



International Union of Radio Science U.S. Commission B

R. Baktur, Chair
S. Sharma, Secretary
T. Karacolak, Technical Activities Chair

K. Warnick, Vice-Chair
S. Weiss, Membership Chair

Please reply to: Satish K. Sharma, ssharma@sdsu.edu

USNC-URSI Commission B Business Meeting Minutes IEEE AP-S/ITNC-USNC-URSI Radio Science Meeting 2024

Florence, Italy

July 15, 2024 at 5:30 PM (Italian Time)

1. Introduction

- Chair Reyhan Baktur called the meeting to order.
- Welcome to members and guest introductions for signing the attendance sheet including hardcopy attendance if one cannot use QR code.

2. Chair Report, Reyhan Baktur

- Chair thanked volunteers for the USNC-URSI Commission B Officers from 2021 to 2023.
- Chair mentioned that we need more volunteers for various activities within Commission B. If anyone interested, should contact any one of our officers to volunteer or nominate.
- Chair mentioned USNC-URSI Commission B Officers from 2024 to 2026.
- Chair mentioned USNC-URSI 2024-2026 Leadership.
- Chair asked members to submit papers and participate in upcoming conferences.
 - NRSF, Boulder CO, Jan. 7 - Jan. 10, 2025, Submission deadline: Sep. 13, 2024.
 - Commission B recommended Dave DeBoer from U.C. Berkeley as a plenary speaker. Dave is in the area of astronomical arrays and working on a lunar lander project for the far side of the moon.
 - URSI AP-RASC 2025, Sydney Australia.
 - IEEE APS/CNC-USNC North American Radio Science Meeting 2025, Ottawa Canada.

- Chair discussed the 2026 NRSM planning and asked for the Plenary Session ideas. Requested to share any recommendation of potential titles and speakers. Also mentioned that International speakers are welcome.
- Chair mentioned that the Sponsors and Exhibitors Committee members have stepped down. We seek volunteers to serve on this committee and help us secure sponsors and exhibitors for the 2026 NRSM. If someone from the commission is interested in serving, please provide names and email addresses.
- Chair discussed that the USNC-URSI needs a bigger / better social media presence and asked if someone from the commission is interested in helping us build this presence. Interested volunteers should provide names and email addresses.
- Chair discussed the 2026 URSI Awards and requested members to consider nominating a colleague. Chair also mentioned URSI Awards given at each GASS. The anticipated submission date is mid-August 2025, and the Call for nominations is expected at the 2025 NRSM.
 - One of the members asked to make award descriptions gender neutral.
- Chair discussed the qualifications and experience for becoming a member of the USNC-URSI Commission B. Chair also discussed getting an Individual Membership in URSI (International).
 - One of the members asked for the growth chart of memberships over the years and Chair acknowledged that this is a good idea.
 - One of the members asked about possibly creating a new journal which could help maintain the growth of our community. However, another member suggested that we should be careful about the journal idea. Chair mentioned that it is worth reviewing.

3. Membership Committee Report, Steven Weiss

One applicant was discussed for Full Membership: Tutku Karacolak. Members approved the new membership by unanimous vote.

4. Technical Activities Report, Chair Reyhan Baktur (On behalf of the TAC Chair T. Karacolak)

Report on statistics for the 2024 IEEE AP-S/ITNC-USNC-URSI Radio Science Meeting was presented and compared with previous versions of this symposia. For ITNC-USNC-URSI Radio Science Meeting, for Commission B, 190 papers were submitted, 162 papers were accepted, 28 papers were withdrawn and total 18 sessions were included. The report also included NRSM 2024 Statistics including Commission B (Total submissions: 48, Total accepted: 46, Withdrawn: 1, Number of sessions: 6). Total special sessions in NRSM 2024 was 27 with 166 papers. There are scheduled to be 9 special sessions at NRSM 2025. Information for proposing additional special sessions was shared.

5. Additional business

None

6. Meeting adjourned

Members attending: A. Alu, C. Argyropoulos, R. Baktur, I. Besieris, J. Breakall, F. Capolino, D. Erricolo, N. Engheta, S. Hagness, D. Jackson, , R. Janaswamy , M. Jensen, J. Johnson, V. Lomakin, L. Linkous, S. Long, I. Mahbub, M. Manteghi, E. Mokole, N. Nahar, B. Notaros, A. Nunnally , P.

