

2025-2026



# UNIVERSITY OF CENTRAL FLORIDA

## IEEE STUDENT BRANCH SPONSORSHIP BUCKET



## BACKGROUND

IEEE (Institute of Electrical and Electronics Engineers) UCF is a student branch division to the larger organization, IEEE, which consist of academic professionals and industry members. Our student chapters is one of the largest in the nation and boosts over 300 active members. Our club is professionally driven with various project and workshops that provide technically experience but most importantly a tight community of social like-minded student engineers.



## MISSION STATEMENT

*"IEEE UCF equips members with hands-on skills and a collaborative environment, fostering innovation and professional development for successful careers in diverse engineering fields."*

## WHY SPONSOR IEEE UCF?



As a Registered Student Organization, we offer a diverse array of events designed to impart technical skills, professional development, and personal growth to aspiring engineers and technology enthusiasts - including technical project-based workshops, skill trainings, professional development events, industry-level annual projects, social activities, and numerous other enriching opportunities.

## WHAT'S NEXT?

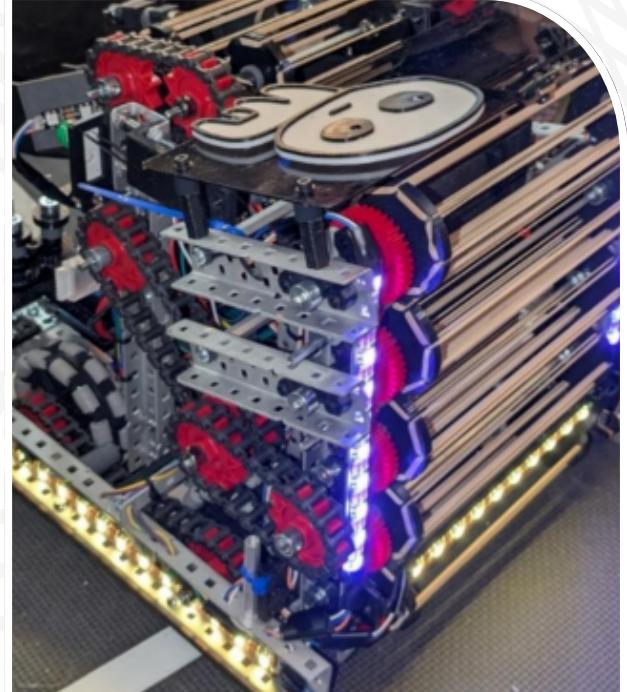
IEEE projects and workshops this coming school year will encompass:

- Analog Design
- Robotic Systems
- Digital Design
- Embedded Programming
- Software Development
- Signal Processing

