



American Meteorological Society



40th Conference on Radar Meteorology

28 August - 01 September 2023

Minneapolis, MN

Hyatt Regency Minneapolis

40th Conference on Radar Meteorology

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Minneapolis, MN and Online

On behalf of the American Meteorological Society (AMS) Committee on Radar Meteorology, welcome to Minneapolis, Minnesota and the 40th Conference on Radar Meteorology! We are excited for a week of cutting-edge science and discussion, and we look forward to reconvening the AMS radar community after a two-year delay due to the pandemic.

Our scientific program includes nine themes and three community-driven topics, covering traditional radar topics as well as community-designated priorities. The conference theme, “Leveraging Current and Emerging Radar Technologies to Pave the Way Toward New Discoveries and Capabilities,” highlights the importance of both scientific and technological innovation to advancing the field of radar meteorology. To that end, we will have a panel discussion to promote discussion on how emerging radar technologies can pave the way to new scientific discoveries. In addition, we will have two special evening events – an icebreaker event on Monday, and a memorial symposium for Dr. Dick Doviak on Tuesday. There will also be a student and early career coffee break on Monday morning.

We received 387 scientific abstracts from 24 countries, with an impressive array of research topics, reflecting many major research advancements over the past four years. A standardized rubric was used to evaluate abstracts, which assessed the relevance to the call for papers, quality of the research plan and writing, description of the findings, and novelty of the work. The large number of excellent submissions made for challenging decisions in determining the oral program. In assembling our conference program, we carefully considered how to provide a voice to a diverse group of speakers to share cutting-edge science research. As one step, we recruited a diverse program committee with members spanning different demographic backgrounds and institutions. When ranking abstracts within subcommittees and in the final program selections, we emphasized the importance of providing speaking opportunities to student and early career researchers, as well as traditionally underrepresented groups.

The technical program consists of 28 oral sessions, three formal poster viewings, seven keynote presentations, and a panel discussion. Within these sessions, there are 174 total oral presentations, 198 in-person posters, and 14 virtual posters, which were presented online last week. Two new themes were included this year, including signal processing and artificial intelligence topics. Over 80 student presentations were submitted and will be evaluated by a team of judges that span a wide breadth of knowledge and experience. Seven prizes will be awarded, including first through third in the oral and poster categories, as well as the Spiros G. Geotis prize for the best overall presentation. We also awarded two AMS travel grants and five registration grants to students, furthering the AMS Radar STAC’s goal to further engage students in the field of radar meteorology.

We are indebted to our program subcommittee chairs and members for their volunteer efforts in helping assemble the conference program and provide guidance on many other aspects of conference planning. The full program committee consisted of an astounding 65 people, many of whom sacrificed a significant amount of time to make this conference happen. They provided nearly 800 reviews in less than 3 weeks!

In addition, we would like to thank David Schwartzman and Dusan Zrnic for planning the Monday and Tuesday evening events, and Leanne Blind-Doskocil for organizing and promoting student/early-career activities. We thank Chris Weiss and Milind Sharma for their assistance with the student awards, including recruiting judges and determining the awardees. We also thank our short course organizers, Richard Ice, David Warde, and Max Grover, for providing an educational outlet for over 80 attendees. Finally, we thank our conference sponsors for their support, which greatly enhanced the food and beverage offerings at our special events and breaks. Please take an opportunity to thank them, as well as visit their tables in the poster hall.

We cannot understate our gratitude to the AMS staff for helping to put together this conference. We are especially grateful to Cati Iannarilli for her efforts serving as the lead AMS coordinator and for providing thoughtful and thorough responses to our MANY questions and ideas. We would like to thank several other AMS staff members for their assistance, including Jenn Rosen, Marissa Welch, Jessica Hanley, Anna (Hughes) Vock, Adam Kelly, and Jen Ives. Altogether, they handled many challenging and unpredictable situations associated with the pandemic (and the canceled 2021 conference), and we emerged with a hybrid conference format that can hopefully benefit attendees for years to come.

Finally, we hope you take some time to explore Minneapolis and engage in collaborative discussions. To help, the conference activities end at 3 PM on Wednesday! The Nicollet area near the hotel has abundant dining options, including many restaurants with sidewalk patios to enjoy the comfortable late-August Minnesota climate. Minneapolis has many beautiful city parks with lakes and rivers, including the Loring Park within walking distance of the hotel and an extensive park along the Mississippi River. To explore greater Minneapolis, public transit (subway) can be easily accessed from the hotel to see a Twins baseball game or visit world-class art museums.

David Bodine and Jim Kurdzo
Conference Co-Chairs

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General Information

Organizers

The 40th Conference on Radar Meteorology is organized by the AMS Committee on Radar Meteorology and hosted by the American Meteorological Society.

Connect

Follow conference updates on X (Twitter) @ametsoc. Also share your posts using the hashtag #AMS40Radar

Conference Badges and Registration

All those in attendance of the AMS conference must register and wear the name badge associated with their registration package. Please wear your badge in a viewable spot at all times during the conference. As a reminder, during registration you agreed to follow the AMS Professional and Respectful Conduct and the AMS Commitment to Care.

The AMS Registration Desk is located at Lake Harriet on the Fourth Floor of the Hyatt Regency. The AMS Registration Desk will be open for registration on Sunday 27 August from 5:00pm-7:00pm, and Monday-Friday during the hours of the conference.

Attendees who have registered for a full week package may attend all conference sessions (in person or virtual), coffee breaks, and events.

Attendees who have registered for a one day package may attend, for one calendar day, admission to all conference sessions (in person or virtual), coffee breaks, and/or receptions that take place on that day.

EVENTS

AMS Student and Early Career Professionals Engagement Coffee Break

Monday, 28 August | 10:00-10:30 AM | Great Lakes Promenade

Icebreaker Event

Monday, 28 August | 5:30-7:30 PM | Boundary Waters

Sponsored by: Meteopress

Dr. Dick Doviak Memorial Symposium

Tuesday, 29 August | 6:30-8:30 PM | Great Lakes Promenade

Sponsored by: Advanced Radar Research Center - University of Oklahoma

Awards Ceremony

Friday, 01 September | 11:00-11:30 AM | Great Lakes BC

Formal Poster Viewings

All posters will be located in Boundary Waters on the Fourth Floor.

