

[View this email in your browser](#)



IEEE ULTRASONICS, FERROELECTRICS,
AND FREQUENCY CONTROL SOCIETY
———— Newsletter ————



UFFC-S Newsletter - January 2023



Facebook



Twitter



LinkedIn



YouTube

IN THIS ISSUE

[Good News](#)

[Technical Area Updates](#)

[Society Updates](#)

[Symposia](#)

[Education](#)

[Publications](#)

[Awards](#)

[Student Membership](#)

[Keep In Touch](#)

GOOD NEWS

IEEE UFFC-S Represented at IEEE HKN Conference



UFFC-S President Mark Schafer and UFFC-S Student Representative Yashwanth Nanda Kumar attended IEEE Eta Kappa Nu Student Leadership Conference on 29 October 2022. Mark and Yash hosted an IEEE UFFC-S booth at the conference and participated in a panel with other IEEE Societies.

Omer Oralkan Awarded Sensors Council Achievement Award



The IEEE OJ-UFFC Editor-in-Chief Omer Oralkan was awarded the 2022 IEEE Sensors Council Technical Achievement Award in Sensor Systems or Networks – Advanced Career “For his pioneering contributions to ultrasonic sensing, imaging, therapy, and applications” at the annual IEEE SENSORS Conference on 2 November 2022. Congratulations Omer on this achievement!

IEEE UFFC-S Booth at Focused Ultrasound Foundation Symposium



UFFC-S President hosted a UFFC-S booth at the 8th International Symposium on Focused Ultrasound. UFFC-S is always happy to spread awareness about our Society to those who are interested in learning more. For more information on the Focused Ultrasound Foundation, please click [here](#).

[Back to Top](#)

TECHNICAL AREA UPDATES

Ultrasonics News

Ultrasonics Awards Nominations Due: 1 March 2023

The Ultrasonics Awards Committee of the IEEE Ultrasonics, Ferroelectrics, and Frequency Control (UFFC) Society asks for your help in identifying and nominating individuals who have made remarkable contributions in the field of ultrasonics for the following awards:

- [IEEE Ultrasonics Early Career Investigator Award](#)
- [IEEE Carl Hellmuth Hertz Ultrasonics Award](#)
- [IEEE Rayleigh Award](#)

following items:

- A two-page nomination letter on how the nominee has impacted the field of ultrasonics and created new opportunities for academic inquiry and/or commercial success.
- A professional resume including a picture, a list of publications, a citation report, a list of patents, or other supporting documents.
- A minimum of two letters of recommendation in addition to the nominator's letter.

[Submit Nomination](#)

For the Early Career Award and Carl Hellmuth Hertz Award, the nominator is responsible for submitting no more than a two-page nomination letter and a two-page resume.

[Submit Nomination](#)

Ferroelectrics News

Ferroelectrics Awards Nominations Due: 11 January 2023

The Ferroelectrics Awards committee of the IEEE Ultrasonics, Ferroelectrics, and Frequency Control (UFFC) Society asks for your help in identifying and nominating outstanding individuals for annual awards offered by the Society:

- [IEEE UFFC Ferroelectrics Recognition Award](#)
- [IEEE UFFC Ferroelectrics Young Investigator Award](#)
- [IEEE Robert E. Newnham Ferroelectrics Award](#)

Descriptions of the awards and criteria for eligibility are available on the [IEEE UFFC-S Ferroelectrics Awards website](#). Awards will be announced during the [ISAF meeting in Cleveland, Ohio, USA](#) to be held on 23rd July 2023. Award recipients will be expected to attend the ISAF meeting to receive the award. For all awards, membership of IEEE UFFC-S at the time of the award is a strict requirement. Nominations for all awards are due no later than **11 January 2023** and should be submitted via the nomination form on the UFFC-S

Active collaboration between the nominator and the nominee in the preparation of the nomination package is encouraged. Self-nomination is permitted. No supplemental materials will be considered.

[Submit Nomination](#)

Frequency Control News

Frequency Control Awards Nominations Due: 11 January 2023

During IFCS, awards will be conferred to three distinguished individuals in the field of frequency control. Nominations are welcome from anyone and should be submitted through the proper nomination form located on the UFFC-S website. No nominations will be accepted via email.