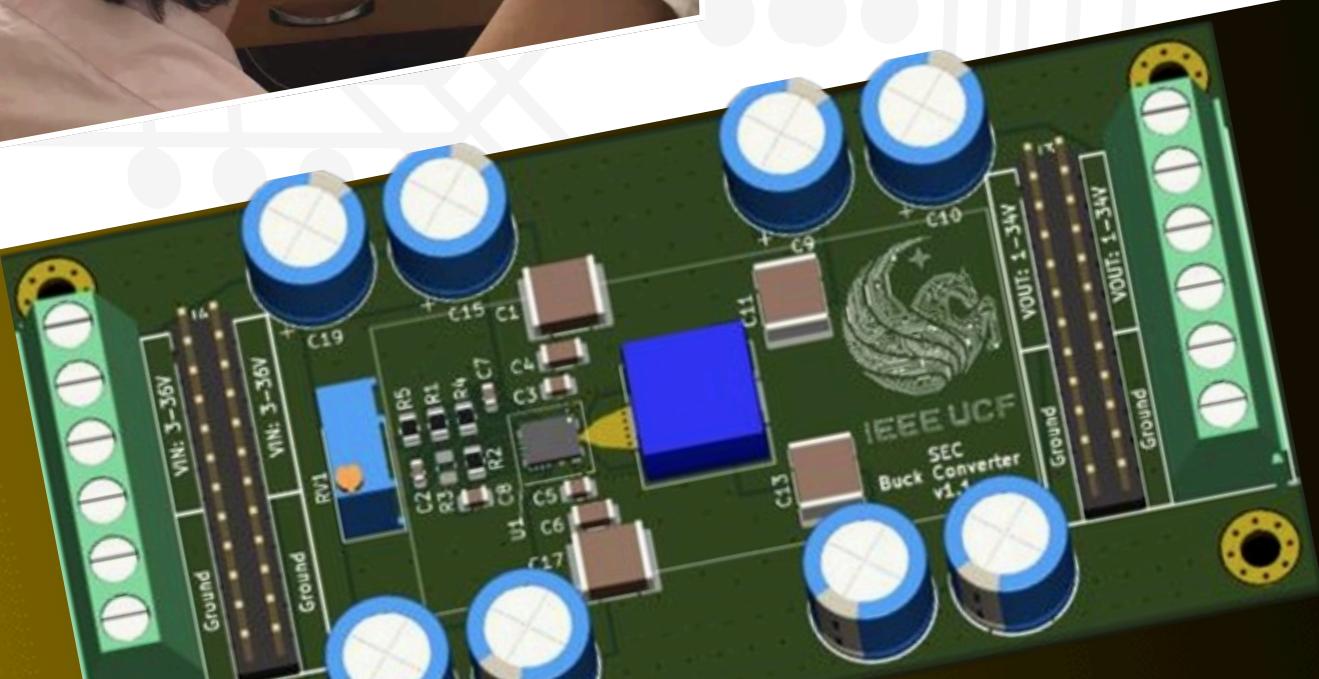
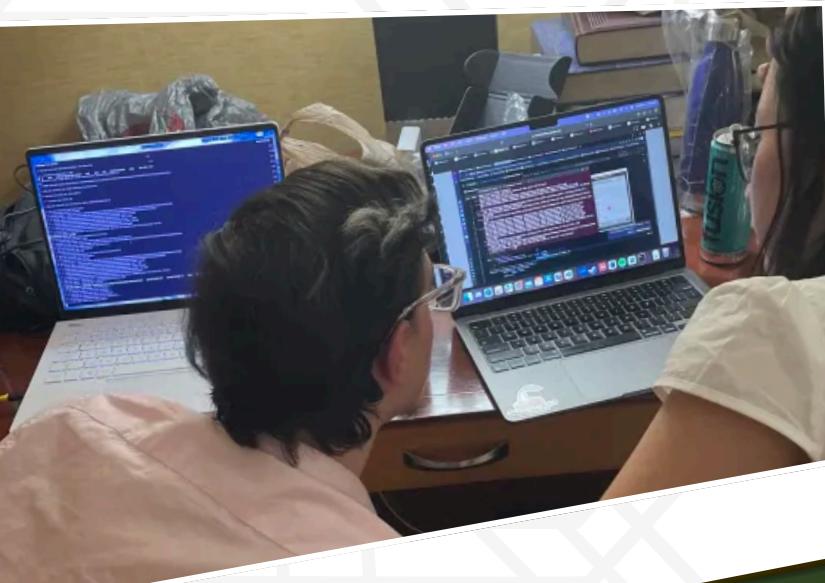
The coming year promises an exciting lineup of events and collaborations for IEEE UCF members. Members can look forward to participating in hardware competitions that develop critical engineering skills. Our upcoming workshops will equip them with essential technical skills spanning RISC-V computer architecture design to PCB development.

## SOUTHEASTCON HARDWARE COMPETITION

One of the chapter's project highlights is our involvement in the SoutheastCon hardware competitions. This past conference of 2025 the team secured first place in the Design Competition and second place in the Hardware Competition. Our award-winning robot exemplifies advanced engineering, featuring a sophisticated H-drive drivetrain for superior maneuverability and a passive rubber band tube intake system for efficient game piece collection. The robot's intelligence is powered by ROS2 Jazzy, utilizing OpenCV for real-time astral material detection and a search algorithm for optimal navigation.



Furthermore, our custom-designed Teensy 4.1 microcontroller breakout boards and a robust buck converter highlight our expertise in embedded systems and electrical design, ensuring reliable and precise operation. This project showcases our chapter's commitment to excellence in mechanical, software, and electrical engineering.



## INTERNAL PROJECT COMPETITION



IEEE UCF also host beginner oriented projects. Internal project competition is a multi-semester long project that provides a set curriculum of 8 - 9 workshops which focus in on key areas of engineering interest including embedded programming, electrical and mechanical design. Students who participate are able to choose two paths of “beginner projects” and “advanced projects”.

Participants are encouraged to work in groups as they build and design their own projects. At the end of the spring semester teams compete within their chosen category for awards and trophies.