Set Up and Tear Down Information:

Poster Group:	Set Up After:	Tear Down By:
Monday	MON: 12:00 PM	TUE: 10:00 AM
Tuesday	TUES: 12:00 PM	WED: 10:00 AM
Thursday	WED: 12:00 PM	THURS: 5:30 PM

Formal In-Person Poster Viewing Hours:

Monday: 3:00-4:30 PM (Sponsored by EWR Radar Systems)
Tuesday: 3:00-4:30 PM (Sponsored by LEONARDO Germany GmbH)
Thursday: 3:00-4:30 PM

Special Needs

It is our sincere desire to comply fully with both the letter and the spirit of the Americans with Disabilities Act of 1990 (ADA). Special housing needs should have been requested when making hotel reservations. Should you need assistance onsite, please see AMS Meetings Staff at the AMS Registration Desk.

Inclusivity at AMS

AMS is committed to creating an environment for meetings that "embraces diversity through the inclusion of individuals across age, gender, race, sex, nationality, ethnicity, physical ability, marital status, sexual orientation, body shape or size, gender identity and expression, socioeconomic status, and other facets of social diversity"

Professional and Respectful Conduct at AMS Meetings

Need to report unprofessional or disrespectful conduct? Email conduct@ametsoc.org or call 617-226-3965.

AMS is committed to safe and inclusive meetings for all attendees. Harassment, intimidation, or discrimination of any kind will not be tolerated at any meeting or event associated with the meeting. All communication should be appropriate for a professional audience including people of many different backgrounds. Be inclusive and respectful. The recording or transmissions of any education sessions, presentations, demos, videos, or content in any format is strictly prohibited.

Participants should not copy or take screenshots of Q&A or any chat room activity that takes place in the virtual space. This statement is meant to cover all meeting-associated events, including those sponsored by organizations other than AMS but held in relation to AMS events. This includes the scientific program, short courses, and exhibitions, as well as receptions, town hall meetings, and other informal or formal gatherings associated with AMS. Similarly, participants shall adhere to this code of conduct in online spaces related to the meeting and meeting-associated events, including Facebook, Twitter, and other online venues. Those who violate the standards of professional and respectful conduct may be asked to leave the meeting immediately and without refund, may not be considered for service on AMS boards and committees, and may be subject to additional legal action. Harassment, intimidation, or discrimination includes offensive comments and actions related to age, gender and gender identity, sexual orientation, disability, physical appearance, body size, race, religion; sexual images in public spaces; deliberate intimidation, stalking, or following; harassing photography or recording; sustained disruption of talks or other events; inappropriate physical contact; and unwelcome sexual attention.

As a reminder, during registration you agreed to follow the AMS Professional and Respectful Conduct and the AMS Commitment to Care. This includes wearing a face mask at all times.

If you are the subject of unacceptable behavior or have witnessed any such behavior, please immediately either:
Notify an AMS Staff Member (wearing a blue ribbon at an in person meeting)
Email conduct@ametsoc.org or call 617-226-3965
Email AMS Executive Director, Stella Kafka, skafka@ametsoc.org
If you witness or experience behavior that constitutes an immediate and serious threat, please call 911.

Photo Release: From time-to-time AMS uses photographs of conference events in its promotional materials. Unless this permission is revoked in writing to AMS, by virtue of their attendance all conference visitors agree to the use of their likeness in such materials.

Thank you and enjoy the conference!

Thank you to our sponsors



Monday, 28 August 2023			
	Great Lakes BC	Great Lakes A	
8:00	Opening Remarks		8:00
	Airborne and Spaceborne Radar 8:30: 1.1: Tropical Convection through the Lens of the INCUS Mission Susan C. van den Heever		
	Radar in Operational Meteorology 9:00: 1.2: Science Deliverables to Canadian Weather Radar Network Renewal Daniel Michelson		
	Radar History 9:30: 1.3: History of the Radar Conference Jim Wilson		
10:00	Coffee Break (Great Lakes Promenade)		10:00
10:30	Emerging Technology I: Bistatics, Profiling, and Phased Arrays 10:30: 2A.1: Simulations of Polarimetric Bistatic Scattering at Multiple Frequencies Samuel Emmerson 10:45: 2A.2: A Phased-Array Bistatic Radar Network for Measuring Atmospheric Convection Steven Beninati 11:00: 2A.3: A BARometric Differential Absorption Radar (BARODAR) for surface pressure remote sensing Alessandro Battaglia 11:15: 2A.4: Exploiting All Digital Phased Array Radars for Clutter Mitigation with Space-Time Adaptive Processing Yoon Kim 11:30: 2A.5: A Robust Approach to Polarimetric Calibration for NSSL's Advanced Technology Demonstrator Igor R Ivic 11:45: 2A.6: The NSSL ATD through NWS Eyes: An Assessment of Base Data Quality Jami B. Boettcher	Microphysical Studies with Radar I: Multiparameter Observations of Snow and Ice 10:30: 2B.1: High-Resolution Snowstorm Measurements and Retrievals Using Cross-Platform Multi-Frequency and Polarimetric Radars Edwin Lee Dunnavan III 10:45: 2B.2: Airborne Observations of Riming in Arctic Mixed-Phase Clouds during HALO-(AC)3 Nina Maherndl 11:00: 2B.3: Spatial Variability in the Occurrence of Summer Precipitation over a 30 km Transect in the Sør Rondane Mountains, Antarctica Alfonso Ferrone 11:15: 2B.4: Linking Dual-Pol Radar Signatures to Temperature and Microphysics during NASA IMPACTS Song Zhang 11:30: 2B.5: The Polarimetric Radar Scattering Properties of Oriented Aggregates Robert Schrom 11:45: 2B.6: State Dependent Sensitivity of Spaceborne Radar to Ice Cloud Microphysical Assumptions Derek J. Posselt	10:30
12:00	Lunch Break		12:00
1:30	Emerging Technology II: Digital Beamforming and Phased Array Signal Processing Techniques 1:30: 3A.1: Phase-Only Pattern Synthesis for Imaging Beams Using NURBS Reece J. Reinke 1:45: 3A.2: Digital Beamforming of Unequal APAR Subarrays Mark Leifer 2:00: 3A.3: Novel Adaptive Beamforming Technique for Weather Observations Using the Advanced Technology Demonstrator at NSSL Feng Nai 2:15: 3A.4: Evaluating the Benefit and Utility of All-Digital PAR Imaging Modes for Tornadoic and Non-Tornadoic Supercells using Synthetic PAR Data Brandon K. Cohen 2:30: 3A.5: SPARS: A Novel Technique for Sampling Meteorological Targets using a Phased Array Radar Edward Luke 2:45: 3A.6: Experimental Validation of the Cross-Polar Cancellation (XPC) Technique: A Novel Solution to Improve the Cross-Polar Contamination on Polarimetric Phased Array Weather Radars Cesar Manuel Salazar	Microphysical Studies with Radar II: Polarimetric Observations of Deep Convection 1:30: 3B.1: Microphysical Processes Contributing to Extreme Rainfall in Complex Terrain Angela Rowe 1:45: 3B.2: Microphysical Insights from Dual-Polarization Spectral Decomposition in Updraft Environments during the RELAMPAGO Campaign Ivan Arias Hernandez 2:00: 3B.3: Observations and Modeling of Seabreeze Convection Sampled during the Tracking Aerosol Cloud Interactions (TRACER) Experiment Robert C. Jackson 2:15: 3B.4: Investigating the Relation between Polarimetric Radar Signatures and Downburst Forcing Mechanisms using Spectral Bin Modeling Jacob Carlin 2:30: 3B.5: Detection and Sizing of Hail Using the Differential Phase Valery M. Melnikov 2:45: 3B.6: Characteristic of ZDR Columns in a High-Resolution Numerical Weather Prediction Model Chun Hay Brian Lo	1:30
3:00	PM Coffee Break/Formal Poster Viewing (Boundary Waters)		3:00
4:30	Radar Meteorology Education 4:30: 4A.1: The Research and Educational Activities with the Mobile Rapid Scan X-Band Polarimetric (RaXPo) Radar As an NSF Community Instrument Facility David J. Bodine 4:45: 4A.2: Open Radar Cookbooks for All Maxwell A. Grover 5:00: 4A.3: A CURE for Radar Meteorology: Piloting the Course-Based Undergraduate Research Experience Format at Purdue University Robin Tanamachi 5:15: 4A.4: The ESPOIRS Project Joel Van Baelen	Airborne and Spaceborne Radar I: Ground Validation of GPM Measurements 4:30: 4B.1: The Microphysics and Kinematics of GPM's Satellite Radar Profiles David J. Bodine 4:45: 4B.2: Melting the Inconsistencies: Enhancing Coherence in Microphysical Retrievals David J. Bodine 5:00: 4B.3: Assessment of the GPM Rainfall Retrieval Algorithm Using in-Situ Measurements David J. Bodine 5:15: 4B.4: Narrowing the Blind Zone of the GPM Dual-Frequency Precipitation Retrieval David J. Bodine	4:30
5:30	Sessions End for the Day		5:30
5:30	Icebreaker Reception (Boundary Waters Promenade)		5:30

