

NEWS

ENGINEERING RESEARCH
ADMINISTRATION



AUBURN
UNIVERSITY

Samuel Ginn
College of Engineering

May 22, 2024

Vol. 2 No. 9

Announcements

NSF PAPPG Updates Effective May 20

The National Science Foundation has updated its PAPPG, effective May 20. This includes changes to the biographical sketch, which is no longer limited to 3 pages and no longer includes the Synergistic Activities section.

For more information about the changes to the PAPPG, please visit this [summary page](#) or refer back to previous newsletter updates.

IRB Transition to Endeavor

The launch of Endeavor's IRB module is scheduled for August 1. **There is a May 29 deadline for protocols requiring full board review**, as the IRB will not accept submissions July 1-31. Please review [this document](#) for critical information regarding IRB operations over the next 3 months.

Graduate Student Spotlight

Graduate Research Fellowship Program Recipients

Engineering Research Administration congratulates three of our graduate students as they receive fellowships from the National Science Foundation's Graduate Research Fellowship Program (GRFP). We are very proud of them, and we are eager to witness their continued achievements in future research. Please read more about their research below.

**Katie Wolf**

Katie Wolf is a first year graduate student in Electrical Engineering. Her research examines the effect of light that is just beyond the visible spectrum and how it impacts a person's focus and ability to discriminate details. She seeks to improve the quality of visible lighting and its effects on human performance, thereby reducing medical malpractice incidents and workplace injuries. Her research not only stands to reshape the way we understand lighting but also holds the promise of influencing regulatory standards; advancing technology and research; and contributing to a safer, more efficient and human-centric industrial landscape for all.

**Dylan Bowen**

Dylan Bowen is a second year PhD student in Chemical Engineering advised by Dr. Panagiotis Mистриotis. After earning his undergraduate degree at Auburn in Bioprocess Engineering, Dylan is continuing his research with hopes of uncovering novel bioengineering techniques. His work focuses on understanding how and why cells respond to wide ranges of physical stimuli as they travel through the body. Dylan plans to study how cells receive and react to signals like pressure and fluid viscosity in order to expand our knowledge of certain disease pathologies directly affected by cell migration, like those of cancer and atherosclerosis.



Ryan Pollard

Ryan Pollard is a first year Mechanical Engineering PhD student in the Auburn University Biomechanical Engineering (AUBE) Laboratory. Ryan's research involves studying neural control of assistive devices for paralytic populations. Current wearable robotics are limited by the requirement that a user must move their limbs (at least partially) before exoskeleton intervention. To combat this, Ryan and his advisor, Dr. Michael Zabala, are interested in controlling a lower-limb exoskeleton directly from a patient's central nervous system by non-invasively recording the electrical activity of the brain via EEG sensors. This could allow paralytic and atrophic populations the ability to regain independence over their movement.

Funding Opportunities

Quantum Materials Engineering Using Electromagnetic Fields (QUAMELEON)

Defense Advanced Research Projects Agency

Abstract due June 3, 2024

Areas of interest: materials, electrical and computer, chemical, computer science and software

The DARPA Defense Sciences Office invites submissions of **abstracts** for an Advanced Research Concepts (ARC) Opportunity. This ARC Opportunity encourages ideas exploring the following question: **How can engineered light-matter coupling be used to control or enhance quantum materials by harnessing vacuum effects or few-photon external drives?** The objective of this ARC topic is to study condensed matter systems where the coherent interaction between light at the few-photon level, or the vacuum electromagnetic field, and matter results in new physics that can be exploited for QI devices such as quantum enhanced sensors, light sources or detectors, transducers, and quantum emulators.

Read more about this opportunity [here](#).

ACED: Accelerating Computing-Enabled Scientific Discovery

National Science Foundation

Due June 17, 2024

Areas of interest: electrical and computer, computer science and software, multidisciplinary

The ACED program aims to harness computing to accelerate scientific discovery and improve computing advancements. NSF seeks **Emerging Ideas Proposals** for the ACED program. This track supports speculative multidisciplinary projects exploring bold new research directions. These projects should obtain preliminary results, refine the overall research plan based on these results, and garner insight into the extended scope of these advances beyond the targeted use case or domain.

Read more about the solicitation [here](#).

[Manage](#) your preferences | [Opt Out](#) using TrueRemove™
Got this as a forward? [Sign up](#) to receive our future emails.
View this email [online](#).

1301 Shelby Center | Auburn , AL 36849 US

This email was sent to .
To continue receiving our emails, add us to your address book.

emma

[Subscribe](#) to our email list.