



Energy & Environmental Research Center (EERC)

Roughrider Carbon Storage Hub

(Roughrider)

DE-FE0032282

Initial Assistance and Validation Meeting
January 19, 2024

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Task 2 Lead

Agenda

- Project description
- Project partners and resources
- Community benefits plan (CBP) overview
- Community and labor engagement (CLE)
- Investing in job quality and a skilled workforce
- Diversity, equity, inclusion, and accessibility (DEIA)
- Justice40 Initiative (J40)
- Timeline/implementation road map
- Data and metrics
- Proposed framework to evaluate and track progress
- Potential challenges to successful outcome

Roughrider CarbonSAFE Phase II Project Description

- Assessing technical, economic, and social feasibility of permanent CO₂ storage in a Carbon Storage Assurance Facility Enterprise (CarbonSAFE) hub.
- Evaluating stacked storage configuration for CO₂ of ≥ 50 MMt within 30 years.
- CO₂ captured from gas-to-liquids (GTL) and gas-processing plants in Williston Basin, western North Dakota.
- A 2-year endeavor led by the EERC with support from ONEOK.
- Core sample gathering (stratigraphic test well).
- Sample and data analyses.
- Geologic modeling and simulation.
- Economic constraints.
- Social license and CBP development and implementation.

CBP Project Partners and Resources

- Key players: EERC and ONEOK
 - EERC: 20+ years of experience in carbon capture and storage (CCUS) through the Plains CO₂ Reduction (PCOR) Partnership and multiple CarbonSAFE initiatives.
 - ONEOK: dedicated community investment department to foster partnerships with stakeholders by investing in the communities where it operates.

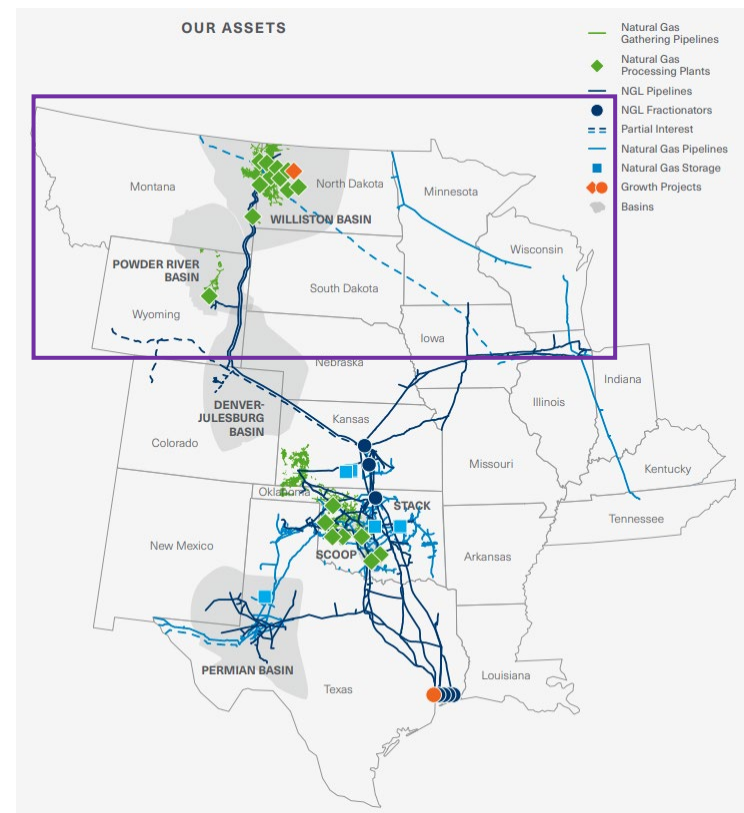
Project Funding	DOE	Cost Share	Project Total
Dollars (MM)	\$9.00	\$7.55	\$16.55
Contribution	55%	45%	100%



