

Florida West Coast Section  
Serving ALL Members in the  
Following Counties (Blue):  
Charlotte, Citrus, DeSoto,  
Hardee, Hernando,  
Hillsborough, Lee, Manatee,  
Pasco, Pinellas, Polk and  
Sarasota

Also, serving SOME Members only  
(depending on ZIP code) in the following  
Counties (Yellow):  
Collier, Hendry, Highlands, Levy and  
Marion



**IEEE**  
*Advancing Technology  
for Humanity*

## Florida West Coast Section (FWCS)

## The SunCoast SIGNAL Newsletter

The Institute of Electrical and Electronics Engineers, Inc.

This Newsletter is Now  
**DISTRIBUTED**

**ELECTRONICALLY**

There is **NO** Print Edition

Also, it can be downloaded  
from the FWCS website:

<https://r3.ieee.org/fwc/newletter-archive/>

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Next ExCom Meeting  
Tuesday, May 6, 2025  
Google Meet  
Register with vTools

<https://events.vtools.ieee.org/m/481268>

### PE Corner

#### Art Nordlinger, PE, Life Senior Member Renewal Recap

Those of you who read my column, or the FBPE Connections newsletter, likely had an easy time renewing your license if you followed the advice we have provided over the past months. For many of your peers, not-so-much. In fact, as of early April when I'm writing this, engineers are still renewing; nearly a month after the deadline! Until a license renews, it is marked delinquent, and it's a violation to practice engineering with a delinquent license.

There are about 48,000 engineers licensed in Florida. As of now, over fifteen percent have not renewed their licenses. Of those, over 1,000 attempted to renew but either didn't answer the attestations correctly or didn't pay. However the real issue was the number of engineers that waited until the last minute to renew. Nearly 20,000 engineers renewed in the final two weeks, and as I mentioned earlier, licensees are still renewing.

So many engineers waiting until the last minute to renew caused a series of problems. The FBPE staff was overwhelmed with the number of phone calls and emails during this period from those having difficulty renewing. These ranged from licensees not being able to log into their account,

*Continued on Page 2*

**IEEE FWCS ExCom Members****CHAIR:** Michael Mayor, michael.mayor@ieee.org**VICE CHAIR:** Andrew Seely, andrew.seely@ieee.org**SECRETARY:** Chung Seop Jeong, PhD, jeong@ieee.org**TREASURER:** Robert DeMelo, robert.demelo@ieee.org**SIGNAL EDITOR:** Michael Mayor, michael.mayor@ieee.org,**AWARDS & BYLAWS:** Richard Beatie, PE,  
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& Measurement, Chair:** Michael Mayor,  
michael.mayor@ieee.org**CS Computer Society, Chair:** Antra Malhotra,  
antra.malhotra@ieee.org

Vice Chair: Rajeev Arora, rajeevarora@ieee.org

**EMBS Engineering in Medicine & Biology Chapter:**  
Sylvia Thomas, sylvia@usf.edu**PES/IAS Power & Energy/Industry Applications Joint Chapter:**  
Chair, Kayla Allemang, kalleman@ieee.org**RAS Robotics & Automation Chapter:** Chair Sean Denny,  
venner20@ieee.org.**SP/COMM Signal Processing / Communications Joint Chapter**  
Chair, Michael Ramalho, PhD, mar42@cornell.edu**WIE Women in Engineering Affinity Group:**

Chair, Diana Aristizabal, dianaaristizabal@ieee.org

**LIFE MEMBER Affinity Group:** Chair Richard Beatie, PE,  
r.beatie@ieee.org**PACE Chair Dr. Jim Anderson.** jim.anderson@ieee.org**YOUNG PROFESSIONALS:** Chair TJ Ross, a.j.ross@ieee.org**CONSULTANTS NETWORK:** Hermann Amaya,  
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Dr. Chung Seop Jeong, Co-Advisor, jeong@usf.edu

**STUDENT ACTIVITIES****Student Activities Chair, Ronald Ambrosio**

ron.ambrosio@ieee.org

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ccapuozzo@usf.edu.