Pathak, A. Peterson, R. Rahmat-Samii , K. Sertel, B. Shanker, S. Sharma, P. Uslenghi, J. Volakis, K. Warnick, S. Weiss, D. Wilton, A. Yaghjian, R. Ziolkowski

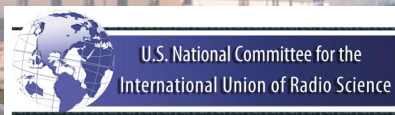
Guest attending: M. Ando, O. Bagheri, M. Bevacqua, Z. Chen, L. Crocco, S. Dogan, J. Gedney, D. Guha, H. Haisto, A. Iyer, K. Jha, G. Manara, C. Migliaccio, A. Sihvola, M. Suche

Minutes submitted by Satish Sharma, Secretary



Welcome to the
USNC-URSI Commission B Business Meeting
July 15, 2024

Please sign in





CHAIR REPORT

- Welcome to members and guests
- USNC and International URSI officers
- Approval of Boulder 2024 Meeting Minutes
- Upcoming meetings

COMMITTEE REPORTS

- Technical Activities Report (Tutku Karacolak)
- Membership Report (Steven Weiss)
- Old business
- New business
- Adjourn



Welcome, Guest introductions

Welcome, Guest introductions

Minutes from the last business meeting and the attendance poll are at

bit.ly/usnc-ursi-b



USNC-URSI Commission B Officers from 2021-2023

- Thank you volunteers who offered your help.
- We need more volunteers for various activities within Commission B, please. Please contact any one of our officers to volunteer or nominate.

USNC-URSI Commission B 2024-2026 Leadership



Reyhan Baktur

Chair

ECE Dept.
Utah State University
E-mail: reyhan.baktur@usu.edu



Satish Sharma

Secretary

ECE Dept.
San Diego State University
E-mail: ssharma@sdsu.edu



Karl Warnick

Vice Chair

ECE Dept.
Brigham Young University
E-mail: warnick@ee.byu.edu



Steven Weiss

Membership Committee Chair

Army Research Lab
E-mail: steven.j.weiss14.civ@mail.mil



Tutku Karacolak

Technical Activity Chair

ECE Dept.
Washington State University
E-mail: tutku.karacolak@wsu.edu



Board on International Scientific Organizations

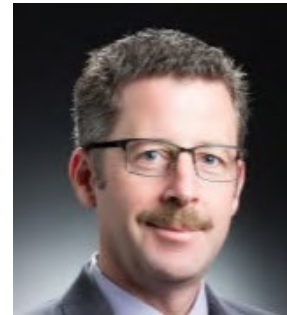
U.S. National Committee for the
International Union of Radio Science

National Academy of Sciences

USNC-URSI 2024-2026 Leadership



Jamesina Simpson
USNC Chair
Professor, Dept. of Electrical and Computer
Engineering, University of Utah
E-mail: jamesina.simpson@utah.edu



Michael H. Newkirk
USNC Immediate Past Chair
Principal Professional Staff
The Johns Hopkins University Applied
Physics Laboratory
E-mail: Michael.Newkirk@jhupl.edu



Christopher Anderson
USNC Secretary and Chair-Elect Electrical
Engineer
NTIA/ITS
Email: canderson@ntia.gov



Gary S. Brown
USNC Accounts Manager
Bradley Distinguished Professor of
Electromagnetics,
Virginia Polytechnic Institute & State
University
E-mail: randem@vt.edu



Ourania "Rania" Kosti
Director Board on International Scientific
Organizations
The National Academies
E-mail: okosti@nas.edu



Ana Ferreras
Senior Program Officer
Board on International Scientific
Organizations
The National Academies
E-mail: AFerreras@nas.edu

Upcoming Conferences

- NRSM, Boulder CO
 - Jan. 7-10, 2025
 - Submission deadline: Sep. 13, 2024
 - Commission B recommended Dave deBoer from U.C. Berkeley as a plenary speaker. Dave is in the area of astronomical arrays and working on a lunar lander project for the far side of the moon.
- AP-RASC 2025, Sydney Australia
- 2025 IEEE APS/URSI, Ottawa Canada

2026 NRSM Planning

- We need Plenary Session ideas. Please share your recommendation of potential titles and speakers.
- International speakers are welcome.