IEEE UFFC-S Frequency Control Awards:

- [I. I. Rabi Award](#)
- [IEEE C. B. Sawyer Memorial Award](#)
- [Walter G. Cady Award](#)

Award Rules:

- Self-nomination is permitted for each of the IFCS Awards.
- There is no limit to the number of successive annual nominations an individual may receive.
- Previous IFCS Awardees may be nominated for one of the other awards in succeeding years.
- The nomination of a group whose work is highly related to the citation given in the nomination is permitted for each of the IFCS Awards.
- Double nomination, that is an individual nominating two different people for the same award in the same IFCS Awards Call year, is not permitted.
- An individual can only be considered for one of the IFCS Awards in any IFCS Awards Call year.
- If an individual self-nominates for one award, they may nonetheless nominate another individual for a different award. However, they cannot nominate an individual for the same award that they have self-nominated

1. A proposed citation for the nominee using a single sentence.
2. The current address (regular and e-mail) of the nominee and nominator.
3. The nominator's justification for the award, describing the nominee's accomplishments (for example initiative, ingenuity, creativity, quality and degree of success, etc.), and their importance to the frequency control community. This justification should not exceed 300 words.
4. Letters of recommendation may accompany the nomination form (or be sent separately). These are suggested addition, but not a prerequisite for the nomination.

[Submit Nomination](#)

[Back to Top](#)

UFFC SOCIETY UPDATES

Ongoing Calls for Volunteers



UFFC-S is seeking dedicated volunteers to offer their time and service in positions within the IEEE Ultrasonics, Ferroelectrics, and Frequency Control Society.

If you are a committee chair and would like to submit an open volunteer application to be posted on the Volunteer Opportunities page, please click [here](#).

[Visit the UFFC-S Volunteer Opportunities Page](#)

Call for Papers: Journal of Lightwave Technology



The **IEEE/Optica Publishing Group Journal of Lightwave Technology** calls for submissions for the Special Issue on Microwave Photonics. This special issue for the International Topical Meeting on Microwave Photonics 2022 (MWP 2022) will cover all topics in the field of microwave photonics. Microwave photonics is concerned with the use of photonic devices, systems, and techniques for applications in microwave, millimeter wave, and THz wave engineering. It also encompasses the development of high-speed photonic components for microwave system applications. The field is continuing to experience significant growth, fueled by recent interest and development in integrated microwave photonics and microwave/millimeter-wave photonics for 5G/6G applications and beyond.

The submission deadline is **31 March 2023**.

Call for Society Awards Nominations

The UFFC-S Awards Committee is calling for nominations for two UFFC Society-wide Awards the **UFFC Achievement Award** and the **UFFC Distinguished Service Award**. While nominations may be submitted at any time, the deadline for the 2023 nominations is 15 January 2023. Details for both awards may be found below.

UFFC-S ACHIEVEMENT AWARD

The Achievement Award is the highest Society-wide award presented to any past or current IEEE and UFFC-S member in special recognition of outstanding contributions. Selection criteria include significant technical publications in the field of ultrasonics, ferroelectrics, or frequency control, as well as contributions to these technical fields, and service to the Society. Selection is made by the Awards Committee from nominations submitted by the general membership. Presentation is annually at one of the Society's major symposia.

The award consists of an honorarium of \$2,000, a plaque, and a certificate. The Achievement Award was first presented in 1980.

By clicking the Submit Nomination button below you will be directed to the online application.

[Submit Nomination](#)

UFFC-S DISTINGUISHED SERVICE AWARD

The Distinguished Service Award recognizes long-term support of the Society's activities by any past or current IEEE and UFFC-S member. Recognition is given to those who innovate new Society programs, administer major Committees, manage Society functions, or promote the Society's areas of technical interest to the larger community. The recipient usually has served for many years with sustained participation in the Society's management. Selection is made by the Awards Committee from nominations submitted by the general membership. Presentation is annually at one of the Society's major symposia.

By clicking the Submit Nomination button below you will be directed to the online application.