CS Anzhelika Kurnikova, akurnikova@usf.edu

EDS, Luis Quevedo, lquevedo@ieee.org

PES Nicole Ouellette, ouelletten@usf.edu

HKN - Roberto Montero, roberto.montero@ieee.org

**Florida Polytechnic University Chairs**Student Branch, Pedro Seixas,  
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PES Raymond Walker, rwalker4531@floridapoly.edu

RAS - Sahil Talwalkar, tsahil@outlook.com

HKN - Anthony Parrinello, aparrinello1386@floridapoly.edu

**WEB MASTER:** TJ Ross, a.j.ross@ieee.org**WEB PAGE:** <https://r3.ieee.org/fwc/>**PE Corner - Cont'd from Page 1**

Rules and Laws credit not being applied because an incorrect name or license number was provided, and confusion over the requirement to take a Florida Laws and Rules course from a Florida provider. This last item cascaded into overwhelming the system that Laws and Rules providers use to report continuing education during the last few days. More details about some of these issues can be found in the FBPE Connections newsletter.

It's not surprising that a certain percentage of licensees, after becoming aware that they actually have to report the details of their continuing education and take a Laws and Rules course from an approved provider, just decided not to renew their license. Some of these might be out-of-state engineers who don't use their Florida license anymore, or possibly retirees who aren't using their license. Some licensees who didn't renew might now apply to put their license into Inactive or Retired status. This is done by completing an application that is available on the FBPE website. A license that is not renewed during a two-year cycle becomes null and void.

For the next renewal cycle, encourage your colleagues to do their continuing education early and renew early. This will help everyone to have a smooth renewal experience

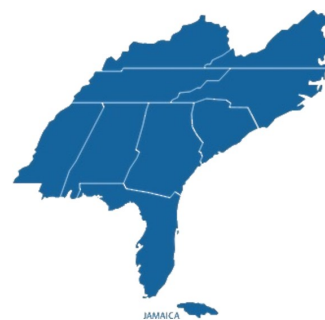
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# IEEE REGION 3

## SECTION SPOTLIGHT



January, 2025



## Florida West Coast Section

Chair: Michael Mayor

Vice Chair: Andrew Seely

Secretary: Dr. Chung Seop Jeong

Treasurer: Robert DeMelo

## Section Highlights

- 72 Years Old History
- 6 Professional Chapters
- 6 Student Chapters
- 7 Affinity Groups
- 1883 Members
- 17 Counties

## Section Theme

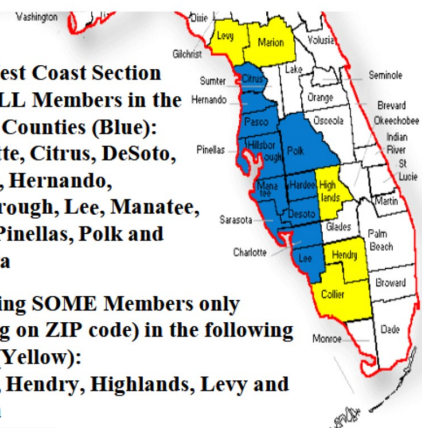
- Support IEEE Standard Theme
  - Advancing Technology for Humanity

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Following Counties (Blue):

Charlotte, Citrus, DeSoto,  
Hardee, Hernando,  
Hillsborough, Lee, Manatee,  
Pasco, Pinellas, Polk and  
Sarasota

Also, serving SOME Members only  
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Marion





## Section's History

- Formed on February 1st 1952 as the Tampa Section of the American Institute of Electrical Engineers (AIEE)
- There were 122 members when the section was founded
- The first Chair was Benjamin Nicholson Darlington. He was a Transmission Engineer for Peninsular Telephone, later became GTE and now Verizon.
- The first Secretary was John Ellis. He was the manager of the Tampa Office for General Electric Company.

## Sections Major Events

- Year End Gala and Banquet Awards
- Celebration of Florida West Coast Section

## Section's Bragging Rights

- Extensive Senior Member Elevation Program
- Section Outreach - STEM Community
  - STEM Champion - Sean Patrick Denny
  - IEEE Pre-University STEM Community
- In the past two years 139 meetings with 7,653 attendees

## Chapters and Affinity Groups

### Professional Chapters

- Computer Society
- Engineering in Medicine and Biology
- Robotics and Automation
- Aerospace and Electronic Systems / Instrumentation and Measurement
- Power and Energy / Industry Applications
- Signal Processing / Communications

### Student Chapters

- University Of South Florida
  - Computer
  - Power and Energy
  - Robotics and Automation
- Florida Polytechnic University
  - Computer
  - Power and Energy
  - Robotics and Automation

### Affinity Groups

- Blockchain
- Consultants Network
- Life Members
- STEM
- WIE
- Conference Coordinator
- Professional Activities Committee

