

2023-24 EETI Research and Innovation Grants

The Engineering Education Transformations Institute (EETI) is committed to promoting a thriving ecosystem of engineering and computing education at UGA. In line with this mission, EETI supports a diversity of research, programming, and other innovations that are designed to improve the overall experience of teaching and learning engineering in our College and the School of Computing. While this solicitation uses the term “engineering education” and refers to the College of Engineering, we welcome and encourage faculty in the School of Computing to apply for projects related to computing education.

The *Research and Innovation Grants* described in this solicitation are guided by principles of (i) supported, collaborative project development and, (ii) contributions to shared EETI capacity that advance ongoing engineering education discussions in the Institute.

This year (Fall 2023 and Spring 2024), the *Research and Innovation Grants* will feature two tracks: (1) Innovation Grants and (2) Educational Research Initiation and Development Grants. Funding provided via both tracks must be spent prior to June 25, 2024.

Awardees are encouraged to attend the weekly EETIncubator meetings. These meetings provide awardees with a community in which to bring their ideas to fruition, and collaboratively learn about scholarship and research in engineering education.

Please submit applications for these awards based on the guidelines below to eeti@uga.edu by **September 15, 2023**. Please reach out to Dr. John Morelock (john.morelock@uga.edu) if you have any questions about the awards, which are further described on the following pages.

Track 1: Innovation (2x awards of up to \$1,500)

The **Innovation** track is intended to support the initiation and study of teaching and learning projects that improve the overall experience of teaching and learning engineering in CENGR. These awards can be used for salary, project related materials, and undergraduate student researchers. The innovation track is a good fit for you if you are:

1. Considering developing or adopting a new tool or approach to support student success and want to collect data that will help you do so effectively.
2. Trying something new to support student success and want to collect and analyze assessment data to determine its effectiveness.

Innovation projects are expected to collect some form of data to support the implementation of a creative tool or approach in support of student success, using an **action research** approach to analyze this data with an eye toward improving future engineering education practice. Recipients are encouraged to consider publishing their innovation and findings in an engineering education conference or journal, but are not required to do so. Recipients will be asked to submit a brief report in Fall 2024 summarizing the work that the grant helped support.

To apply for this track, please submit a two-page proposal outlining:

1. The problem, need, or opportunity the project will address.
2. The innovation being developed or adopted to support student success.
3. Anticipated impacts on one or more of the following areas: student learning and/or professional formation; CENGR programs; diversity, equity, and inclusion in the CENGR; or faculty professional development.
4. What data will be collected to assess achievement the anticipated impacts and inform future work.
5. A plan of work for the Fall 2023 and/or Spring 2024 semesters.
6. A brief description of how the project will contribute to EETI's mission of developing shared capacity to achieve educational excellence across the College of Engineering.

Track 2: Educational Research Initiation and Development (1x award of up to \$4,000)

The **Educational Research Initiation and Development** track is intended to support the development of educational research projects to a point where they are suitable for attracting extramural funding. These awards can be used for salary, project related materials, and undergraduate student researchers. This track is a good fit for you if you are interested in applying for extramural funding to move an educational research project forward and would like to collect and/or analyze pilot data to create a stronger proposal. Recipients will also have access to EETI faculty who can help them strategize how to leverage their work to design a competitive extramural funding proposal.

Educational Research Initiation & Development projects are expected to focus on collecting and/or analyzing education-related data from human participants (e.g., faculty or students.) Projects may include the development of a tool or artifact as the object of study, but such projects should be ready to collect (and/or analyze) data in an educational setting during the duration of this award. Recipients are strongly encouraged to publish the results of their research in an engineering education conference or journal. Recipients will be asked to submit a brief report in Fall 2024 summarizing the work that the grant helped support.

To apply for this track, please submit a two-page proposal outlining:

1. The problem, need, or opportunity the project will address.
2. Anticipated impacts on one or more of the following areas: student learning and/or professional formation; CENGR programs; diversity, equity, and inclusion in engineering education; or faculty professional development.
3. Details of extramural funding programs that may be suitable for future phases of your work.
4. A plan of work for the Fall 2023 and/or Spring 2024 semesters, including a target date to apply to selected extramural funding programs.
5. A brief description of how the project will contribute to EETI's mission of developing shared capacity to achieve educational excellence across the College of Engineering.