedback and ideas via email. Gorecki offered to host at EERC or with any commercial partners.

VI. Updates

Legislative Changes – Jason Bohrer and Reice Haase

Carbon Capture Communication and Strategy Development program

A need to make sure the public understands the benefit to ND for developing a carbon industry. The Legislature directed that each of the research councils (lignite, oil and gas, renewable) allocate \$100,000 each for the creation of a CO₂ entity of some sort that would spearhead some of the marketing that is happening within our industry, research partners, and tell the story. Haase shared the CO₂ utilization concept came out this session after discussions of the value of CO₂ to ND and changing its perceptions to see CO₂ as a commodity. The concept started with a need for outreach and education for CO₂ specifically. Haase stated the action item that is needed from the Lignite Research Council is to decide how to approach it. Jason Bohrer asked for a motion to create a small working group to provide input and direction to the NDIC. Attendance would be open to the members of the Lignite Research Council. Bohrer shared the working group would need to have a better assessment of where the public is on all issues CO₂ and provide some type of baseline public opinions and research on what the

challenges are associated with CO₂. Commissioner Christmann moved that the LRC Chairman appoint a working group; seconded by Charlie Gorecki. Motion carried.

Lignite Plant of the Future

An element of funding was allocated for the lignite plant of the future to understand the needs, the market, the challenges including regulatory, economic, access to capital, industry, interests, and other issues with building a new lignite power plant. The funding is to help find what we can provide members and Legislators to make policy changes to incentivize new lignite power plants.

The lignite plant of the future was added to our budget bill, it's not an appropriation for new dollars it's a commitment for existing dollars. The addition of the directed \$500,000 study on Technology options for Future Lignite-Fired Power generation is listed in the amendment request below LMFS-22-43.

VII. R&D Update / Amendments

Mike Holmes gave a Research & Development update along with the EPP Amendment information. He shared the breakdown of active projects consisting of 50% other emerging markets, 23% Rare Earth Element-Critical Minerals, 19% Carbon Management, and 8% miscellaneous. He shared a graph of the breakdown with the active projects NDIC is funding and the totals. The NDIC funding totals \$44.4 million of which 71% is Carbon Management, 13% Rare Earth Element-Critical Minerals, 11% Emerging Markets, and 5% miscellaneous. Total project funding is \$161.84 million.

With the report, Holmes shared several of the active and recently completed Lignite Research Program projects with some detail. Holmes shared current strategic studies as well as future studies and planned white papers. As always, Holmes encouraged the group to reach out for any further explanation or detail.

- He shared in detail each task of the EPP and how they change with the amendment. The tasks included
- 1-Project Management
 - 2-Research and Development
 - 3-Environmental Strategies
 - 4-Markets and Planning Strategies
 - 5-Legal Strategies
 - 6-Transmission Activities

(Details of the amendments below)

Amendment to LMFS-22-43
Enhance, Preserve and Protect, Research & Development, Environmental, Legal, Power Markets and Transmission Planning Services

Duration: January 1, 2023-December 31, 2025
Proposer: Lignite Energy Council
PM/PI: Angie Hegre PM & Michael Holmes PI

Purpose: The Enhance, Preserve and Protect project continues to build on the ongoing commitment and cooperation among government agencies, elected leadership and the lignite industry to insure the long-term viability of the ND lignite industry.

Objectives include:

- Build on previous work to preserve and protect the existing lignite fleet in ND.

- Employ and update Advanced Energy Technology (AET) Program.
- Identify opportunities to enhance the future of the state’s lignite resources.
- Monitor regulatory policy that could jeopardize the future of lignite.
- Be flexible and timely, working with industry and regulators to make the best use of lignite.

Opportunities already identified include:

- Rare Earth Elements and Critical minerals
- Developing carbon materials from lignite
- Managing CO₂ through Carbon Capture Utilization and Storage (CCUS)
- Evaluating next generation lignite conversion systems

Amendment Changes:

- Addition of the directed \$500,000 study on Technology Options for Future Lignite-Fired Power Generation.
- Transmission Authority base funding will be provided by the state with continued support from the EPP Project.
- The net effect of these two changes requires additional funding of \$204,418.

Conflicts of Interest: Lignite Energy Council Members (indirectly) and EERC.

Amendment to FY20-091-226

PCOR Initiative to Accelerate CCUS Deployment

Duration: 5 years
Proposer: Energy and Environmental Research Center (EERC)
PM/PI: Kevin Connors

Purpose: The EERC – through its Plains CO₂ Reduction (PCOR) Partnership – is working with partners in the lignite industry to secure \$500,000 initially from the Lignite Research Council with another \$1.5 million set aside for anticipated increased funding from the DOE. The goal of this project is to accelerate and facilitate the buildout of CCUS infrastructure in North Dakota and neighboring states. The PCOR Partnership includes the primary players in North Dakota’s lignite industry who have been working with the EERC over the last 16 years to validate the technical and economic viability of CCUS technology. This new project – which will be largely funded by the DOE – will benefit North Dakota by working towards monetizing recently passed Federal legislation that provides tax credits for energy companies to capture and geologically store CO₂. This phase of the project is planned for a five-year time frame. The current request is for the final increment of \$500,000 to bring the NDCI funding to \$2,000,000 of the previously approved \$2,000,000.

Background:

- The North Dakota Industrial Commission (NDIC) committed to supporting PCOR’s 5-year effort by matching U.S. Department of Energy (DOE) funding with cash cost share:
 - Up to \$2M through the Lignite Research Program (LRP).
 - Up to \$2M through the Oil and Gas Research Program (OGRP).
- The EERC applied for \$5M in additional funding from DOE in 2022. DOE recompeted the appropriated funds through a new Funding Opportunity Announcement (DE-FOA-0002799).

Likewise, 2023 appropriated funds will be recompeted per DOE's Notice of Intent (DE-FOA-0003013).

LRC Recommendation: Approve the final \$500,000 funding increment for the PCOR partnership with a cost-share level of at least 70% for the project.

Conflicts of Interest: EERC and most of the Lignite Industry as PCOR partners

VIII. AMENDMENT MOTIONS

Chairman Bohrer asked for a motion to authorize the Lignite Council to work with the Industrial Commission to add a separate sub task to the EPP project to incorporate the \$500,000 study for the Future Lignite-Fired Generation Plant. Al Christianson so moved; seconded by Todd Porter. Motion carried.

Chairman Bohrer asked for a motion to approve the final \$500,000 increment of funding for the PCOR Partnership with a cost share level of at least 70%. Mike Heger so moved; seconded by Jay Kost. Motion carried.

IX. 2022-2023 CALENDAR

Chairman Bohrer announced that the next NDIC meeting is scheduled for July 28, 2023. A reminder of the fall grant deadline of October 1, 2023, with the LRC meeting on November 9, 2023, and the Industrial Commission following on November 28, 2023.

X. OTHER BUSINESS

XI. ADJOURNMENT

There being no further business, Chairman Bohrer requested adjournment of the LRC meeting. Commissioner Christmann so moved; seconded by Jay Skabo.

The North Dakota Industrial Commission meeting, when these recommendations will be considered, will be held on July 28, 2023.

Angie Hegre, recording secretary