## Interesting Facts about the Section

- Year End Gala and Banquet Awards
- Celebration of Florida West Coast Section



## Joint Chapter News – AESS/IMS

### AEROSPACE AND ELECTRONIC SYSTEMS SOCIETY (AESS)

Members of the IEEE Aerospace & Electronic Systems Society (AESS) of the IEEE are interested in the design, integration, test, and analysis of large, complex systems consisting of major subsystems that contain dissimilar electronic devices. Many of our members work on sensor systems (radar, sonar, optics, and navigation), communications systems, command and control centers, avionics, space systems, military systems, digital signal processing simulators, and software development. Some members work on robotics, energy, and transportation systems.

**AESS Web Page:** [ieee-aess.org](http://ieee-aess.org)

**IMS Web Page:** [ieee-ims.org/](http://ieee-ims.org/)

### INSTRUMENTATION & MEASUREMENT SOCIETY (IMS)

The IEEE Instrumentation & Measurement Society is dedicated to the development and use of electrical and electronic instruments and equipment to measure, monitor and/or record physical phenomena. The fields of interest include metrology, analog and digital electronic instruments, systems and standards for measuring and recording electrical quantities (in both frequency and time domains), instrumentation and transducers for measurement of non-electrical variables, calibration and uncertainty, instruments with automated control and analysis functions, safety instrumentation, and new technology applications.

**AESS/IMS Chapter Chair:**  
**Michael Mayor, MSE, PE**  
[Michael.mayor@ieee.org](mailto:Michael.mayor@ieee.org)



## *Systems Engineering Models*

**OU:** FWCS Joint Chapter AESS/IMS

**Date:** Tuesday, June 24, 2025

**Time:** 6:00 pm - 7:30 pm (EST/EDT)

**Speaker:** Michael Mayor, MSE, PE

**Location:** Virtual

**Cost:** No Cost

**CEH Certificate:** \$20.

**CEH Credits:** 1

**RSVP:** Online at: <https://events.vtools.ieee.org/m/481265>

**Questions:** Michael Mayor, [michael.mayo@ieee.org](mailto:michael.mayo@ieee.org)

**Abstract:** This presentation answers the question: What is an Engineering Model? I will review a brief history of models and address the Purpose and Utility of Engineering Models. Subsequently, I will address Engineering Block Diagrams, Modeling Systems and Mathematical Modeling. I will present an example using Geolocation Systems addressing the mathematical models applied for Time Difference of Arrival (TDOA) and Frequency Difference of Arrival (FDOA) parameters, as well as the Cross Ambiguity Function. I will present the effects of Sensitivity and Dynamic Range on Geolocation.

**Michael Mayor, MSE, PE.** is an Independent Consultant providing Systems Engineering Services to the Aerospace and Defense Industries in the areas of Secure Information Systems and Secure Communication Networks.

Formerly, he was Vice President / Chief Scientist, Advanced Technology Research, in the Aerospace / Communications Division of ITT Defense Electronics. He conducted Research of Advanced Systems Engineering and Technologies for Secure Communications, Signals Intelligence and Emitter Geolocation Systems for Terrestrial, Airborne and Spaceborne Systems and their Subsystems. These included: Radio Frequency Transceivers, Software Defined and Cognitive Radio Systems, Digital Receivers and Digital Signal Processing algorithms.

Previously, as Technical Director and Principal Engineer he conducted the Design, Development, Field Testing applying Instrumentation and Measurement Technology and, in some instances, Deployment Support, of Secure Communications, Signals Intelligence and Emitter Geolocation Systems.

He authored six patents in Spread Spectrum Communications and Digital Instrumentation. He received the ITT Defense & Electronics Engineered for Life Award, for his technical contributions in Communications, Geolocation and Microelectronics.

He is an IEEE Life Senior Member and holds a Master of Science in Engineering (MSE) from the School of Engineering and Applied Sciences at the University of Pennsylvania. He is a Licensed Professional Engineer (PE) in the State of VA, and a member of the National Society of Professional Engineers (NSPE).



## Chapter News – Computer Society

This [society](#) is dedicated to advancing the theory, practice, and application of computer and information processing technology. Through its [conferences](#), applications-related and research-oriented [journals](#), local and [student chapters](#), [distance learning](#) campus [technical committees](#) and [standards](#) working groups, the Society promotes an active exchange of information, ideas, and technological innovation among its members. In addition, the Society maintains close ties with the [US Computing Sciences Accreditation Board](#) and [Accreditation Board for Engineering and Technology](#), monitoring and evaluating curriculum accreditation guidelines.