Sponsors and Exhibitors Committee

- USNC-URSI is looking for volunteers to serve on this committee and help us secure sponsors and exhibitors for the 2026 NRSM.
- Please let us know if you are interested or if you know someone who is interested in serving.

Social Media Presence

- USNC-URSI needs a bigger / better social media presence. Who from your commission is interested in helping us build this presence? Please provide names and email addresses.
- Do our international friends have any experience or recommendation? We would love to hear from you.

2026 URSI Awards

- These URSI Awards are given at each GASS:

Senior Awards	Early Career Awards
Appleton Prize Booker Gold Medal* Dellinger Gold Medal* van der Pol Gold Medal Rawer Gold Medal	Basu Prize* Koga Gold Medal

*USNC-URSI funded and presented

- Please consider nominating a colleague!
 - Anticipated submission date is mid-August 2025
 - Call for nominations expected at the 2025 NRSM

Membership in USNC-URSI Commission B

- Nominations for (**full, associate, or early career**) membership in Commission B should be submitted online.
- Applications are due by **December 1** of each year to be considered during the January meeting (unless the January meeting is not being held as was the case in 2020) or by **May 1** of each year to be considered during the summer AP-S/URSI joint symposium.
- Nomination form at:
<https://www.nationalacademies.org/our-work/usnc-ursi-commission-b-fields-and-waves>

Individual Membership in URSI (International)

- By application through www.ursi.org
 - Requirements are similar to USNC membership

Membership Report

Membership Growth

- What are some ideas for how your commission can grow your membership? Please list them and implement some of your ideas.

Technical Committee Report

Any Updates (not covered so far)

- Old Business?
- New Business?
- Adjourn.



2024 IEEE International Symposium on Antennas and Propagation and ITNC-USNC-URSI Radio Science Meeting

14-19 July 2024 • Florence, Italy



URSI Commission-B Special Sessions & Stats

**15 July 2024
Florence, Italy**

**Tutku Karacolak
Washington State University Vancouver**



Board on International Scientific Organizations

U.S. National Committee for the
International Union of Radio Science

National Academy of Sciences

2024 IEEE International Symposium on Antennas and Propagation and ITNC-USNC-URSI Radio Science Meeting

14-19 July 2024 • Florence, Italy

Papers submitted, accepted, rejected, and withdrawn
(Breakdown: AP, URSI, URSI Commissions)

Submitted	Accepted	Rejected	Withdrawn
Total Submitted: 2022	Total Accepted: 1836	Total Rejected: 28	Total Withdrawn: 158
- AP Submitted: 1603	- AP Accepted: 1464	- AP Rejected: 27	- AP Withdrawn: 112
- URSI Submitted: 419	- URSI Accepted: 372	- URSI Rejected: 1	- URSI Withdrawn: 46

2024 IEEE International Symposium on Antennas and Propagation and North American Radio Science Meeting, Florence

URSI	Submitted Papers	Accepted Papers	Withdrawn Papers	Sessions
A	30	24	5	5
B	190	162	28	18
C	36	35	1	4
D	29	24	5	4
E	3	2	1	0
F	15	12	3	3
G	--	--	--	--
H	--	--	--	--
J	--	--	--	--
K	16	14	2	2
URSI Special	61	60	1	0
URSI Celebratory	39	39	0	1
Total	419	372	46	37

AP-S	Regular Sessions	Special Sessions	Celebratory Sessions
	163	20	6

2023 IEEE International Symposium on Antennas and Propagation and North American Radio Science Meeting

13-28 July 2023 • Portland

Papers submitted, accepted, rejected, and withdrawn

(Breakdown: AP, URSI, URSI from US authors, URSI from non-US authors)

