

February 2021

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Upcoming Events

Maine Section Executive Committee (EXCOM) Meeting

Monday, April 4, 5:00 PM to 6:30 PM, [via Zoom](#)

2022 Maine Engineering Week Expo

Friday, April 22nd Engineers Week Banquet - [Register Online](#)

Saturday, April 23rd Engineers Week Expo - [Register Online](#)

This year's Keynote Speaker is Paige Brown, cofounder and CEO of WindBorne Systems, which provides high-resolution weather data

Explainable AI: Hope and Hypes in Healthcare

Thursday, April 7, 2022, at 12:00 - 1:00 p.m. EST (live via Zoom) – [register here](#)

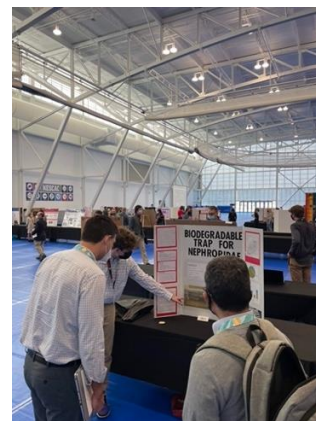
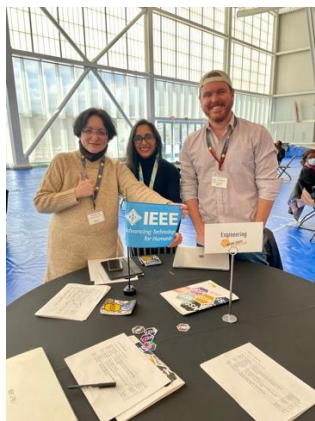
Deep Learning for Medical Image Analysis

Thursday, May 5, 2022, at 4:00 - 5:00 p.m. EST (live via Zoom)- [further information here](#)

Past Events

Maine State Science Fair

Held Saturday, March 26, 2022, at Colby College. Members of Maine IEEE volunteered as judges at the event. Pictured in center Maine IEEE members Julia Upton, Sri Lekha Srimat Kilambi, and Zac Canders



SECTION OFFICERS

EXECUTIVE COMMITTEE:

Chair:

Julia Upton

Vice-Chair:

Ashanthi Maxworth

Treasurer:

Shengen Chen

Secretary:

Sepideh Ghanavati

Webinar - UMaine Artificial Intelligence AI in Art

Held Thursday, March 3 via zoom. Pindar Van Arman, an AI Artist, covered how AI is entering the World of Art and what this means for the future. His session was complemented by Vikas Dhiman, Assistant Professor of Electrical and Computer Engineering at UMaine, by covering the topic “Imitating human-driving using Inverse Reinforcement Learning”. The session was moderated by Julia Upton, IEEE Maine Section Chair. *Recording coming soon...*

March Maine Section Executive Committee (EXCOM) Meeting

Monday, March 7, 5:00 PM to 6:30 PM. [A recording of the event is here](#)

Chairs Corner

I'm writing these words just a few hours after helping to kick off Husson University's first Pride Week by joining students for a Rainbow March on Husson campus in Bangor this Saturday, April 2. It made for a great end to a great week, which started with last Saturday's Maine Science Fair. Many thanks to those of you who answered our call and served as judges at the fair sponsored by the Section.

I hope those of you who attended the **AI in Art** March webinar sponsored by our Communication & Computer Societies Joint Chapter found the presentations and the discussion insightful and engaging – thank you for taking the time to participate!

It is my pleasure to serve as your Section Chair this year. I'd like to welcome aboard the *Beacon* co-editors: Ahmad P. Tafti and Zac Candors. Ahmad and Zac, your time and effort are deeply appreciated.

We're looking to fill the following vacancies: **Educational Activities Committee Chair** and **Young Professionals Affinity Group Chair**. If you're interested in these positions or have suggestions for professional or student member activities or services, please contact me directly at uptonj@husson.edu. We can't do this without you!



Special Recognition – Kenneth L. Carr

Maine inventor and microwave engineer Kenneth L. Carr has been selected to receive the 2022 Microwave Pioneer Award from the IEEE's Microwave Theory and Techniques Society (MTT-S). The IEEE is the world's largest technical professional organization and works to benefit society by advancing technology. The Microwave Pioneer Award recognizes Carr's meritorious achievements and outstanding technical contributions in the field of microwave theory and techniques, specifically for developing and commercializing medical devices that use microwaves to detect and treat medical conditions.