Tuesday, 29 August 2023			
	Great Lakes BC	Great Lakes A	
8:00	Observations of Winter Storms 8:00: Airborne Radar and Microphysics Signatures in Snowbands as Measured during the IMPACTS Field Campaign Lynn A. McMurdie		8:00
	Severe Storms and Mesoscale Meteorology 8:30: Investigating the Relationships Between Rotation and Heavy Rainfall Along the Mei-yu Front During PRECIP 2022 Jennifer C. DeHart		
	Panel Discussion 9:00: Utilizing Emerging Radar Technologies to Achieve New Scientific Discoveries Jana B. Houser, PHD		
10:00	Coffee Break (Boundary Waters)		10:00
10:30	Airborne and Spaceborne Radars II: Innovative Airborne Radar Systems and Retrievals 10:30: 6A.1: Examining Severe Storm Characteristics with the Airborne Phased Array Radar (APAR) Observing Simulator Bradley Klotz 10:45: 6A.2: Classification of Clouds in Airborne Cloud Radar Observations Ulrike Romatschke 11:00: 6A.3: Challenges of Combining Remote Sensing with In-situ Measurements in Airborne Science and Engineering Jakob Fusselman 11:15: 6A.4: Airborne Radar Doppler Spectrum Width as a Scale-Dependent Turbulence Metric Adam Majewski 11:30: 6A.5: Implementation of the Airborne Phased Array Radar (APAR) Observing Simulator (AOS) Prototype Wen-Chau Lee 11:45: 6A.6: The Structure and Dynamics of the Turbulent Hurricane Boundary Layer from Radar Remote Sensing Steve R. Guimond	Severe Storms and Mesoscale Meteorology I: Observations of Deep Convection and the Boundary Layer 10:30: 6B.1: Exploring Convective Boundary Layer Depth and Entrainment Zone Properties with Dual-Polarization Radar Observations Braedon Stouffer 10:45: 6B.2: Does Meteorological Variability Across Sea and Bay-Breeze Fronts Influence Thunderstorm Characteristics? Insights from the TAMU TRACER Field Campaign Milind Sharma 11:00: 6B.3: A Fuzzy Logic Algorithm for Convection Initiation Forecast in Taiwan Hung-Kuan Li 11:15: 6B.4: Characteristics of Thermals in Deep Convective Storms from Radar Observations Thorwald H. M. Stein 11:30: 6B.5: Near-Surface Moisture Variability in the Coastal Environments Revealed from Weather Radars Ya-Chien Feng 11:45: 6B.6: Characteristics of Convective Cores As Revealed in Range-Height Indicator Scans during RELAMPAGO-CACTI Stephen William Nesbitt	10:30
12:00	Lunch Break		12:00
1:30	Severe Storms and Mesoscale Meteorology II: Field Campaign Observations of Supercells and Tornadoes 1:30: 7A.1: The May 27, 2019 Imperial, NE Supercell during TORUS: Origins, Observations, and Impacts of an SVC Alex Schueth 1:45: 7A.2: Multi-Doppler Analyses Detailing the Evolution of the 20 May 2019 Mangum, OK Supercell Observed During TORUS Daniel M. Stechman 2:00: 7A.3: The Kinematic Character of Supercell Forward Flank Outflows from the TORUS Project Christopher C. Weiss 2:15: 7A.4: A Triple-Doppler Analysis of the 17 May 2019 McCook / Farnam, NE Tornadoic Supercell Martin Satrio 2:30: 7A.5: Determining the Vertical Sense of Evolution of Rotation during Tornadoogenesis Using Rapid-Scan, Polarimetric Radar Data Jana B. Houser, PhD 2:45: 7A.6: The BEST Project (Boundary-layer Evolution and Structure of Tornadoes) Kinematic and Thermodynamic Observations of Tornadoes Joshua Wurman	Signal/Data Processing Techniques for Radar I: Spectral Processing Algorithms 1:30: 7B.1: Doppler Spectrum Reconstruction for Precipitation with Gaussian Process Models Tworit Dash 1:45: 7B.2: Differential Phase on Transmission Dusan S. Zrnica 2:00: 7B.3: A Signal Processing Technique to Mitigate Wind Turbine Clutter on the NEXRAD Network Sebastian M. Torres 2:15: 7B.4: Regression Filtering to Improve Radar Signal Statistics: Application to NEXRAD SZ Phase Coded Data John C. Hubbert 2:30: 7B.5: Identification and Mitigation of Wind Turbine Clutter using Spectral CMD Michael J. Dixon 2:45: 7B.6: Designing and Evaluating Pulse Compression Waveform for Meteopress Solid-State Radars Jan Hrach	1:30
3:00	PM Coffee Break/Formal Poster Viewing (Boundary Waters)		3:00
4:30	Quantitative Precipitation Estimation and Hydrology I: Winter Weather Applications 4:30: 8A.1: A Synthesis of Polarimetric and Dual-Frequency Radar Observations of Winter Storms for Estimating Ice Water Content Mariko Oue 4:45: 8A.2: Vertical Reflectivity Correction for Winter Precipitation in Mountainous Region Lin Tang 5:00: 8A.3: Optimized Polarimetric Radar Relations for Snow Estimation Peter Bukovcic 5:15: 8A.4: Performance of Operational Snow Liquid Water Estimation for the Canadian S-Band Radar Network. Sudesh Boodoo	Signal/Data Processing Techniques for Radar II: High-Performance Computing for Simulations/Algorithms 4:30: 8B.1: RadarHub: A Real-time Algorithm Testbed Boon Leng Cheong 4:45: 8B.2: Beyond the Blur: Variational Techniques for Radar Gridding and 3D Wind Retrieval Jordan Brook 5:00: 8B.3: Three-Dimensional Variational Multi-Doppler Wind Retrieval over Complex Terrain Ting-Yu Cha 5:15: 8B.4: Speeding Up Time Series Simulations: Looping Through Signal Parameters Christopher Curtis	4:30
5:30	Sessions End for the Day		5:30
6:30	Dr. Dick Doviak Memorial Symposium (Great Lakes BC)		6:30