**Computer Society Chapter Chair: Antra Malhotra**  
email: [antra.malhotra@ieee.org](mailto:antra.malhotra@ieee.org)

**Computer Society Chapter Vice Chair: Dr. Rajeev Arora**  
email: [rajeevarora@ieee.org](mailto:rajeevarora@ieee.org)

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### FWCS Computer Society Monthly Meeting Virtual

**Thursday, May 1st, 2025, 6:30 pm - 7:30 pm**  
<https://events.vtools.ieee.org/m/467480>



## **Joint Chapter Power & Energy / Industry Applications Societies**

The **IEEE Power & Energy Society** is a worldwide, non-profit association of more than 24,000 individuals engaged in electric power energy industry. PES members are involved in the planning, research, development, construction, installation, and operation of equipment and systems for the safe, reliable, and economic generation, transmission, distribution, measurement, and control of electric energy. The Power & Energy Society provides the world's largest forum for sharing the latest in technological developments in the electric power industry, for developing standards that guide the development and construction of equipment and systems, and for educating members of the industry and the general public. Members of the Power & Energy Society are leaders in this field, and they and their employers derive substantial benefits from involvement with this unique and outstanding association.

The scope of the **IEEE Industry Applications Society**, as a transnational organization, is the advancement of the theory and practice of electrical and electronic engineering in the development, design, manufacture and application of electrical systems, apparatus, devices, and controls to the processes and equipment of industry and commerce; the promotion of safe, reliable, and economic installations; industry leadership in energy conservation and environmental, health, and safety issues; the creation of voluntary engineering standards and recommended practices; and the professional development of its membership.

**IEEE Power & Energy Society:**  
<https://ieee-pes.org/>

**IEEE Industry Applications Society:**  
<https://ias.ieee.org/>

**Chair:** Kayla Allemang, [kallemang@ieee.org](mailto:kallemang@ieee.org)

**Vice-Chair:** Ryan Copley, [r.copley@ieee.org](mailto:r.copley@ieee.org)

**Treasurer:** Robert DeMelo, [robert.demelo@ieee.org](mailto:robert.demelo@ieee.org)

**Secretary:** Regan Sink, [rjsink@ieee.org](mailto:rjsink@ieee.org)

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**FWCS PES/IAS ExCom Meeting**  
**Thursday, May 29, 2025, 12:00 pm - 1:00 pm**  
**Virtual**  
<https://events.vtools.ieee.org/m/450343>



## Drone and AI Applications for Major Storm Events

**OU:** FWCS Joint Chapter: PES/IAS

**Date:** Friday, May 16, 2025

**Time:** 10:00AM – 3:00PM (EST/EDT)

**Speaker:** Todd Fountain – Duke Energy

Jackson Rollins – Duke Energy

Sacha Fontaine – SAS Institute

**Location:** Tampa Electric Eastern Service Area - 820 S 78th St, Tampa, FL 33619

**Cost:** Members: \$100; Non-Members: \$200; Students: \$10

**CEH Credits:** Four (4) CEHs

**RSVP:** Online at: <https://events.vtools.ieee.org/m/467360>

**Questions:** Kayla Allemang - [Kallemand@ieee.org](mailto:Kallemand@ieee.org), Regan Sink – [rjsink@ieee.org](mailto:rjsink@ieee.org)

This seminar explores the role of drones and artificial intelligence (AI) in enhancing storm preparedness, response, and recovery. The session provides insights into leveraging cutting-edge technology to improve resilience and operational efficiency during major storm events.

### **Key Topics:**

1. **Pre-Landfall Applications**
2. **Post-Landfall Applications**
3. **AI-Enhanced Utility Applications**
4. **Technological Overview**
5. **Case Studies and Best Practices**

### **Demonstrations**

### **AI Applications:**

For utilities utilizing drone and field imagery for line inspections, this presentation will detail the automation of asset and deficiency detection with computer vision strategies that improve accuracy and reduce development time. Deployment of these strategies can be performed in real-time while in flight or in batch-processing. The mapping of results onto a GIS-enabled map with matches to utility asset IDs is in its final stages. Demonstration videos will be shown.

**Todd Fountain** is the General Manager of Emergency Preparedness and Regional Incident Commander for Duke Energy Florida, with over 33 years of experience in the energy industry. In his tenure, Todd has played a critical role in emergency response, leading teams throughout numerous storm events, from Hurricane Andrew to the most recent Hurricane Milton.