Carr, who grew up in Cambridge, Massachusetts, graduated from Tufts University in Medford, Massachusetts, and spent his early career developing ferrite devices for radar systems used by the military to spot enemy submarines, land fighter planes on aircraft carriers, and guide missiles. His accomplishments include inventing a device to help NASA monitor the re-entry of space capsules during Project Mercury and creating an electromagnetic switch that allowed a radar system on a U.S. spy plane to take high-resolution images of Russian missile sites in Cuba. These images spurred President John F. Kennedy's nationwide address on Oct. 22, 1962, announcing a naval blockade of Cuba and precipitating the Cuban Missile Crisis.

After helping launch a Massachusetts's microwave engineering company, Ferrotec, which he led for more than a decade, in 1970 Carr became the group vice-president and technical director for M/A-Com. Headquartered in Burlington, M/A-Com is a leading supplier of semiconductors, components, and subassemblies. For many years, Carr oversaw company operations in California, Arizona, Massachusetts, and England while developing microwave components for commercial, military, and space systems. Wanting to use his knowledge to help people, in 1985, Carr started his own company, Microwave Medical Systems, LLC, in Acton, Massachusetts (which later became Meridian Medical Systems).

After convincing the FDA in 1993 that microwaves could be safely used to heat blood and tissue, Carr developed a microwave blood warmer for the Army to treat injured soldiers on the battlefield; used microwaves for the early detection of breast cancer; invented a brain temperature monitoring system to help prevent cerebral palsy in newborns; and developed a radar system small enough to fit on the tip of a catheter. He is currently working on a medical device to destroy blood-borne viruses in the blood.

Carr has been awarded 54 U.S. patents and in 1992 received an honorary Doctor of Engineering Technology degree from the Wentworth Institute of Technology in Boston, where he served as a trustee for more than 40 years. In addition, Carr has taught at numerous universities around the world as an MTT-S Distinguished Microwave Lecturer; served for more than 35 years as a member of the faculty of the Eastern Virginia Medical School in Norfolk, Virginia; served for 10 years as a member of the board of overseers of the College of Engineering for Tufts University, Medford, Massachusetts; spent 8 years as a member of the Board of Bar Overseers for the Supreme Judicial Court of Massachusetts; and is currently the STEM ambassador for the state of Maine, lecturing to 5th and 6th grade students, while also serving as a trustee of the board for Maine's Dearborn Foundation,

awarding scholarships to high school students and helping them pursue careers in engineering. In conjunction with award-winning author Meadow Rue Merrill, Carr is currently completing a memoir, *The End of the Road: My Unlikely Path as a Microwave Pioneer*, which is currently being submitted to publishers.

The 2022 MTT-S Microwave Pioneer Award is scheduled to be conferred at the annual Society Awards Banquet during its six-day International Microwave Symposium in Denver, Colorado, on June 22, 2022. For interviews and more information, please contact Ken Carr using the above contact information.

Student Discounts



New and renewing IEEE students and graduate students can now save 50% on their membership dues. Students wishing to take advantage of the 50% discount can do so by using the promotion code FUTURE50 during the online check-out process of joining or renewing their IEEE membership. Students who recently renewed or joined at full price can reach out to the IEEE Contact Center at: contactcenter@ieee.org and request a credit on future membership dues.

Call for Articles and Events

The Beacon is always looking for content. In particular, we are looking for: Events: Upcoming live engineering, science, and professional development events in Maine. Please let us know about the event at least five weeks beforehand, although we will try to accommodate shorter notice when practical. With your submission, please provide: (1) what organization is presenting the event, (2) the date and time of the event, (3) how/where the event will be presented (e.g., interactive online video, physical in-person location, etc.), (4) whether advanced registration is required (and the deadline to register, if applicable), (5) whether there is any cost to attend, and (6) a URL and/or contact e-mail address where interested parties can obtain more information.

Articles: We are interested in original technical, professional development, and Maine-interest articles, as well as opinion pieces about issues relevant to the engineering community. Original graphics and photographs are encouraged. Length is flexible.

Newsworthy Stories: Do you know about something that might be of interest to IEEE Maine Section members that might have otherwise escaped their attention? If it is something that you've seen in media or a press release, please provide a link to the source so that we may provide proper attribution (and if the source has a paywall, a pdf of the story would be appreciated).

Submit content via e-mail to: IEEEMaineBeacon@gmail.com.

All submissions are subject to editorial review. Please refrain from submitting content that is intended to promote a commercial product or service.