Engaging in hydrogen-based education and capacity-building for a Historically Black Church audience to facilitate DEIA in energy transition needs; ProjectQRSargasso, Inc.

Background:

- Executive Order 13985: "a work force from all segments of society" is needed in order to meet 2050 clean energy goals
- Justice40 seeks to ensure that "40 percent of the overall benefits of certain Federal investments flow to disadvantaged communities that are marginalized, underserved, and overburdened by pollution" (1).
- The majority of novel H2 tech developments remain in a consortium space between private-sector and academia that is publicly inaccessible.

Concept/Solution:

- Bridge historically underserved communities with the emerging hydrogen sector through technical-based capacity building
- Unite university scientists and BIPOCs of religious faiths around a commonly-shared interest of affordable, clean, decarbonized energy.
- Educate Community Partner cohort interested in clean energy options all about H2 to facilitate DEIA (Diversity, Equity, Inclusion, and Accessibility)

Scope:

- Develop University at Albany introductory hydrogen education course for Historically Black Church (Wilborn Church First Temple of Christ in God)
- Leverage education course as a precursory requirement for any subsequent workforce pipeline/safety training programs
- · Develop baseline MoS2 H2S electrolysis to facilitate industry-ready tech
- · Utilize electrolysis system as part of hands-on demonstration learning
- Perform project site analysis and risk management to develop areas of focus before H2 technology can be applied to pre-existing buildings.

Benefits:

- This project will decrease energy burden, increase energy parity in clean energy tech access, and fulfill energy resiliency for Disadvantaged Census Track #36083051500.
- If successful, this project will also serve as a linchpin of D.O.E. STEM bridging a community of faith. Communities of faith can at times intersect with conservative/Republican voting segments opposed to climate change reform.
- By rendering H2 space more accessible to a long-standing worship center, the proposal team can thwart this societal bifurcation of climate change and personal beliefs.

References:

The White House. (2023, April 21). Justice40 initiative | Environmental justice | The White House. https://www.whitehouse.gov/environmentaljustice/justice40/