Submitted	Accepted	Rejected	Withdrawn
Total Submitted: 1464	Total Accepted: 1259	Total Rejected: 205	Total Withdrawn: 171
- AP Submitted: 1161	- AP Accepted: 998	- AP Rejected: 163	- AP Withdrawn: 134
- URSI Submitted: 303	- URSI Accepted: 261	- URSI Rejected: 42	- URSI Withdrawn: 37
- URSI from US: 143	- URSI from US: 136	- URSI From US: 7	- URSI from US: 7
- URSI from non-US: 160	- URSI from non-US: 125	- URSI From non-US: 35	- URSI from non-US: 30

Sessions		
AP-S	139	Includes SS
URSI	54	Includes SS
URSI US	--	Includes SS
URSI Non-US	--	Includes SS

SS: Special Session

2023 IEEE International Symposium on Antennas and Propagation and North American Radio Science Meeting, **Portland**

URSI	Submitted Papers	Accepted Papers	Withdrawn Papers	Sessions
A	16	16	0	5
B	148	131	17	25
C	39	24	15	6
D	17	15	2	4
E	9	6	3	2
F	16	13	3	6
G	-	-	-	-
H	-	-	-	-
J	-	-	-	-
K	15	15	0	3
URSI Special	43	41	2	16
Total	303	261	42	37

2024 version of this symposium we have

URSI	Submitted Papers	Accepted Papers	Withdrawn Papers
B	190	162	28

2022 IEEE International Symposium on Antennas and Propagation and North American Radio Science Meeting

10-15 July 2022 • Denver

Papers submitted, accepted, rejected, and withdrawn

(Breakdown: AP, URSI, URSI from US authors, URSI from non-US authors)

Submitted	Accepted	Rejected	Withdrawn
Total Submitted: 1473	Total Accepted: 1370	Total Rejected: 103	Total Withdrawn: 87
- AP Submitted: 1160	- AP Accepted: 1082	- AP Rejected: 78	- AP Withdrawn: 65
- URSI Submitted: 313	- URSI Accepted: 288	- URSI Rejected: 25	- URSI Withdrawn: 22
- URSI from US: 169	- URSI from US: 164	- URSI From US: 05	- URSI from US: 04
- URSI from non-US: 144	- URSI from non-US: 124	- URSI From non-US: 20	- URSI from non-US: 18

	Sessions	
AP-S	140	Includes SS
URSI	59	Includes SS
URSI US	52	Includes SS
URSI Non-US	45	Includes SS

SS: Special Session

2022 IEEE International Symposium on Antennas and Propagation and North American Radio Science Meeting, **Denver**

URSI	Submitted Papers	Accepted Papers	Withdrawn Papers	Sessions
A	15	13	00	04
B	150	139	10	26
C	29	21	01	04
D	--	--	--	--
E	10	09	01	02
F	25	24	01	06
G	--	--	--	--
H	--	--	--	--
J	--	--	--	--
K	31	30	01	07
URSI Special	53	52	01	22
Total	313	288	22	71

2024 version of this symposium we have

URSI	Submitted Papers	Accepted Papers	Withdrawn Papers
B	190	162	28

2021 IEEE International Symposium on Antennas and Propagation and North American Radio Science Meeting

4-10 December 2021 • Singapore

Papers submitted, accepted, rejected, and withdrawn

(Breakdown: AP, URSI, URSI from US authors, URSI from non-US authors)

Submitted	Accepted	Rejected	Withdrawn
Total Submitted: 1773	Total Accepted: 1502	Total Rejected: 271	Total Withdrawn: 46
- AP Submitted: 1239	- AP Accepted: 1072	- AP Rejected: 167	- AP Withdrawn: 36
- URSI Submitted: 267	- URSI Accepted: 215	- URSI Rejected: 52	- URSI Withdrawn: 5
- URSI from US: 87	- URSI from US: 72	- URSI From US: 15	- URSI from US: 1
- URSI from non-US: 180	- URSI from non-US: 143	- URSI From non-US: 37	- URSI from non-US: 4

	Sessions	
AP-S	133	Includes SS
URSI	52	Includes SS
URSI US	26	Includes SS
URSI Non-US	39	Includes SS