Wednesday, 30 August 2023			
	Great Lakes BC	Great Lakes A	
8:00	Winter Storms: Microphysics and Dynamics 8:00: 9A.1: Manifestation of Elevated Convection in Wintertime Extratropical Cyclones During IMPACTS Kaylee Heimes 8:15: 9A.2: Vertical Motions in Orographic Cloud Systems Retrieved from W-Band Radar over the Idaho Mountains during SNOWIE: Controls on Supercooled Liquid Water Content and Cloud Droplet Number Concentrations Troy Justin Zaremba 8:30: 9A.3: Quantifying Ice and Snow Particle Terminal Velocities, Backscatter Cross-Sections and Snowfall Rates Using Aircraft and Ground-Based Doppler Radar and In-Situ Aircraft Measurements from IMPACTS Andrew J. Heymsfield 8:45: 9A.4: Understanding the Vertical Slope and Maintenance Mechanisms of Mesoscale Snow Bands Charles N. Helms 9:00: 9A.5: Wintertime Elevated Convection During the IMPACTS Field Campaign Gerald Heymsfield 9:15: 9A.6: Variability of Mesoscale Cloud and Precipitation Structures during Near-Freezing Surface Conditions Using Ground-Based Radar Observations from WINTRE-MIX Katja Friedrich 9:30: 9A.7: The Role of the Kelvin-Helmholtz Wave on the Precipitation Microphysics during ICE-POP 2018 Kwonil Kim 9:45: 9A.8: Unveiling Cloud-Top Generating Cells Properties Through Cloud Radar Simulators Sisi Chen	Emerging Technology III: Phased Array Systems and Data 8:00: 9B.1: An Update of the Phased Array Research Program at the National Severe Storms Laboratory Anthony E. Reinhart 8:15: 9B.2: Spring 2023 Data Collection with the NSSL Advanced Technology Demonstrator (ATD) Phased Array Radar Terry J. Schuur 8:30: 9B.3: Analysis of Precipitation Systems By Using MP-PAWR Nobuhiro Takahashi 8:45: 9B.4: Horus - A Fully Digital Polarimetric Phased Array Radar for Next-Generation Weather Observations Robert Dean Palmer 9:00: 9B.5: Novel Radar Observations By Exploiting Phased Array Radar: The Development of the Mobile C-Band Polarimetric Atmospheric Imaging Radar (PAIR) Tian-You Yu 9:15: 9B.6: Verification and Evaluation of Wind Field Accuracy of Shanghai X-Band Phased Array Weather Radar Network Haojun Chen 9:30: 9B.7: Examining the Improved Volumetric Update Rates Afforded by Dual-Polarization Phased Array Radar A. Addison Alford 9:45: 9B.8: LOTOS (Lower Troposphere Observing System): A Community Suite of Profiling Radars, Lidars, and Other Sensors for Atmospheric Research William O.J. Brown	8:00
10:00	Coffee Break (Boundary Waters)		10:00
10:30	Polarimetric Radar Studies of Atmospheric Electricity and Lightning 10:30: 10A.1: Leveraging the Multiplatform Precipitation Feature Database of Combined Ground Radar and Satellite Lightning Observations for Convective Studies Sarah M. Stough 10:45: 10A.2: Detection of Electrification with Dual-Polarimetric Radar Signatures Wibke Deierling 11:00: 10A.3: Signatures of Vertical Ice Particles Orientation before IC Lightning Flash Initiation Observed by X-Band Dual Polarized Phased Array Weather Radar Shuo Wang 11:15: 10A.4: Spectral Polarimetry Analysis for Detection and Tracking of Ice Alignment Signatures in Thunderstorms Min-Duan Tzeng 11:30: 10A.5: Temporal Evolution of Lightning-Microphysics Relationship in Southeastern US Thunderstorms: Insights from StickNet, LMA, and WSR-88D Data Kelcy Brunner 11:45: 10A.6: Electrification Signatures Observed during the Lake Effect Electrification Project Vanna C. Chmielewski	Radar in Operational Meteorology I: Network Monitoring, Upgrades, and Design 10:30: 10B.1: Impact of WSR-88D Intra-volume Low-level Scans on Tornado Warning Performance Parsed by Storm Type John Y. Cho 10:45: 10B.2: NEXRAD Radar Product Improvement – Update 2023 Michael J. Istok 11:00: 10B.3: Data Quality Anomalies and Phenomena on the WSR-88D Amy E. Daniel 11:15: 10B.4: Real-time Monitoring and Calibration of Weather Radar Network using Multiple Techniques Valentin Louf 11:30: 10B.5: Effective Visualization of Radar Data for Users Impacted by Color Vision Deficiency Zachary Sherman 11:45: 10B.6: A Supplemental High-Resolution Radar Network within the Conterminous United States Micheal Simpson, PhD	10:30
12:00	Lunch Break		12:00
1:30	Severe Storms and Mesoscale Meteorology III: Polarimetric Radar Signatures of Supercells and Tornadoes 1:30: 11A.1: Reconciling Updraft Size vs. Mesocyclone Size Arguments in Tornado Formation and Intensity Prediction Michael M. French 1:45: 11A.2: Development of a Dual-Polarization Radar Emulator to Compare Weakly and Strongly Tornadoic Supercells from Ensembles of High-Resolution Numerical Simulations Rachael Cross 2:00: 11A.3: Increasing our Understanding of Lofted and Surface Debris Fields Associated with Tornadoes using Mobile Polarimetric Radars Roger M. Wakimoto 2:15: 11A.4: Linking ZDR Hotspots to Storm Cell Tracking Vinzent Klaus 2:30: 11A.5: On the Formation and Evolution of Rare, Anticyclonic Tornadoes/Strong Vortices in a Supercell Near Selden, Kansas on 24 May 2021: Analysis of Data from a Rapid-Scan, Polarimetric, X-Band, Doppler Radar Howard B. Bluestein 2:45: 11A.6: An Overview of Purdue's Mobile Disdrometer Operations in PERiLS 2023 Daniel T. Dawson II	Microphysical Studies with Radar III: Multi-Wavelength Observations and Innovative Techniques 1:30: 11B.1: Observing the Vertical Distribution of the Hydrometeor Mix with Ground-Based Scanning Polarimetric Cloud Radar Majid Hajipour 1:45: 11B.2: Advantages of G-Band Radar in Multi-Frequency, Liquid Phase Microphysical Retrievals Benjamin Courtier 2:00: 11B.3: Tracking a Warm Rain Cell and Retrieving the Lower Order Moments and DSD: A Case Study Using 2 X-Band Polarimetric Radars Merhala Thurai 2:15: 11B.4: Development of a New Balloon-Borne Particle Imaging Radiosonde and First Flight into a Convective Cloud Kenji Suzuki 2:30: 11B.5: Development of Dual-Polarization Radar Algorithm for Melting Layer Detection and Signatures in Northern Taiwan Jui Le Loh 2:45: 11B.6: Retrieving Raindrop Size Distribution Parameters and Vertical Air Motion from Micro Rain Radar Observations Christopher R. Williams	1:30
3:00	Sessions End for the Day		3:00