[Submit Nomination](#)

[Back to Top](#)

SYMPOSIA

IUS 2022 Recap

It was an immense pleasure to exchange with colleagues at IEEE UFFC IUS 2022 in Venice! The final registration list tells us that there were 1112 on-site and 1072 on-line delegates (total of 2184 attendees with roughly 49% students on-site and 44% students on-line) and 76 exhibitors or patrons from 52 countries at this first hybrid-format IUS. On average 31 people attended each of the 15 short courses. The 501 oral and 720 poster presentations selected from 1587 submitted abstracts were presented over the 3-day technical program with up to 9 parallel sessions. Scattered throughout the sessions were 20 invited talks and 3 clinical talks in a special session. The Young Professionals Panels I & II, Industry Mock Interviews, Industry Workshops, student events, awards and WIE events added to the many dynamic interactions and events.

[Read More](#)

Student Events at IUS

The Job Seeking Skills event was organized on Wednesday, October 12, 7:30-8:30 CEST during the 2022 International Ultrasonics Symposium as a hybrid event (in-person and online) simultaneously. This event was a collaboration between the IUS student representatives and the Industry engagement group and provided student attendees with the valuable opportunity to have their CV's evaluated and practice job interview sessions with industry and academic professionals. Each student was paired with 2-3 professionals during this event and were given 5-15 minutes to interact one on one with them for CV evaluation, mock interview, or both. The assignment and timeslots were

during the event.

[Read More](#)

The Student Pitch Competition was held on Thursday, October 13, 13:00-14:00 CEST during the 2022 International Ultrasonics Symposium. The purpose of this competition was to give students an opportunity to showcase their skills in preparing and delivering a concise summary of their research. The event was held in a hybrid format with a projection screen and AV system provided on-site, so both online and in-person attendees could be present and follow the event simultaneously. During this hybrid event, the participants presented their work in a one-minute rapid-fire format, visually supplemented with a single PowerPoint slide. Pitches were judged based on four primary criteria: clarity of speech, clarity of results, slide layout, and overall impression.

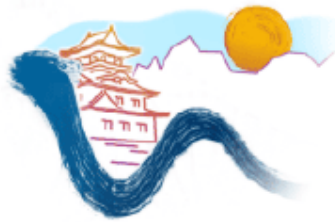
[Read More](#)

The Student-Professional Networking event was organized on Wednesday, October 12, 13:00-14:00 CEST during the 2022 International Ultrasonics Symposium. This event provided student attendees with the opportunity to meet both academic professors and industry representatives. In addition, this event was beneficial for professionals and leaders from academia and industry to meet potential prospective students/employees. Since the conference was conducted in a hybrid format this year, the event was also conducted on similar lines with Maryam moderating the in-person event and Yashwanth handling the online event simultaneously.

[Read More](#)

The Student Social event was organized on Monday, October 10, 19:00-20:00 CEST during the 2022 International Ultrasonics Symposium as an in-person event. After two years of virtual conferences due to the COVID-19 pandemic, the event provided student attendees with an opportunity to meet and get to know their peers in a fun and casual setting on the first day. Several round tables (10 people per table) with snacks and drinks were provided to make it a more convenient and friendly atmosphere for the attendees.

[Read More](#)



IEEE IFCS-EFTF-ATF 2023

Joint Conference of the IEEE International Frequency Control Symposium,
European Frequency and Time Forum and Asia-Pacific Workshop on Time and Frequency
Toyama, Japan | May 16-19, 2023

The 2023 Joint Conference of the IEEE International Frequency Control Symposium & European Frequency and Time Forum will be held in conjunction with the Asia-Pacific workshop on Time and Frequency (**IFCS-EFTF 2023**) in **Toyama, Japan** from **16 - 19 May 2023**.

For more information, important dates, and the call for papers, please visit the IFCS-EFTF-AFT 2023 website below.

[IFCS-EFTF-AFT 2023 Website](#)



IEEE ISAF 2023

IEEE International Symposium on Applications of Ferroelectrics (**ISAF**)
International Symposium on Integrated Functionalities (**ISIF**)
& Piezoresponse Force Microscopy Workshop (**PFM**)

The **2023 IEEE International Symposium on Applications of Ferroelectrics** (ISAF) in **Cleveland, Ohio** from **23 - 27 July 2023**.

For more information, important dates, and the call for papers, please visit the ISAF 2023 website below.

[ISAF 2023 Website](#)



IEEE
IUS 2023
International Ultrasonics Symposium

The **2023 IEEE International Ultrasonics Symposium (IUS)** in **Montreal, Canada** from **3-8 September 2023**.

For more information, important dates, and the call for papers, please visit the IUS 2023 website below.

