## Postdoctoral Research Fellow in Engineering Education at Iowa State University

Researchers within the School of Education at Iowa State University seek to hire a Postdoctoral Research Fellow to join a collaborative National Science Foundation-funded Revolutionizing Engineering Departments (RED) project on broadening the participation of underrepresented groups in engineering and computer science. This five-year RED project (currently in year 3) is aimed at developing novel pedagogical approaches for transforming the current Electrical and Computer Engineering (ECE) department into a more agile, less traditional organization. Cross-functional teams (X-teams) will be formed in order to reshape the core technical ECE curricula to: (a) promote design thinking, systems thinking, professional skills such as leadership, and inclusion; (b) contextualize course concepts; and (c) stimulate creative, socio-technical-minded development of ECE technologies for future smart systems. This Postdoctoral Research Fellowship will focus on the qualitative engineering identity research component as well as the educational evaluation component of this project. More detail on the project can be found at: <u>https://ride.ece.iastate.edu/</u>

## **Responsibilities:**

The successful candidate will be expected to assist the School of Education with coordination, including research design, data collection, analysis, and dissemination of findings associated with the RED project's qualitative engineering identity research component of this project. The candidate will closely work with the School of Education faculty to understand identity development within the ECE department. The candidate will also work closely with the School of Education's Research Institute for Studies in Education (RISE) evaluation component of the project. The candidate will be expected to collaborate with affiliated faculty and staff members, post-doctoral fellows, and graduate assistants to advance research project goals. Through working with this project, the Postdoctoral Research Fellow will help extract and characterize the strategies that are successful in developing and maintaining an engineering identity. As part of the Postdoctoral Fellowship experience, applicants will receive career development and mentoring support to develop their personal research and that aligned with the broad goals of our cross-disciplinary project. In addition, applicants will also receive support for moving expenses and conference travel.

Ideal candidates will:

- ✓ Have a Ph.D. in one of the following disciplines: higher education, engineering education, or a related field
- ✓ Have experience conducting rigorous, high quality qualitative research
- ✓ Possess expertise in STEM issues in higher education and/or evaluation
- ✓ Have experience with publishing in peer-reviewed journals
- ✓ Have the ability to work collaboratively and communicate effectively

Please submit a single PDF file to Dr. Sarah Rodriguez, srod@iastate.edu, including:

- 1. Cover letter
- 2. Detailed curriculum vita
- 3. Journal/conference paper sample
- 4. Names and email addresses of three references.

The postdoctoral position can begin Spring or Fall 2019. It is a temporary, fixed-term, one-year position, renewable up to two and a half years. Review of applications will begin November 1, 2018 and will continue until the position is filled. Applicants are encouraged to apply as soon as possible. We will be available at the Association for the Study of Higher Education (ASHE) Conference in November to meet with potential candidates.