SS: Special Session

2021 IEEE International Symposium on Antennas and Propagation and North American Radio Science Meeting, **Singapore**

URSI	Submitted Papers	Accepted Papers	Withdrawn Papers	Sessions
A	14	10	0	05
B	132	109	03	29
C	22	16	02	05
D	--	--	--	--
E	07	07	0	03
F	22	17	0	07
G	--	--	--	--
H	--	--	--	--
J	--	--	--	--
K	19	16	0	03
URSI Special	49	39	0	20
Total				

2024 version of this symposium we have

URSI	Submitted Papers	Accepted Papers	Withdrawn Papers
B	190	162	28

2020 IEEE International Symposium on Antennas and Propagation and North American Radio Science Meeting

5-10 July 2020 • Montréal, Québec, Canada

Papers submitted, accepted, rejected, and withdrawn

(Breakdown: AP, URSI, URSI from US authors, URSI from non-US authors)

Submitted	Accepted	Rejected	Withdrawn
Total Submitted: 1798	Total Accepted: 1514	Total Rejected: 100	Total Withdrawn: 184
- AP Submitted: 1349	- AP Accepted: 1168	- AP Rejected: 86	- AP Withdrawn: 95
- URSI Submitted: 449	- URSI Accepted: 346	- URSI Rejected: 14	- URSI Withdrawn: 89
- URSI from US: 213	- URSI from US: 159	- URSI From US: 3	- URSI from US: 51
- URSI from non-US: 236	- URSI from non-US: 187	- URSI From non-US: 11	- URSI from non-US: 38

2020 IEEE International Symposium on Antennas and Propagation and North American Radio Science Meeting, **Montreal**

URSI	Submitted Papers	Accepted Papers	Withdrawn Papers	Sessions
A	21	16	5	2
B	206	152	47	27
C	33	29	4	4
D	47	36	8	6
E	2	1	0	0
F	39	27	9	6
G	2	2	0	0
H	3	3	0	1
J	20	19	1	4
K	19	16	3	2
URSI Special	57	45	12	2
Total	449	346	89	54

2024 version of this symposium we have

URSI	Submitted Papers	Accepted Papers	Withdrawn Papers
B	190	162	28

List of Special Sessions AP-S/URSI 2024 (20 sessions, 170 papers)

- MO-SS.1A: High Sensitivity Feeds and Antenna Arrays for Radio Astronomy and Remote Sensing
- MO-SS.2A: Electromagnetic solutions for advanced and emerging RFID systems
- MO-SS.1P: Machine-Learning as Applied to EM - Trends, Advances, and Applications
- MO-SS.2P: Multi-Functional Reconfigurable Surfaces for Next-Generation Sensing and Communications
- TU-SS.1A: Innovative Antenna Solutions for Next-Gen Non-Terrestrial Networks
- TU-SS.2A: Advances in Additively Manufactured Dielectric Antennas for Modern Communication and Sensing Systems
- TU-SS.1P: IEEE AP-S Industry Initiative Session: Antennas for Future Communication Networks
- TU-SS.2P: Quantum Technology Related to Electromagnetics
- WE-SS.1A: Advancing Connectivity Through Emerging Wireless Technologies
- WE-SS.2A: Advanced Technologies for EMF Exposure Assessment/Prediction/Monitoring
- WE-SS.1P: New Development in Antenna Measurements
- WE-SS.2P: Advanced Antenna Technology for Civilian and Defence Applications
- TH-SS.1A: Application of Electromagnetic Information Theory in next-generation wireless communication
- TH-SS.2A: Quantum/Atom Based Electric and Magnetic Field Sensors
- TH-SS.1P: Recent Advances in the Numerical Synthesis of Metasurfaces I
- TH-SS.2P: Special session S-A.14/S-U.14 - Microwaves in Medicine: from emerging trends to pathways for clinical application
- FR-SS.1A: Beam-Scanning Antennas for Next-Generation Wireless and Satellite Communications at mm-Waves and Beyond
- FR-SS.2A: Safety Aspects of Wearable and Implanted Antennas and Sensors
- FR-SS.1P: Intelligent Reflecting Surfaces and Programmable Metasurfaces: Enabling the Future of 5G and 6G Communications
- FR-SS.2P: The Latest Developments for Automotive Antennas

List of Celebratory Sessions AP-S/URSI 2024 (7 sessions, 63 papers)