[IUS 2023 Website](#)

[Back to Top](#)

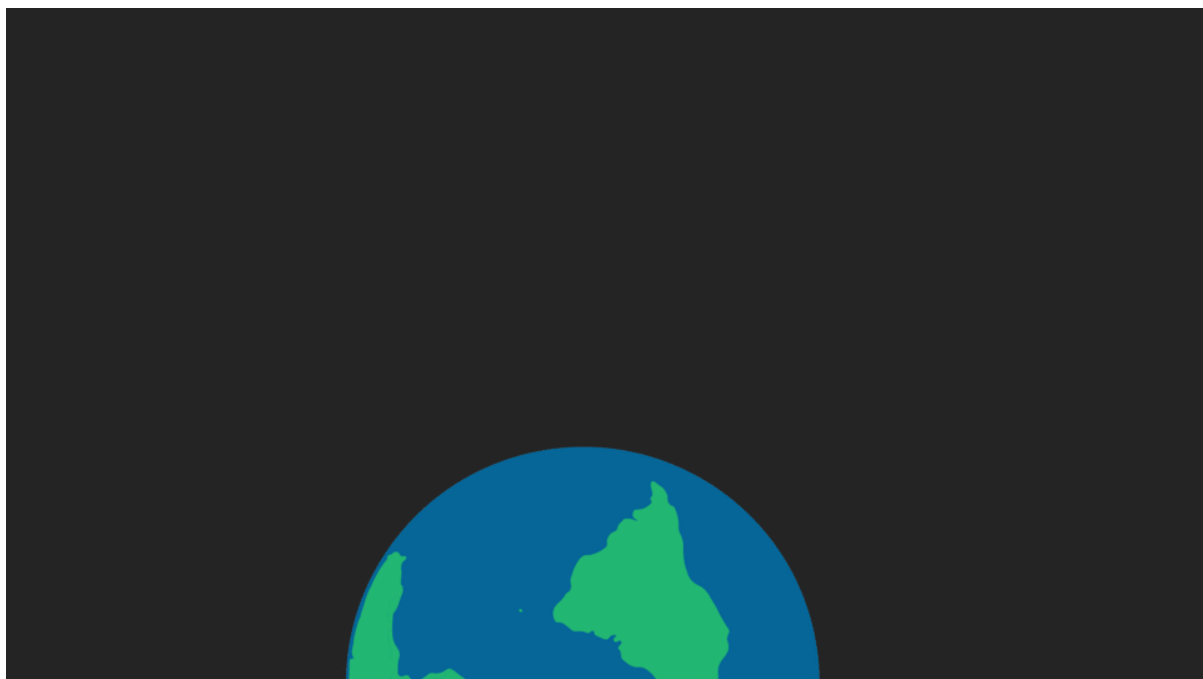
EDUCATION

Latin America Webinar Series



We are excited to continue our **UFFC-S Latin America Webinar Series**. Each webinar will feature a short early career talk and a main talk followed by a 10-minute Q&A session. Each webinar will also have translated captions in **Spanish** and **Portuguese**. Learn more about the Latin America Webinar Series, [here](#)

Virtual Lecturer Education Series



[View the Past Lectures on YouTube](#)

[Back to Top](#)

PUBLICATIONS

IEEE TRANSACTIONS ON **ULTRASONICS, FERROELECTRICS, AND FREQUENCY CONTROL**

[View the T-UFFC Current Issue](#)

Calls for Papers for Upcoming Spotlight Issues

Micro/Nanoelectromechanical Systems (MEMS/NEMS) in UFFC

This Spotlight Issue will seek to compile a collection of original research and tutorial papers to promote the publication and dissemination of best practices for a broad range of engineering know-how essential to MEMS/NEMS and their applications in UFFC.

Submission deadline: 31 January 2022

For more information, please visit the [IEEE T-UFFC Spotlight Issues](#) web page.

[View the T-UFFC Call Board](#)

[Back to Top](#)

AWARDS

2023 Society Fellows

Please join the IEEE Ultrasonics, Ferroelectrics, and Frequency Control Society in congratulating the 2023 class of IEEE Fellows!

Elevated by UFFC-S:

Chris De Korte for the development of translation of intravascular elastography for ultrasound imaging.

Omer Oralkan for contributions to micromachined ultrasonic transducers and integrated microsystems development, for imaging, therapy, and sensing.