Thursday, 31 August 2023			
	Great Lakes BC	Great Lakes A	
8:00	<p>Use of Radar Data for Numerical Weather Prediction and Analysis I: Polarimetric Radar Data Assimilation and Microphysical Processes</p> <p>8:00: 12A.1: Polarimetric Radar Observations Meet Atmospheric Modelling (PROM) - A Research Initiative in Germany Silke Troemel</p> <p>8:15: 12A.2: A Novel Approach to Assimilate ZDR Observations with an Ensemble Kalman Filter: Data Assimilation System Bing-Xue Zhuang</p> <p>8:30: 12A.3: Improvement of Forward Operators for Polarimetric Radar Data Simulation and Assimilation with Double Moment Microphysics Schemes Peng Liu</p> <p>8:45: 12A.4: Comparing Dynamics and Microphysics of Modeled and Observed Convective Events Using a Polarimetric Forward Operator Raquel Evaristo</p> <p>9:00: 12A.5: Joint 4D Data Assimilation of the Networks of Weather Radars and Ground-Based Profiling Platforms for Forecasting Convective Storms Yubao Liu</p> <p>9:15: 12A.6: Impacts of Hail on Simulated ZDR Arc Identification Allison LaFleur</p> <p>9:30: 12A.7: Assimilation of Radar Kdp Observations Using an Ensemble Kalman Filter for the 31 May 2013 Oklahoma Storm Event: Investigation of DA Configuration Sensitivity and Simulated Microphysical States Marcus R. Johnson</p> <p>9:45: 12A.8: A Comparative Analysis of a 10-Year Statistic of Polarimetric X-Band Radar Data and Ice-Microphysical Retrievals with ICON Simulations Tobias Scharbach</p>	<p>Airborne and Spaceborne Radars III: Spaceborne Radar Observations and Emerging Platforms</p> <p>8:00: 12B.1: Quantitative Analysis of the Delta-t Approach for Estimating Convective Mass Flux Using Ground Radar Observations Brenda Dolan</p> <p>8:15: 12B.2: GPM KaPR Deep Convection Observations: Insight for Future Spaceborne Radar Missions Randy Chase</p> <p>8:30: 12B.3: CloudCube: A Compact, Low-Cost Radar for Vertical Profiling of Clouds and Precipitation Raquel Rodriguez Monje</p> <p>8:45: 12B.4: Application of NASA Multi-Frequency Airborne Doppler Radar for Estimates of Hydrometeor: Microphysical Properties Liang Liao</p> <p>9:00: 12B.5: Next Generation Spaceborne Doppler Radars for Cloud and Precipitation Studies: Lessons Learned during the NASA AOS Mission Architecture Study Pavlos Kollias</p> <p>9:15: 12B.6: WIVERN: A Mission to Observe Global in-cloud Winds, Clouds and Precipitation as part of the ESA Earth Explorer Programme EEI I Anthony J. Illingworth</p> <p>9:30: 12B.7: Commercial Weather Radar from Space: The Tomorrow-Io Pathfinder Mission and Ka-Band Radar Satellite Constellation Richard Roy</p> <p>9:45: 12B.8: Prototype Precipitation Profiling Algorithms for the Tomorrow-R1 and Tomorrow-R2 Radars Ethan Nelson</p>	8:00
10:00	Coffee Break (Boundary Waters)		10:00
10:30	<p>Radar in Operational Meteorology II: Algorithms</p> <p>10:30: 13A.1: TOFU: A Novel Doppler Unfolding Technique Using Optical Flow Alain Protat</p> <p>10:45: 13A.2: Assessing Rainfall Risk and the Impact of Extreme Precipitation Events in Germany Based on a Catalogue of Radar-based Heavy Rainfall Events (CatRaRE) Katharina Lengfeld</p> <p>11:00: 13A.3: Nowcasting Thunderstorm Hazards over Lake Victoria Rita D. Roberts</p> <p>11:15: 13A.4: Identifying Updrafts with ZDR Hotspots John M Krause</p> <p>11:30: 13A.5: Stormy Subtropics and Stratiform South: A Radar-Based Classification of Australian Rainfall Events Annabel Jayne Bowden</p> <p>11:45: 13A.6: Automated Detection of Boundary Layer Depth Dual-Polarization Radar Observations Christina Lyn Comer</p>	<p>Artificial Intelligence in Radar Meteorology I: Nowcasting, Convection, and Quality Control</p> <p>10:30: 13B.1: inpainting Gaps and Blocked Areas in Weather Radar Networks with Deep Learning Matej Murin</p> <p>10:45: 13B.2: The Development of a Single-Radar Tornado Prediction Algorithm Using Machine Learning Thea Sandmael</p> <p>11:00: 13B.3: A Tornado Detection Algorithm using Deep Neural Networks, Full-Resolution Polarimetric Weather Radar Data, and Explainable AI James M. Kurdzo</p> <p>11:15: 13B.4: Improving Nowcasting of Convective Development by Incorporating Polarimetric Radar Variables into a Deep Learning Model Xiang Pan</p> <p>11:30: 13B.5: Physically Constrained Deep Generative Approach to Precipitation Nowcasting Matej Choma</p> <p>11:45: 13B.6: Development of a Deep Full-Scale Connected U-Net for Reflectivity inpainting in Spaceborne Radar Blind Zones Fraser King</p>	10:30
12:00	Lunch Break		12:00
1:30	<p>Severe Storms and Mesoscale Meteorology IV: Radar Observations of Hailstorms, Microbursts, and Tropical Cyclones</p> <p>1:30: 14A.1: Rapid-Scan, Polarimetric Radar Observations and Ground Validation of a Hail-Producing Supercell in Colorado Laura Shedd</p> <p>1:45: 14A.2: Advancements in Radar-Derived Hail Products for Estimating Hail Damage Nick Guy</p> <p>2:00: 14A.3: Analysis of Doppler Velocity in Three-Body Scattering Signatures for use in Hail Size Estimation Anna VanAlstine</p> <p>2:15: 14A.4: Using Images of Naturally Falling Hailstones Observed with High-Speed, High-Resolution Stereographic Cameras to Re-Examine Radar-Hail Relations Jeffrey C. Snyder</p> <p>2:30: 14A.5: Fine-Scale Hurricane Boundary Layer Structures Karen A. Kosiba</p> <p>2:45: 14A.6: Analyzing Downburst Precursors Using Automated Storm Identification and Polarimetric Radar Data Maci Nicole Gibson</p>	<p>Artificial Intelligence in Radar Meteorology II: Precipitation Estimation Techniques</p> <p>1:30: 14B.1: A Composite Method of Rainfall Rates for a Multi-Parameter Phased Array Weather Radar and XRAIN using Machine Learning Shota Ochi</p> <p>1:45: 14B.2: DEUCE: A Neural Network for Probabilistic Precipitation Nowcasting with Aleatoric and Epistemic Uncertainties Bent Ivan Oliver Harnist</p> <p>2:00: 14B.3: Interpretable Deep Learning for Polarimetric Radar Rainfall Estimation Haonan Chen</p> <p>2:15: 14B.4: U-Net Based Retrieval of Precipitation Microphysics from Polarimetric Weather Radar Data Junho Junho Ho</p> <p>2:30: 14B.5: A New Deep Learning Nowcast Model of Radar Imagery using Generative Adversarial Network for Operational Rainfall Nowcasting Ka-Hing Wong</p> <p>2:45: 14B.6: Assimilation of Latent Heating Profiles Inferred from Machine Learning Dominik Jacques</p>	1:30
3:00	PM Coffee Break/Formal Poster Viewing (Boundary Waters)		3:00
4:30	<p>Use of Radar Data for Numerical Weather Prediction and Analysis II: Innovations in Radar Data Assimilation</p> <p>4:30: 15A.1: Assimilating Retrieved Water Vapor and Radar Data from NCAR S-Pol-Ka: Performance and Validation Using Real Cases Nghi Thi Phuong Do</p> <p>4:45: 15A.2: Improving Short-term Precipitation Forecasting with Radar Data Assimilation and a Multiscale Hybrid Ensemble-Variational Strategy Juanzhen Sun</p> <p>5:00: 15A.3: Impact of Assimilating Multiple-Radar-Synthesized Three-Dimensional Winds and Retrieved Thermodynamic Fields Associated with Different Microphysical Schemes on Short-Term Rainfall Forecast in Mountainous Area Tzu Jui Chou</p> <p>5:15: 15A.4: Impact of Assimilating Radar Refractivity with Radial Wind and Reflectivity in the Context of Ensemble Kalman Filter Kao-Shen Chung</p>	<p>Signal/Data Processing Techniques for Radar III: Data Quality Control</p> <p>4:30: 15B.1: Radar Tracking of Quality Python Toolkit (RadTraQ) Adam Theisen</p> <p>4:45: 15B.2: A Novel Technique to Correct Debris Centrifuging Bias in Doppler Velocity Measurements of Tornadoes Morgan Schneider</p> <p>5:00: 15B.3: Demonstration Experiment of Advanced Inter-Radar Interference Suppression Method for X Band Weather Radar Network in Japan Tomomi Aoki</p> <p>5:15: 15B.4: Beam Blockage Correction for Improving Radar Data Quality Songjian Tan</p>	4:30
5:30	Sessions End for the Day		5:30