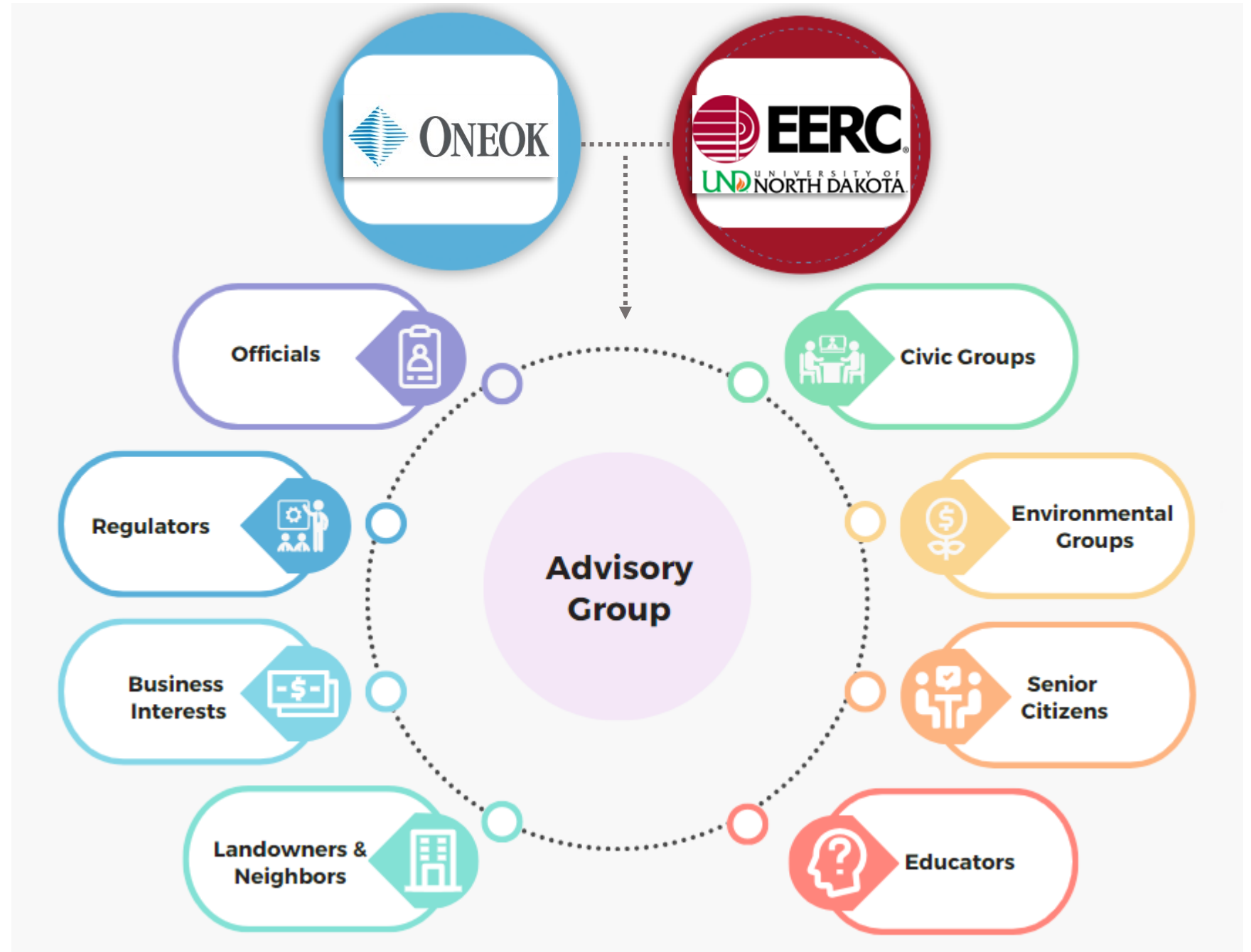
CBP Overview

- Roughrider CarbonSAFE Phase II CBP helps ensure broadly shared prosperity in the clean energy transition through a set of four core policy priorities:
 - Engaging communities and labor
 - Investing in America's workforce
 - Advancing DEIA
 - Implementing Justice 40

- The Roughrider project is situated in the **northern region** of ONEOK's operational assets and employee residences.