MO-SS.3A: Mathematical Advances in Theoretical and Computational Electromagnetics: a Tribute to Prof. Zich - part 1

MO-SS.3P: Mathematical Advances in Theoretical and Computational Electromagnetics: a Tribute to Prof. Zich - part 2

TU-SS.3A: Celebrating Prof. Constantine A. Balanis' 85th Birthday and Contributions to Antennas and Propagation

TU-SS.3P: Celebratory Session in Honor of Dr. Arthur D. Yaghjian for his 80th Birthday

WE-SS.3P: Advancements in Antennas, Propagation, and Radio Science: In Memory of W. Ross Stone

TH-SS.3P: Understanding our History

FR-SS.3A: Advancing Electromagnetic Frontiers in Antennas and Propagation: A Centenary Tribute to Leopold B. Felsen

NRSM 2024 Statistics

Category	2019	2021	2022	2023	2024
Total Submissions	342	236	309	286	323
Total Accepted	341	229	304	282	316
Total Withdrawn	0	10	8	1	3
Total Presented	341	219	296	281	--
Number of Sessions	46	40	47	37	50
Number of Special Sessions	27	20	21	20	27

2024	Total Submissions	Total Accepted	Total Withdrawn	Number of Sessions
A	12	11	1	2
B	48	46	1	6
C	13	11	0	2
D	11	10	0	1
E	4	4	0	1
F	23	23	0	3
G	9	9	0	2
H	10	10	0	2
J	15	14	1	3
K	12	12	0	1
SS (Special Sessions)	166	166	0	27

National Radio Science Meeting Conference Statistics

Year	# Papers	# Sessions	# Travel Grants
2011	358	49	113
2012	369	47	104
2013	364	47	100
2014	399	54	115
2015	NARSM	NARSM	NARSM
2016	375	49	122
2017	425	56	137
2018	414	59	128
2019	341	46	109
2020	NARSM	NARSM	NARSM
2021	229	40	22
2022	304	47	--
2023	282	37	59
2024	316	50	78

Commission B Special Sessions confirmed so far, 2025 USNC-URSI NRSM, Boulder, Colorado

9 special sessions June 27, 2024

1. Near-field and Far-field Wireless Power Transfer

(Joint Commission B and K Session): Sima Noghanian, CommScope (sima_noghanian@ieee.org) and Ifana Mahbub, Univ. of Texas, Dallas (Ifana.Mahbub@utdallas.edu)

2. Multifunctional Antennas and Arrays for Satellite and Wireless Communications

Satish K. Sharma, San Diego State Univ. (ssharma@sdsu.edu) and Jia-Chi S. Chieh, NIWC-Pacific (jiachi.s.chieh.civ@us.navy.mil)

3. Quantum Technology Applications in Electromagnetics and Remote Sensing

(Joint Commission B and F Session): Saba Mudaliar, Air Force Research Laboratory (saba.mudaliar@us.af.mil) and Thomas Roth, Purdue University (rothte@purdue.edu)

4. Reconfigurable Intelligent Surfaces for Sensing and Imaging

Mohammadreza F. Imani, Arizona State University (mohammadreza.imani@asu.edu) and Georgios Trichopoulos, Arizona State University (gtrichop@asu.edu)

5. Antennas for Planetary Exploration

Justin Dennison (Justin.Dennison@jhuapl.edu) Johns Hopkins University Applied Physics Laboratory and Katherine Wolff, Johns Hopkins University Applied Physics Laboratory (Katherine.Wolff@jhuapl.edu)

6. Advanced Modeling Techniques and Algorithms in Computational Electromagnetics

Ata Zadehgo, University of Idaho (azadehgo@uidaho.edu) and Johannes Russer, Technical University of Munich (jrusser@tum.de)

7. Shaping Fields and Waves for a Smart Electromagnetic Environment

Danilo Erricolo, University of Illinois Chicago (derric1@uic.edu), Pai-Yen Chen, University of Illinois Chicago (pychen@uic.edu) and Aritra Banerjee, University of Illinois Chicago (abaner33@uic.edu)

8. High Power Microwaves Environment Effects

Avinash Sharma, Johns Hopkins University Applied Physics Laboratory (Avinash.Sharma@jhuapl.edu) and Zachary Epstein, Johns Hopkins University Applied Physics Laboratory