Friday, 1 September 2023			
	Great Lakes BC	Great Lakes A	
8:00	Severe Storms and Mesoscale Meteorology V: Quasi-Linear Convective Systems 8:00: 16A.1: Radar-Based Characteristics of Tornadoic and Nontornadoic QLCS Mesovortices during PERiLS Leanne Blind-Doskocil 8:15: 16A.2: Comparison of Dual Doppler Wind Retrievals with Detailed Wind Profiler Observations within High-Shear Environments during PERiLS Kevin Knupp 8:30: 16A.3: DSD Characteristics and Evolution of the Leading Stratiform Region of a Tornadoic QLCS during PERiLS-2022 IOP#2 (30 March 2022). Hamid Ali Syed 8:45: 16A.4: A Radar-Derived Synopsis of the Rapid Tornadogenesis in the 01 April 2023 Hazel Green, Alabama EF-3 Tornado Joshua L. Huggins 9:00: 16A.5: An Investigation Between Tornadoic and Non-Tornadoic QLCS Vortices using Blended MRMS Products Tyler James Pardun 9:15: 16A.6: Examining Thousands of Tornadoic and Nontornadoic MCS Cells Using Gridrad-Severe Amanda M. Murphy 9:30: 16A.7: Dual-Polarization Radar Signatures Associated with QLCS Mesovortices Charles M. Kuster 9:45: 16A.8: Developing a Climatology of Rotating Storms Using the MYRORSS Dataset Branden Katona	Quantitative Precipitation Estimation and Hydrology II: Multi-Platform QPE Applications and Improvements 8:00 16B.1: Analysis of Radar QPE for the 2021 Regional Flooding Events in Germany, Belgium, Luxembourg, and the Netherlands Edouard Goudenhoofdt 8:15: 16B.2: FLASH: From Radar Observations to Operational Flash Flood Forecasting Jonathan J. Gourley 8:30: 16B.3: Seasonal Variability within Quantitative Precipitation Estimates for the Surface Atmosphere Integrated Field Laboratory (SAIL) Field Experiment Joseph Robert O'Brien 8:45: 16B.4: A Localized Quantitative Precipitation Estimation for S-Band Polarimetric Radar in Taiwan Yu-Shuang Tang 9:00: 16B.5: Guiding the Improvement of the Global Precipitation Measurement Mission (GPM) with Radar Networks over France and USA Mountainous Regions Yagmur Derin 9:15: 16B.6: Assessment of Vertical Profile Correction for Quantitative Precipitation Estimation using S-band Radar in Northern Taiwan Wei-Yu Chang 9:30: 16B.7: Revisiting Polarimetric Signatures of Hail and Rainfall Estimation in the Presence of Hail Alexander V. Ryzhkov 9:45: 16B.8: Optimization of the Differential Phase Processing at Different Wavelengths Jiaxi Hu	8:00
10:00	Coffee Break (Great Lakes Promenade)		
10:30	QPE and Hydrology Quantitative Precipitation Estimation with Weather Radar: Discussion and Outlook (Invited Presentation) Pierre Kirstetter		10:30
11:00	Emerging Technology and Phased Arrays Airborne Phased Array Radar (APAR): The Next Generation of Airborne Polarimetric Doppler Weather Radar Everette David Joseph		11:00
11:30	Awards Ceremony		11:30
11:45	Closing Remarks		11:45
12:00	Conference Adjourns		12:00