Community and Labor Engagement

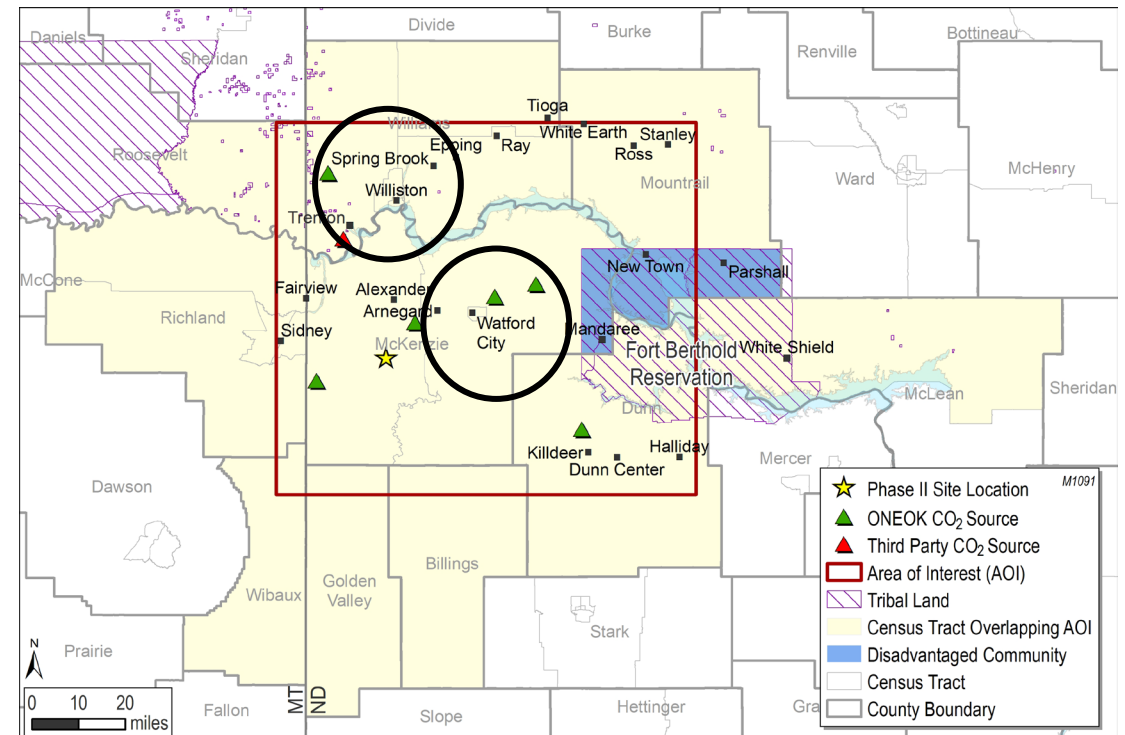


Community and Labor Engagement

Milestone 4 – Stakeholder Engagement Evaluation, 12/29/2023

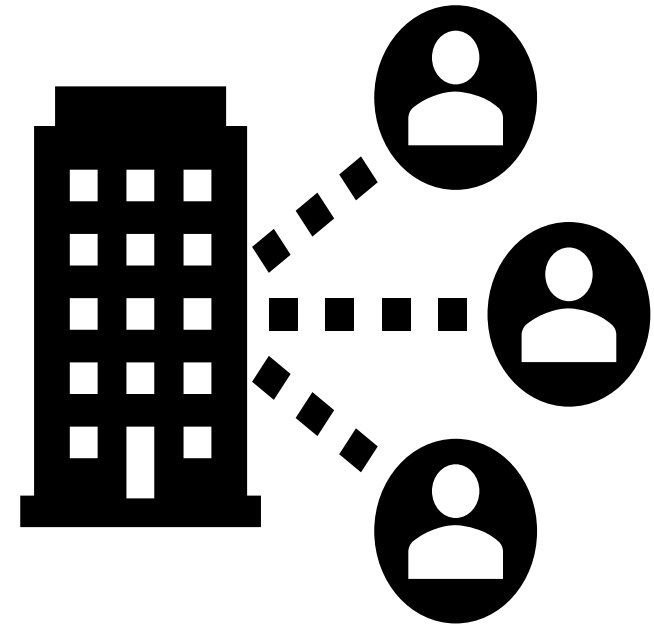
- Begin with established stakeholders, i.e., ONEOK Foundation stakeholders engaged prior to current project.
- Consider input from the dedicated advisory group.
- No current or planned workforce and community agreements.

Milestone 14 – Community Open House, 01/31/2025



Investing in Job Quality and a Skilled Workforce

- No additional workers outside of the core project team have been determined necessary to execute the CarbonSAFE Phase II project scope.
- Employees are paid above prevailing wage, and these jobs are in a similar or higher than industry/occupational average.



