

THE POWER OF ENGAGEMENT

The Power of Digging Deep: Frontier Observatory for Research in **Geothermal Energy (FORGE)**



Beaver County, Utah

Engagement Overview

Covering nearly five square miles, Utah FORGE is a cuttingedge research facility advancing the future of geothermal energy both regionally and nationwide. The partnership between the University of Utah and the U.S. Department of Energy (DOE) facilitated a unique approach to community engagement centered on education and innovation. Led by a dedicated team of community engagement specialists. outreach efforts ranged from political (e.g., maintaining a consistent presence at city and county meetings) to environmental (e.g., offering publicly accessible seismic monitoring) to the downright fun (e.g., a geothermal-themed song contest for high school students).

Project Overview



TECHNOLOGY

Enhanced Geothermal Research Facility





FIRST PROPOSED

CAPACITY

Research Site



2014



IN-SERVICE 2020



DEVELOPER

University of Utah Energy & Geoscience Unit and DOE

About Beaver County

COMMUNITY TYPE

Rural

POPULATION

7,072

EMPLOYMENT RATE

57.8%

MEDIAN HOUSEHOLD INCOME

\$85,603

DEMOGRAPHICS

90.8% white

EDUCATION

93% high school degree, 23% bachelor's degree or higher

HEALTH

19.9% uninsured

TRIBES

Paiute Indian Tribe of Utah

KEY INDUSTRIES

Education, construction, transportation, & warehousing

TIMELINE

DOE announces
FORGE program
and site bidding
process

2014

First outreach to Milford and Beaver County officials

2015

Utah FORGE formally applies to

2015

Broad public outreach and engagement begins

2018

DOE awards

DRGE to Milford

2020 Initial drilling begins

Engagement Tactics

Early outreach: Before formally applying to DOE, the University of Utah spoke with county commissioners and the city council to evaluate potential interest, assess the geologic surveys of the area, and map local landowners. In 2015 and 2016, before the formal DOE award and site characterization began, the university team led extensive outreach with landowners, schools, Tribes, regulatory agencies, and other stakeholders.

Trusted actors: The project's operation by the University of Utah provided widespread credibility with the local community. Residents valued an opportunity to bring cutting edge research to this rural area.

Educational opportunities: Leveraging the university's resources as an educational institution, Utah FORGE developed hands-on modules for elementary schoolers to learn about heat transfer, ran a booth at the MidVale harvest fest, created a science lesson plan for local teachers, and joined the University of Utah student welcome week. Utah FORGE also features in "A Climate of Hope," a climate change exhibit at the state natural history museum.

Youth engagement: Utah FORGE is leading the way in engaging young students on the science of geothermal energy. The team runs annual geothermal poster contests in Beaver County elementary schools, with prizes awarded to top submissions and posters displayed in the county's libraries. The engagement team also runs a statewide geothermal parody song contest for high schoolers; 2023's winners used the style of Taylor Swift's "You Belong With Me" to explain the history and advantages of geothermal energy.

Transparency: The Utah FORGE team recognized community concerns around the seismic and hydrological elements of the project and took steps to increase transparency and communication around potential environmental impacts. The project team installed computers in all three of Beaver County's public libraries that display seismic monitoring of the site area in real time and highlight information on the project's water usage, another key concern.

Local presence: Utah FORGE's community engagement staff are a fixture at city council meetings in Milford and with the Beaver County Commission, and provide advanced notice of their attendance to local government, landowners, and other stakeholders. At meetings they provide updates on the status of drilling operations, share information about the project, and host open dialogue to address any concerns.

Takeaways

Utah FORGE demonstrates the role that trusted local actors and institutions can play in community engagement, as well as the power of diverse outreach strategies that center economic, environmental, and educational opportunities. Community engagement can go far beyond city council attendance and advance notice of project development; county fairs, poster contests, and youth-focused programs can go a long way in building lasting community support. This project also underscores how strong engagement can lay the groundwork for future success. Utah FORGE helped pave the way for nearby projects like Fervo Energy's commercial-scale Cape Station geothermal project, which will bring 6,600 construction jobs, 160 full-time jobs, and \$437 million in earned wages to the community.