



2023 Summer Research Experience for Teachers (RET) in Manufacturing Simulation and Automation

Program Overview:

Penn State Erie, the Behrend College is offering a six-week paid summer research program for STEM high school teachers and two-year college faculty in cutting-edge manufacturing simulation and automation research. Sample projects will involve Virtual Reality, 3D Printing, Robotics, Automation, and Product Design. The six-week program will start on June 20 and end by August 2nd, 2023 (Excluding 3rd and 4th of July.). During the summer, the participants will:

- Engage in a research project with faculty mentors and undergraduate research students;
- Attend research presentations, curriculum development workshops, and industry tours;
- Develop an instructional module to teach a topic related to their research;
- Receive a stipend of \$6500 for participation in the program. In addition, support for project supplies, lesson plan implementation, and conference travel will be available for participants.

During the following academic year, participants will receive support to implement the instructional modules in the classroom and will be invited to attend a one-day workshop to present results and share materials. Examples of lesson plans include a 2-hour hands-on activity on solar cells; a virtual reality manufacturing simulation; a hands-on 3D printing activity.

Application:

Application Website*	Deadline**	Notification	Program Dates
https://sites.psu.edu/manufacturingret/	February 28, 2023	April 1, 2023	June 20 – August 2*** (08:30am – 04:00pm)

*In addition to the application link, the program website includes examples of past projects and curriculum units.

**Full consideration given to all applications received by February 28, 2023, and any applications received after that date will be considered on a "slots available" basis, first come first served. If slots for 2023 are full, qualified applicants will be contacted to inquire if they would be interested to be alerted with 2024 summer slots open for application.

***Excluding 3rd and 4th of July for the holiday.

Covid-19 Statement:

Our plan is to host the program on campus. We are actively monitoring the public health crisis and may need to adjust hours, duration, and format accordingly.

Equal Opportunity Hiring Statement:

All qualified applicants will receive consideration for employment without regard to race, color, religion, sex, sexual orientation, gender, gender identity, national origin, disability or protected veteran status. Preference will be given to new participants in the NSF RET Site, but former applicants will also be considered.

Program Contact:

Dr. Charlotte de Vries, RET Site Director, cud142@psu.edu, (814) 898-6921

NSF RET SITE

IN MANUFACTURING SIMULATION AND AUTOMATION – PENN STATE BEHREND