9. Progress in Reconfigurable Intelligent Surfaces (RIS)

Filippo Capolino, University of California, Irvine (f.capolino@uci.edu) and Satish K. Sharma, San Diego State University (ssharma@sdsu.edu)

7 special sessions (29 papers) B regular sessions: 41 papers, (total URSI: 50 sessions, 316 papers)

1. Advances in Wireless Power Transfer and Harvesting for Biomedical and Communication Applications

(Joint Commission B and K Session): Sima Noghanian, CommScope (sima_noghanian@ieee.org) and Yahia Rahmat-Samii, Univ. of California, Los Angeles (rahmat@ee.ucla.edu) (10 papers)

2. Multifunctional Antennas and Arrays for Satellite and Wireless Communications

Satish K. Sharma, San Diego State Univ. (ssharma@sdsu.edu) and Jia-Chi S. Chieh, NIWC-Pacific (jiachi.s.chieh.civ@us.navy.mil) (5 papers)

3. Antennas and Systems for Specialized Platforms and Environments

Reyhan Baktur, Utah State University (reyhan.baktur@usu.edu) and David R. Jackson, University of Houston (djackson@uh.edu) (No paper)

4. Complex EM and Meta Structures

Filippo Capolino, University of California, Irvine (f.capolino@uci.edu) and Juan Sebastian Gomez Diaz, University of California, Davis (jsgomez@ucdavis.edu) (6 papers)

5. Antennas for Planetary Exploration

Avinash Sharma (Avinash.Sharma@jhuapl.edu) Johns Hopkins University Applied Physics Laboratory, and Matthew Bray, Johns Hopkins University Applied Physics Laboratory (Matthew.Bray@jhuapl.edu) (3 papers)

6. Advanced Modeling Techniques and Algorithms in Computational Electromagnetics

Ata Zadehgo, University of Idaho (azadehgo@uidaho.edu) and Johannes Russer, Technical University of Munich (jrusser@tum.de) (No papers)

7. Progress in Reconfigurable Intelligent Surfaces (RIS)

Filippo Capolino, University of California, Irvine (f.capolino@uci.edu); Satish K. Sharma, San Diego State University (ssharma@sdsu.edu) (5 papers)

Commission B Special Sessions, 2023 USNC-URSI NRSN, Boulder, Colorado

7 special sessions (50 papers), B regular sessions: 20 papers, (total URSI: **37** sessions, **278** papers)

1. Low-Profile Millimeter-Wave/Terahertz Antennas for Mobile and Space Applications (10 papers)

Satish K. Sharma, San Diego State University (ssharma@sdsu.edu) and Goutam Chattopadhyay, JPL-NASA (goutam.chattopadhyay@jpl.nasa.gov)

2. Wearable antennas for WiFi, IoT, and 5G applications (Joint Commission B and K Session) (10 papers)

Sima Noghanian, CommScope, (sima_noghanian@ieee.org) and Yahya Rahmat-Samii, University of California, Los Angeles (rahmat@ee.ucla.edu)

3. Antennas and Systems for Specialized Platforms and Environments (10 papers)

Reyhan Baktur (reyhan.baktur@usu.edu), Utah State University and David R. Jackson, University of Houston (djackson@uh.edu)

4. Multiscale and Stochastic Modeling in Computational Electromagnetics (5 papers)

Ata Zadehgo, University of Idaho (azadehgo@uidaho.edu) and Johannes Russer, Technical University of Munich (jrusser@tum.de)

5. Novel Electrically Small Antennas and Matching Networks (5 papers)

Ting-Yen Shih, University of Idaho (tshih@uidaho.edu) and Kai Ren, Wentworth Institute of Technology (renk@wit.edu)

6. Complex EM and Meta Structures (5 papers)

Filippo Capolino, University of California, Irvine (f.capolino@uci.edu) and Juan Sebastian Gomez Diaz, University of California, Davis (jsgomez@ucdavis.edu)

7. Antennas for Planetary Exploration (5 papers)

Avinash Sharma (Avinash.Sharma@jhuapl.edu) Johns Hopkins University Applied Physics Laboratory, and Matthew Bray, Johns Hopkins University Applied Physics Laboratory (Matthew.Bray@jhuapl.edu)