Robert Tjoelker for contributions advancing trapped ion microwave clocks and deep-space frequency and timing systems.

Keith Wear for applying acoustic pressure measurements to improve the safety and effectiveness of medical ultrasound.

Elevated by other OU's:

Thomas Mikolajick for contributions to nonvolatile memory.

Xiaoning Jing for contributions to ultrasound transducers for advanced sensing, imaging, and therapy.

For more information on how to become a fellow or to see the existing fellows of UFFC-S please visit [here](#).

2022 Society Awards



Achievement Award

Piero Tortoli

For his pioneering contributions to Doppler ultrasound, open scanner technology, and their lasting impact on clinical imaging



Distinguished Service Award

Elizabeth Donley

For leadership in the revision of two important IEEE standards in Frequency and Time Metrology

2022 Frequency Control Awards



Sylvain Ballandras

For outstanding contributions to the modeling and development of crystal resonators and sensors



I. I. Rabi Award

Thomas Udem

For the development of the optical frequency comb and its application to precision measurement and fundamental physics



IEEE C. B. Sawyer Memorial Award

Elizabeth Donley

For selfless and sustained leadership in the frequency control community

2022 Ferroelectrics Awards



IEEE Ferroelectrics Recognition Award

Barbara Malič

For her outstanding contributions to the elucidation of the relationships between chemical and physical properties in ferroelectric ceramics



IEEE Ferroelectrics Young Investigator Award

Nan Zhang

For her outstanding contributions to our understanding of the links between the crystallography, structure, and applicable properties of ferroelectric materials.



Andrew Bell

For his outstanding contributions to our understanding of structure-property relationships in ferroelectric materials, especially relaxors, and the translation of this knowledge into practical applications

2022 Ultrasonics Awards



IEEE Carl Hellmuth Hertz Ultrasonics Award

Mikhail Shapiro

For inventing acoustic reporter genes and other groundbreaking technologies to connect ultrasound to molecular and cellular function



IEEE Ultrasonics Early Career Investigator Award

Muyinatu Bell

For pioneering contributions to spatial coherence beamforming theory and deep learning methods for ultrasound and photoacoustic image formation



The Rayleigh Award

Ton van der Steen

For seminal innovations in cardiovascular ultrasound

[Back to Top](#)

STUDENT MEMBERSHIP

There shall be three new Junior Student Representatives selected each year, one from each of the three Society technical areas.

The term of the Student Representatives shall be two years.

Junior Student Representatives become Senior Student Representatives during the second year of their term. The Ultrasonics position for 2023 has been filled, however, the society is still looking for a **Junior Frequency Control Representative** and a **Junior Ferroelectrics Representative**.

Role:

- Organizing and supporting student events during the 3 main UFFC symposia (online & on-site)
- Promoting, coordinating, and encouraging activities for the UFFC students' community

[Apply Here](#)

[Back to Top](#)

KEEP IN TOUCH

Please Tell Us Your Stories

Please contact any of the members of the UFFC-S newsletter team if you have news to share with the UFFC-S membership. We will get news onto the website as it occurs and include selected items in the quarterly highlight newsletters. Finally, in addition to the usual notices and updates we share, we're keen to promote good news and successes from across our society. If you or those you work with have received an award, successfully defended their Ph.D. thesis, secured funding for an exciting new initiative, please get in touch! You can see all our news items on our web pages or by following our social media accounts.



Derek Chan, Newsletter Deputy-
Editor-in-Chief
Erdal Oruklu, Ultrasonics Editor

Editor
Helen Mulvana, Web Editor-in-Chief
Shelly Conroy, Publicity Chair

Social Media

We're very keen to build our social media presence both to promote our society and to share news items with our community. Please add our pages to your networks and promote our posts so we can continue to reach as wide an audience as possible.

Whitelist UFFC-S Email

Please remember to whitelist the UFFC-S Administrator email address, uffc-admin@conferencecatalysts.com, to ensure that you are receiving the UFFC-S administrative email communication. For more information on how to whitelist an email address, click [here](#).

[Back to Top](#)



Copyright © 2022 IEEE Ultrasonics, Ferroelectrics and Frequency Control Society, All rights reserved.

[IEEE Privacy Policy](#)

Want to change how you receive these emails?
You can [update your preferences](#) or [unsubscribe from this list](#).