**Jackson Rollins** is Director of Unmanned Aerial Systems within the Aviation Department at Duke Energy. Jackson leads a team of 40-50 pilots internal to Duke Energy and is responsible for governance of drone usage and vendor engagement across the enterprise. His team deploys to affected areas after a major storm and assists the T&D organization, Generation, and Corporate Communication with aerial assets.

**Sacha Fontaine, P.E.** is a leader in the power, utilities, and renewables sector with over two decades of industry-forming experience. As Head of Utility AI Strategy at the renowned SAS Institute, Sacha is passionate about developing and delivering innovative AI solutions that tackle the complex challenges faced by utilities. Sacha brings a wealth of diverse perspectives and experiences from his previous roles at industry giants like Duke Energy, GE, and Siemens.



## Chapter News – Robotics and Automation Society

The IEEE FWCS Robotics and Automation Society Chapter strives to Learn, Do, and Teach Robotics in the Tampa Bay Area.

We have participated in local Robotic Competitions like Robofest, BizBots, and FIRST.

Local meetings have focused on Cybersecurity, Quadcopter Drones, 3-D Printing, Touring High School and Makerspace to build Robots to name a few. Elementary, High School, and College Robotics Teams have come to present their ideas or results from past competitions.

Looking out to do virtual meetings in the future.

**Web Page:** <https://www.ieee-ras.org/>

**Chair:** Sean Denny, [venner20@ieee.org](mailto:venner20@ieee.org)

**Sean Denny is also a STEM Champion**



## Florida West Coast Section - Upcoming Events Summary - Year 2025

Date / Location/Time	Organization	Description Website	A*	Contact email
May 19-22	IEEE FWCS	Fog and Mobile Edge Computing	P	Muhammad Al-Abdullah
University of Tampa	Computer Society	<a href="https://emergingtechnet.org/FMEC2025/">https://emergingtechnet.org/FMEC2025/</a>		<a href="mailto:mal-abdullah@usf.edu">mal-abdullah@usf.edu</a>
	IEEE FWCS	Modern Computing Networking and Applications	P	
	Computer Society	<a href="https://mcna-conference.org/2025">https://mcna-conference.org/2025</a>		
	IEEE FWCS	Intelligent Cybersecurity Conference	P	
	Computer Society	<a href="https://icsc-conference.org/2025">https://icsc-conference.org/2025</a>		
May 26-30	IEEE Biometrics	IEEE 19th International Conference on	P	Shaun Canavan
Tampa / Clearwater	Council	Automatic Face and Gesture Recognition		<a href="mailto:scanavan@usf.edu">scanavan@usf.edu</a>
	Computer Society	<a href="https://ieee-biometrics.org/conferences/flagship/fg/">https://ieee-biometrics.org/conferences/flagship/fg/</a>		
<i>*Attendance: V: Virtual --- P: In Person --- V &amp; P: Virtual and In Person</i>				



*IEEE Florida West  
Coast Section,  
Tampa, Florida*

**IEEE FWCS  
P. O. Box 176  
Land O' Lakes, FL  
34639-9998**

**May 2025 - Calendar of Events** (For more information see "Inside the SunCoast Signal" → Page 1)

Sun	Mon	Tue	Wed	Thu	Fri	Sat
				1	2	3
				*FWCS CS Monthly Meeting →Page 6		
4	5	6	7	8	9	10
		*FWCS ExCom →Page 1				
11	12	13	14	15	16	17
	*Signal Inputs Due End of Day				*Drone and AI Applications →Page 8	
18	19	20	21	22	23	24
				*PES/IAS ExCom →Page 7		
25	26	27	28	29	30	31

**SunCoast Signal Advertising Rates**

Size	1 Month		6 Months		12 Months	
	Member	Non-Member	Member	Non-Member	Member	Non-Member
Business Cards	\$25	\$35	\$120	\$150	\$210	\$252
1/4 Page	\$40	\$52	\$190	\$380	\$335	\$402
1/2 Page	\$75	\$98	\$360	\$450	\$630	\$756
3/4 Page	\$110	\$143	\$530	\$663	\$925	\$1,110
Full Page	\$140	\$182	\$670	\$838	\$1,175	\$1,410
Insert / Sheet	\$200	\$260	\$800	\$1,000	\$2,000	\$2,400