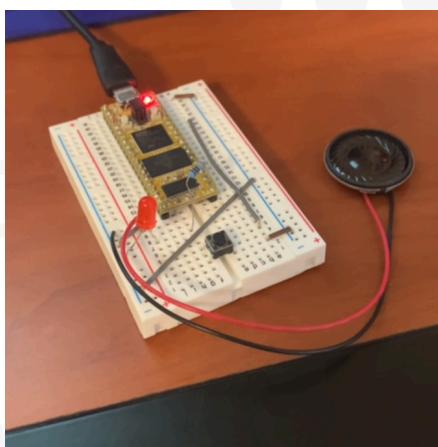
## MICROMOUSE

IEEE UCF also is involved in micro-mouse where we are developing a mini robotic device to solve mazes. The robot's goal is to navigate through a maze as quickly and efficiently as possible without any prior knowledge of the maze.

This project combines embedded systems, PCB design, pathfinding algorithms, autonomous navigation, control systems, and CAD modeling.



## GUITAR HERO



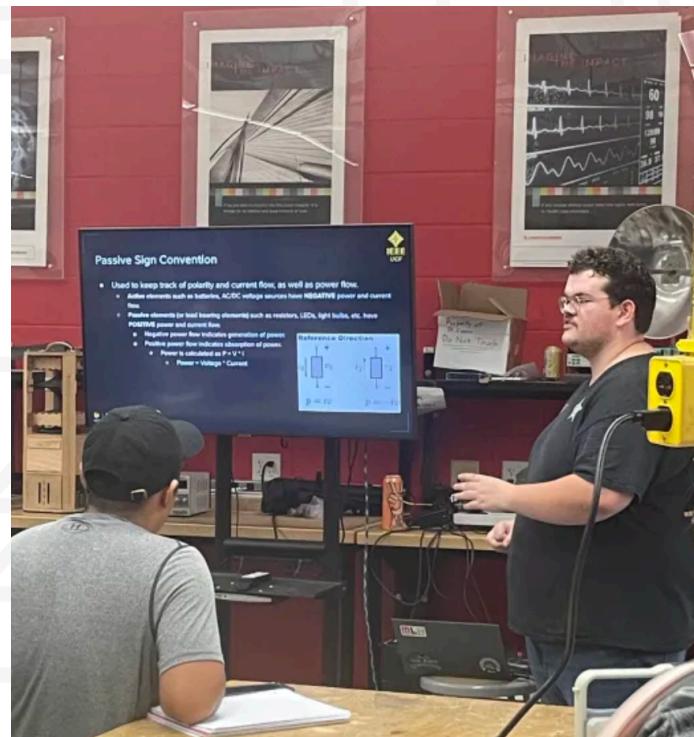
The IEEE UCF Guitar Hero project aims to develop a comprehensive suite of digital audio effects within a single package and design a fuzz pedal.

The project utilizes C++ programming for advanced audio signal processing or DSP, coupled with embedded circuit design for efficient, real-time operation. The goal is a robust system that accurately emulates various guitar effects.

## WORKSHOPS



Workshops are one of the primary ways an IEEE UCF member is able to learn and apply their skills from classes to the real world. Our workshops range from a variety of topics and areas within engineering. Some of the workshops include teaching members who typically won't be exposed to such concepts until later in their academic journey. These specialized workshops and technical skills we teach to our members include circuit analysis, Verilog, soldering, wiring and microcontroller programming.



## PROFESSIONAL DEVELOPMENT

IEEE UCF also focused on teaching professional development strategies and tactics to improve their marketability. Members are exposed to resume workshops, LinkedIn profile design techniques as well as mentoring programs and elevator pitch composition.

Members involved in professional development are able to pin themselves above others due to their confidence and presentation skills.



## SERVICE



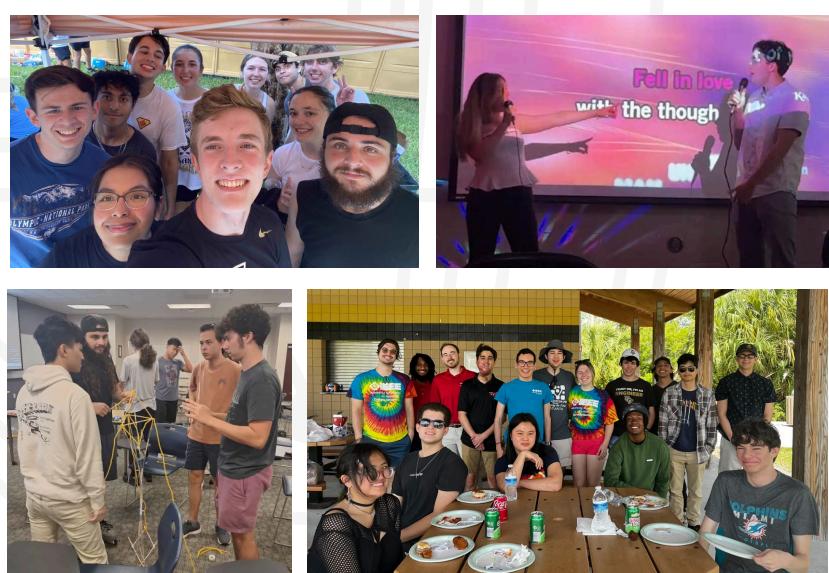
Service is another significant aspect to IEEE UCF community involvement. As students in engineering we pass our skills down and expose local elementary, middle and high school students to electrical and computer engineering concepts.