Investing in Job Quality and a Skilled Workforce

- The EERC participates in the U.S. Internal Revenue Service's Dependent Care Flexible Spending Account program that allows employees to pay for childcare services in pretax earnings.
- The EERC accommodates hybrid and remote workplaces.



DEIA

- The project partners actively promote and foster DEIA at all levels of the organization and operations.
- The project team commits to implementing a plan to reduce barriers and improve access to jobs for local workers or students underrepresented in science, technology, engineering, and math (STEM), including disadvantaged community residents, those with disabilities, and youth.
- The project team will engage or collaborate with existing diversity programs at ONEOK, the EERC, and/or with nearby organizations.

DEIA

- Disseminate results of research and development in minority-serving institutions, such as tribal colleges or other appropriate institutions serving underserved communities, when possible.
- Implement evidence-based, diversity-focused education programs (e.g., implicit bias training) for the EERC staff.
- Locating project activities within or to the benefit of disadvantaged communities, to the extent possible.



DEIA

- Identify and solicit minority business enterprises, minority-owned businesses, woman-owned businesses, and veteran-owned businesses, vendors, or subcontractors for bids on supplies, services, and equipment, where possible.
- Develop an effective partnership with a workforce diversity training partner to promote employment opportunities to underrepresented individuals and members of rural disadvantaged communities.

DEIA: SMART Milestones

Milestone 11 – 9/30/2024 (12 mos.) STEM-Inclusive Career Fair Participation

- ND Premier Workforce Development Program for Youth
- T⁴ (Tools, Trades, Torque, Tech)
 - Watford City, ND
 - 4/24 and 4/25/2024



T⁴ Tools Trades Torque Tech



Milestone 17 – 6/30/2025 (21 mos.) Workforce Diversity Training Collaboration

- Partner with area career centers, university alumni organizations, and professional organizations tailored to minorities to help increase the percent of underrepresented people in jobs related to support CCUS development.
 - Nueta Hidatsa Sahnish College (New Town, ND)
 - Williston State College (WSC) Foundation and Alumni Association
 - North Dakota Petroleum Council
 - Train ND

Justice40 Initiative

Milestone 5 – 12/29/2023

- In-depth energy and environmental justice assessment (EEJA) completed.
 - Identified communities potentially impacted by the project
 - Identified disadvantaged communities and existing burdens in the project area

Potential Project Benefits

- Decreased energy burden (energy costs for low-income households)
- Decreased environmental exposure and burdens
- Increased quality job creation, the clean energy job pipeline, and job training for individuals
- Increased energy resilience
- Increased energy democracy

Justice40 Initiative

Potential Negative Impacts or Harms

- Anticipated negative impacts during construction are increased traffic, noise disturbance, and intermittent dust clouds.
 - Potential overburdening of local emergency medical services (EMS) may occur during the drilling phase.
- The dynamic nature of socio-economic and environmental systems makes predicting long-term negative impacts inherently challenging, thus necessitating both a risk assessment and stakeholder input.
 - By seeking feedback, addressing concerns, and maintaining transparent communication, the project aims to make proactive adjustments that minimize potential long-term negative impacts.

Timeline/Implementation Road Map

12/30/2023

Stakeholder Engagement
Evaluation

1/31/2025

Share project information
and gather feedback at an
open house.

9/30/2024

Increase inclusion of groups
underserved in STEM.

6/30/2025

Develop a partnership with
a workforce diversity
training partner.



CBP Task 2.0 Activity

Roughrider CarbonSAFE Phase II
DE-FE0032282

Task 2.0 – Community Benefits Plan

2.1 – Community and Labor Engagement

2.2 – Investing in Job Quality and a Skilled Workforce

2.3 – Diversity, Equity, Inclusion, and Accessibility (DEIA)

2.4 – Justice40 Initiative

Task Duration
Subtask Duration

Budget Period 1																							
Year 1												Year 2											
2023			2024									2025											
Q1			Q2			Q3			Q4			Q5			Q6			Q7			Q9		
Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep

Data and Metrics

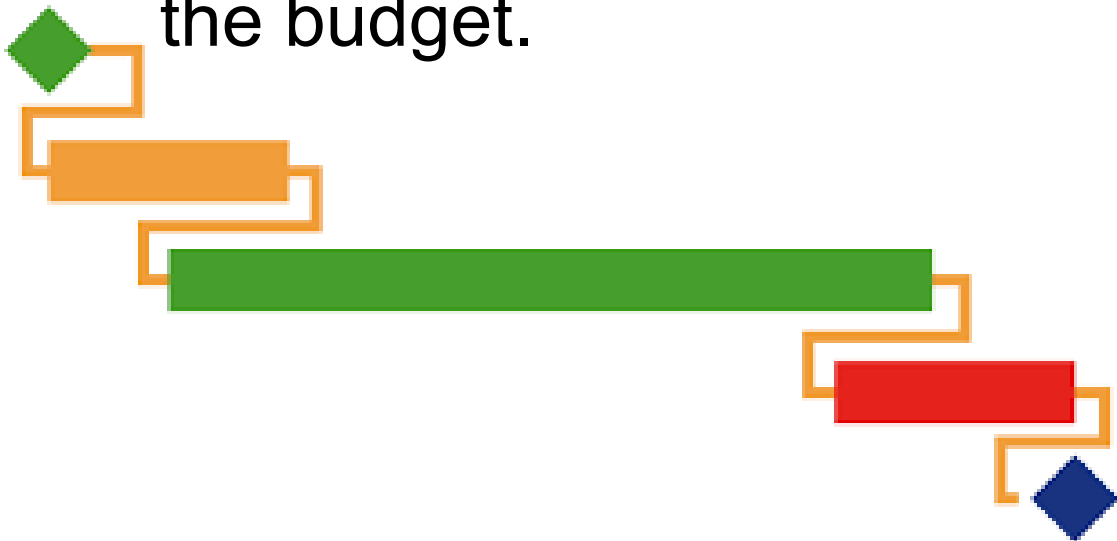
- Prior to a milestone event, the project team identifies pertinent data.
- An event plan is prepared including progress steps and action items leading up to the event, resulting in a DEIA scorecard upon completion.
- The task lead or delegate completes the Outreach Tracking Form:
 - Event dates and location
 - Event agenda
 - Audience size
 - Audience demographics
 - DEIA parameters



Proposed Framework to Evaluate and Track CBP Progress



- Use of project management software to create schedules, assign resources to tasks, track progress, and manage the budget.



- Use of software platform to create forms (e.g., Outreach Tracking Form), input data, generate reports, and share output.



- Mapping tool.

Potential Project Challenges to Successful CBP Outcome



Challenges

- Lack of understanding of how CO₂ storage works
- Communication challenges with complex projects
- Lack of interest from stakeholders
- Anti-pipeline activists
- Anti-fossil fuel activists



Cost and



Resources

- Inability to cover travel costs to engagement event location
- Inability to recruit and schedule advisory group members
- Workforce diversity training partner withdraws from the agreed partnership.
- STEM-inclusive career fair canceled and inability to schedule an alternate within project area.
- Withdrawal of primary project partner

A&V Meeting Summary

- Project Team presented the CBP via the foregoing slides.
- Reviewer questions were fielded by the Project Team.
- **Reviewer conclusion:**

The CBP is responsive to the Funding Opportunity Assessment (FOA) requirements and is adequate for an early-stage project.

- Preparations will begin for the Interim A&V Meeting.

A&V Recommended Actions

Create a list of goals and an associated timeline for the following:

1. Recruitment of members of underserved communities to the advisory group.
2. Input from the advisory group on potential administration of two-way engagement.
3. Preparation of a contact list for outreach and coordination activities with local tribal colleges.
4. Coordination with project partners and DEIA experts on potential learning opportunities.
5. Preparation of a list of sources for sharing bid announcements with diverse-owned businesses, if relevant.
6. Preparation of a list of sources for establishing workforce diversity training partnerships.



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A wide-angle photograph of a university campus at sunset. The sun is low on the left, casting a warm glow over the scene. In the foreground, there are trees with yellowing leaves. In the background, there are several large, multi-story brick buildings, likely university halls or administrative buildings. A parking lot with several cars is visible in front of the buildings.

THANK YOU

Critical Challenges. Practical Solutions.