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Great Lakes A
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Great Lakes A
Great Lakes A
Great Lakes A
Great Lakes A
Great Lakes

Presenter Index

Paper # Day Time				Paper # Day Time			
J				M (Continued)			
Jackson, R. C.	3B.3	Mon 2:00 PM	Great Lakes A	Marbouti, M.	137	Thu 3:00 PM	Boundary Waters
Jacques, D.	14B.6	Thu 2:45 PM	Great Lakes A	Matthews, A.	120	Tue 3:00 PM	Boundary Waters
Jacques, D.	168	Thu 3:00 PM	Boundary Waters	May, P. T.	16B.6A	Fri 9:15 AM	Great Lakes A
Jatau, P.	129	Thu 3:00 PM	Boundary Waters	May, P. T.	82	Tue 3:00 PM	Boundary Waters
Javornik, B.	135	Thu 3:00 PM	Boundary Waters	McMurdie, L. A.	5.1	Tue 8:00 AM	Great Lakes BC
Jensen, T. L.	166	Thu 3:00 PM	Boundary Waters	Medina, B. L.	41	Mon 3:00 PM	Boundary Waters
Johnson, M. R.	12A.7	Thu 9:30 AM	Great Lakes BC	Melnikov, V. M.	3B.5	Mon 2:30 PM	Great Lakes A
Jou, J. D.	V17	Wed 9:00 AM		Melnikov, V. M.	138	Thu 3:00 PM	Boundary Waters
K				Mendrok, J.	165	Thu 3:00 PM	Boundary Waters
Katona, B.	16A.8	Fri 9:45 AM	Great Lakes BC	Metcalf, J. I.	12	Mon 3:00 PM	Boundary Waters
Ke, C. Y.	157	Thu 3:00 PM	Boundary Waters	Michelson, D.	1.2	Mon 9:00 AM	Great Lakes BC
Kim, E.	134	Thu 3:00 PM	Boundary Waters	Michelson, D.	145	Thu 3:00 PM	Boundary Waters
Kim, H. L.	40	Mon 3:00 PM	Boundary Waters	Miller, E. M.	158	Thu 3:00 PM	Boundary Waters
Kim, K.	9A.7	Wed 9:30 AM	Great Lakes BC	Mirkovic, D.	64	Tue 3:00 PM	Boundary Waters
Kim, Y.	2A.4	Mon 11:15 AM	Great Lakes BC	Moureaux, M.	114	Tue 3:00 PM	Boundary Waters
Kim, Y.	83	Tue 3:00 PM	Boundary Waters	Mroz, K.	4B.2	Mon 4:45 PM	Great Lakes A
King, F.	13B.6	Thu 11:45 AM	Great Lakes A	Murin, M.	13B.1	Thu 10:30 AM	Great Lakes A
Kirstetter, P.	17.1	Fri 10:30 AM	Great Lakes BC	Murphy, A. M.	16A.6	Fri 9:15 AM	Great Lakes BC
Kitahara, D.	V15	Wed 9:00 AM		N			
Kitahara, D.	V16	Wed 9:00 AM		Nai, F.	3A.3	Mon 2:00 PM	Great Lakes BC
Klaus, V.	11A.4	Wed 2:15 PM	Great Lakes BC	Najman, M.	76	Tue 3:00 PM	Boundary Waters
Klotz, B.	6A.1	Tue 10:30 AM	Great Lakes BC	Navarrete Urrego, J. A.	V10	Wed 9:00 AM	
Knupp, K.	16A.2	Fri 8:15 AM	Great Lakes BC	Nelson, E.	12B.8	Thu 9:45 AM	Great Lakes A
Kollias, P.	12B.5	Thu 9:00 AM	Great Lakes A	Nesbitt, S. W.	6B.6	Tue 11:45 AM	Great Lakes A
Kosiba, K. A.	93	Tue 3:00 PM	Boundary Waters	Nguyen, C.	9	Mon 3:00 PM	Boundary Waters
Kosiba, K. A.	94	Tue 3:00 PM	Boundary Waters	O			
Kosiba, K. A.	14A.5	Thu 2:30 PM	Great Lakes BC	O'Brien, J. R.	16B.3	Fri 8:30 AM	Great Lakes A
Krause, J.	111	Tue 3:00 PM	Boundary Waters	Ochi, S.	14B.1	Thu 1:30 PM	Great Lakes A
Krause, J. M.	13A.4	Thu 11:15 AM	Great Lakes BC	Oh, Y. A.	119	Tue 3:00 PM	Boundary Waters
Kuo, K. S.	33	Mon 3:00 PM	Boundary Waters	Oude Nijhuis, A. C. P.	110	Tue 3:00 PM	Boundary Waters
Kurdzo, J. M.	48	Mon 3:00 PM	Boundary Waters	Oue, M.	V12	Wed 9:00 AM	
Kurdzo, J. M.	13B.3	Thu 11:00 AM	Great Lakes A	Oue, M.	8A.1	Tue 4:30 PM	Great Lakes BC
Kurdzo, J. M.	139	Thu 3:00 PM	Boundary Waters	P			