We also focus in on the community by donating and lending time to food pantries and other nonprofits.



## SOCIAL

Part of being an IEEE UCF member allows you to engage in social related events. Social events are hosted regularly and allow for the club to build a community around itself. Some social events have also involved industry collaborations and networking members to careers. Part of being in socials allows for our members to be comfortable expressing their self around others which improves relationship building.



# MEMBER PROFILE

## KAI SPRUNGER

### MEMBER STATEMENT:

I feel like I would not be the person I am today without being involved within IEEE. Being a part of this incredible community has connected me to amazing professional, technical, and social opportunities. I'm so grateful to have participated in the 2025 Southeastcon Software Competition and I feel like I have learned so much about the software development process from it. Additionally, I am glad to have served as the 2025 Professional Development Chair and have helped others obtain the same opportunities that have helped me so much. IEEE has definitely played a significant role in fostering my growth as a software engineer.



**HONORS COMPUTER SCIENCE | SOFTWARE CHAIR & EX. PROFESSIONAL DEVELOPMENT CHAIR | SWE INTERN AT NVIDIA | KNIGHT HACKS EVENT ORGANIZER**

## RUSSELL RIDLEY



### MEMBER STATEMENT:

I spent a long time debating whether to focus on software or hardware in computer engineering. Joining IEEE was the turning point. Surrounded by passionate, talented students, I not only learned a tremendous amount about hardware and electrical systems, but also made some of my closest friends. The collaborative projects, late-night build sessions, and constant support from the community solidified my decision to pursue a hardware-focused path. It's where everything finally clicked.

**COMPUTER ENGINEERING VLSI | SEC HARDWARE COMPETITION - ELECTRICAL TEAM | SPACECRAFT POWER ENGINEER INTERN AT THE JOHNS HOPKINS UNIVERSITY APPLIED PHYSICS LABORATORY | UNDERGRADUATE TEACHING/LEARNING ASSISTANT FOR LINEAR CIRCUITS I**

## MICHAEL CASTIGLIA

### MEMBER STATEMENT:

Coming from FIRST Robotics Competition in high school, I knew the major impact clubs can have. I joined IEEE because one of the current officers helped me select my classes for my freshmen year. Coming to the first GBM, I was hooked. The friends and community I have been able to make over my years in IEEE has been invaluable and what I believe to be a major part in getting to where I am today, both personally and professionally, not to mention the technical skills I learned along the way. Largely because of IEEE, I'm living my dream. It became my home away from home, where most of my friends came from.



**COMPUTER ENGINEERING VLSI | IEEE-HKN PRESIDENT | TREASURER & EX. SOFTWARE CHAIR | EX. POWER GENERATION INTERN AT NEXTERA ENERGY RESOURCES | 2X GRAPHICS FORMAL VERIFICATION ENGINEERING INTERN AT AMD GRAPHICS FORMAL VERIFICATION ENGINEER AT AMD**

# SPONSORSHIP TIERS

	<b>BRONZE (\$500)</b>	<b>SILVER (\$1000)</b>	<b>GOLD (\$1500)</b>
<b>BRONZE TIER</b>			
Sponsor gets logo on IEEE UCF website	✓	✓	✓
IEEE UCF helps advertise open positions in the sponsor's company	✓	✓	✓
IEEE UCF makes post on social media accounts thanking your sponsorship	✓	✓	✓
Access to IEEE UCF resume database	✓	✓	✓
<b>SILVER TIER</b>			
Dedicated sponsor article on the IEEE UCF monthly newsletter		✓	✓
Invitation to the annual industry networking event		✓	✓
Sponsors logo gets placed on SoutheastCon hardware robot		✓	✓
Guaranteed technical or social collaboration		✓	✓
<b>GOLD TIER</b>			
Guaranteed speaker spot at a general body meeting			✓
Ability to specify how funds are allocated			✓