

Title: Graduate Student – Environmental Engineering

Department: Department of Energy

Agency: National Energy Technology Laboratory (NETL)

Level: Graduate Student

Position Information: Temporary, 1 year part-time

Duty Locations: Pittsburgh, Pennsylvania

Who May Be Considered: United States Citizens, LPRs, & Foreign Nationals with appropriate authorization and approval

SUMMARY:

Through the Oak Ridge Institute for Science and Education (ORISE) this posting seeks a graduate student researcher who currently is enrolled full-time at a degree-granting research institution, interested in participating as part of the geologic and environmental sciences focus area research team at NETL. NETL is a multi-disciplinary, scientific and technical-oriented national laboratory. NETL's Office of Research and Development (ORD) conducts research to evaluate environmental impacts and risk assessments associated with domestic energy resource development.

Unconventional gas resources are becoming a vital resource in the national energy portfolio. Processes such as hydraulic fracturing are expected to affect the native microbial community in these gas reservoirs. This native microbial community may drive biogeochemical processes that will affect gas production and produced fluid management. Thus, the long-term success of these gas reservoirs will depend on phylogenetically and functionally understanding the microbial community within these systems. The unconventional gas resource team is looking to recruit an individual who is able to perform metagenomic-based studies of Bakken Shale microbial communities.

Applicants for this position must demonstrate knowledge of and have experience with metagenomic sequencing and metagenomic data analysis. Access to equipment, such as an Illumina sequencer and metagenomic data computing capabilities would complement existing resources at the NETL-Pittsburgh facility.

Familiarity with Environmental Microbiology and Bioinformatics is preferred. For more information about research ongoing in NETL's Unconventional Resources Portfolio please visit: <https://edx.netl.doe.gov/ucr/>

KEY REQUIREMENTS:

- Applicants must be U.S. Citizens or approved Foreign Nationals
- Suitable for this position, as determined by background investigation
- Applicants must have a Graduate degree from an accredited institution in a field appropriate for the applicant's area of expertise, with the ability to travel to NETL-Pittsburgh to participate in on-site research

HOW TO APPLY:

Applicants should apply through the Oak Ridge Institute for Science and Education (ORISE) program. The ORISE Program provides opportunities for undergraduate students, recent

graduates, graduate students, postdoctoral researchers, and faculty researchers. NETL utilizes the ORISE program to support research and work within NETL's Office of Research & Development.

- Interested applicants should complete the online application at <http://www.ornl.gov/netl/>
- In the online application **list Djuna Gulliver as your requested mentor**. This will associate your application with this job posting.
- If you have additional questions please contact Nancy Andres, Nancy.Andres@NETL.DOE.GOV, who is the NETL ORISE program contact.