Commission B Special Sessions, 2022 USNC-URSI NRSM, Boulder, Colorado

7 special sessions (38 papers), B regular sessions: 43 papers, (total URSI: 47 sessions, 296 papers)

1. Low-Profile Millimeter-Wave/Terahertz Antennas for Mobile and Space Applications (TITLE CHANGE)

Goutam Chattopadhyay, JPL-NASA and Satish K. Sharma, San Diego State Univ. (5 papers)

2. High Power Electromagnetics (Joint Commission B and E Session):

D. V. Giri, Pro-Tech and R.L. Gardner (No session)

3. Antennas and Systems for Specialized Platforms: UAVs, UUVS, and SmallSats

Reyhan Baktur, Utah State University and David R. Jackson, University of Houston (9 papers: Combined with #4)

Combined Session title: Antennas and Systems for Specialized Platforms and Extreme/Harsh Environments

4. Antennas and Sensors for Harsh Environment

Sima Noghanian, Phoenix Analysis and Design Technologies; and Sayan Roy, South Dakota School of Mines

5. Multiscale and Stochastic Modeling in Computational Electromagnetics (5 papers)

Ata Zadehgo, University of Idaho and Johannes Russer, Technical University of Munich

6. 5G and Millimeter Wave Antennas and Applications (5 papers)

Adrew Chrysler, Idaho State University, and Ting-Yen Shih, University of Idaho

7. Complex EM and Meta Structures (8 papers)

Filippo Capolino, University of California, Irvine and Ashwin Iyer, University of Alberta

8. Novel Electrically Small Antennas and Matching Networks (NEW) (6 papers)

Ashwin Iyer, University of Alberta and Ting-Yen Shih, University of Idaho

Commission B Special Sessions, 2021 USNC-URSI NRSN, Boulder, Colorado

7 B special sessions: 44 papers, B regular sessions: 41 papers (total URSI: 40 sessions, 219 papers)

1. Antennas and Sensors for Harsh Environment (4 papers)

Sima Noghanian, Wafer LLC and Sayan Roy, South Dakota School of Mines and Technology (sima_noghanian@ieee.org and Sayan.Roy@sdsmt.edu)

2. Low-Profile Antennas from Gigahertz to Terahertz (5 papers)

Goutam Chattopadhyay, JPL-NASA and Satish K. Sharma, San Diego State Univ. (goutam.chattopadhyay@jpl.nasa.gov and ssharma@sdsu.edu)

3. High Power Electromagnetics (Joint Commission B and E Session) (9 papers)

D. V. Giri, Pro-Tech and R.L. Gardner (giri@dvghi.com and blitz32schreiber@gmail.com)

4. Wireless Communications for Specialized Platforms and Environments (Antennas for CubeSats and UAVs) (5 papers)

Reyhan Baktur, Utah State University and David R. Jackson, University of Houston (reyhan.baktur@usu.edu and djackson@uh.edu)

5. Multiscale and Stochastic Modeling in Computational Electromagnetics (6 papers)

Ata Zadehgoi, University of Idaho and Johannes Russer, Technical University of Munich (azadehgoi@uidaho.edu and jrusser@tum.de)

6. 5G and Millimeter Wave Antennas and Applications (5 papers)

Adrew Chrysler, Idaho State University, and Ting-Yen Shih, University of Idaho (chryandr@isu.edu and tshih@uidaho.edu)

7. Complex EM and Meta Structures (10 papers)

Filippo Capolino, University of California, Irvine and Ashwin Iyer, University of Alberta (f.capolino@uci.edu and iyer@ece.ualberta.ca)

Special Sessions for National Radio Science Meeting 2025

- Please contact Tutku Karacolak within two weeks if you are still interested in organizing special session for the NRSM 2025.
- Thank you Technical Activities Committee (TAC) Reviewers for your service to Commission B papers reviewer activity
- Thank you USNC-URSI Commission B Officers for your help in reviewer and session building activities
- Hope to see you all at NRSM 2025 in Boulder during January 7-10, 2025
- Email: tutku.karacolak@wsu.edu