Kuster, C. M.	16A.7	Fri 9:30 AM	Great Lakes BC	Pabla, C. S.	49	Mon 3:00 PM	Boundary Waters
Kwon, S.	15	Mon 3:00 PM	Boundary Waters	Padmanabhan, T.	V5	Wed 9:00 AM	
L				Padmanabhan, T.	V6	Wed 9:00 AM	
Lackner, C.	177	Thu 3:00 PM	Boundary Waters	Palmer, R. D.	9B.4	Wed 8:45 AM	Great Lakes A
Ladino, A.	4B.3	Mon 5:00 PM	Great Lakes A	Pan, X.	13B.4	Thu 11:15 AM	Great Lakes A
LaFleur, A.	12A.6	Thu 9:15 AM	Great Lakes BC	Pardun, T. J.	16A.5	Fri 9:00 AM	Great Lakes BC
Lamer, K.	127	Thu 3:00 PM	Boundary Waters	Peters, M.	182	Thu 3:00 PM	Boundary Waters
Lan, C. H.	24	Mon 3:00 PM	Boundary Waters	Posselt, D. J.	2B.6	Mon 11:45 AM	Great Lakes A
Lee, C. L.	28	Mon 3:00 PM	Boundary Waters	Posselt, D. J.	8	Mon 3:00 PM	Boundary Waters
Lee, G.	35	Mon 3:00 PM	Boundary Waters	Protat, A.	13A.1	Thu 10:30 AM	Great Lakes BC
Lee, J. E.	95	Tue 3:00 PM	Boundary Waters	R			
Lee, J. W.	160	Thu 3:00 PM	Boundary Waters	Radhakrishnan, C.	152	Thu 3:00 PM	Boundary Waters
Lee, W. C.	6A.5	Tue 11:30 AM	Great Lakes BC	Ramanamahefa, A. V.	V4	Wed 9:00 AM	
Leifer, M.	3A.2	Mon 1:45 PM	Great Lakes BC	Ramirez, Y. M. B.	60	Mon 3:00 PM	Boundary Waters
Lengfeld, K.	13A.2	Thu 10:45 AM	Great Lakes BC	Reinhart, A. E.	9B.1	Wed 8:00 AM	Great Lakes A
Li, A.	23	Mon 3:00 PM	Boundary Waters	Reinke, R. J.	3A.1	Mon 1:30 PM	Great Lakes BC
Li, H. K.	6B.3	Tue 11:00 AM	Great Lakes A	Richardson, L.	112	Tue 3:00 PM	Boundary Waters
Li, L.	3	Mon 3:00 PM	Boundary Waters	Richter, J. R.	174	Thu 3:00 PM	Boundary Waters
Liang, X.	159	Thu 3:00 PM	Boundary Waters	Rivelli-Zea, L. E.	36	Mon 3:00 PM	Boundary Waters
Liao, L.	12B.4	Thu 8:45 AM	Great Lakes A	Roberts, R. D.	13A.3	Thu 11:00 AM	Great Lakes BC
Liernur, A.	56	Mon 3:00 PM	Boundary Waters	Rodriguez Monje, R.	12B.3	Thu 8:30 AM	Great Lakes A
Liou, Y. C.	156	Thu 3:00 PM	Boundary Waters	Romano, P. F.	179	Thu 3:00 PM	Boundary Waters
Liu, C.	16	Mon 3:00 PM	Boundary Waters	Romatschke, U.	6A.2	Tue 10:45 AM	Great Lakes BC
Liu, P.	12A.3	Thu 8:30 AM	Great Lakes BC	Rowe, A.	3B.1	Mon 1:30 PM	Great Lakes A
Liu, Y.	12A.5	Thu 9:00 AM	Great Lakes BC	Roy, R.	12B.7	Thu 9:30 AM	Great Lakes A
Lo, C. H. B.	3B.6	Mon 2:45 PM	Great Lakes A	Rygllicki, D.	132	Thu 3:00 PM	Boundary Waters
Lo, C. H. B.	90	Tue 3:00 PM	Boundary Waters	Ryzhkov, A. V.	16B.7	Fri 9:30 AM	Great Lakes A
Loeffler, S.	25	Mon 3:00 PM	Boundary Waters	S			
Loeffler, S.	96	Tue 3:00 PM	Boundary Waters	Salazar, C. M.	3A.6	Mon 2:45 PM	Great Lakes BC
LOH, J. L.	109	Tue 3:00 PM	Boundary Waters	Salazar, C. M.	118	Tue 3:00 PM	Boundary Waters
LOH, J. L.	11B.5	Wed 2:30 PM	Great Lakes A	Salazar, J. L.	62	Tue 3:00 PM	Boundary Waters
Louf, V.	10B.4	Wed 11:15 AM	Great Lakes A	Sandmael, T.	13B.2	Thu 10:45 AM	Great Lakes A
Luke, E.	3A.5	Mon 2:30 PM	Great Lakes BC	Santillo, J.	115	Tue 3:00 PM	Boundary Waters
Lyza, A.	106	Tue 3:00 PM	Boundary Waters	M			
M				Maesaka, T.	63	Tue 3:00 PM	Boundary Waters
Maherndl, N.	2B.2	Mon 10:45 AM	Great Lakes A	Majewski, A.	6A.4	Tue 11:15 AM	Great Lakes BC

Paper # Day Time				Paper # Day Time			
S (Continued)				V (Continued)			
Satrio, M.	7A.4	Tue	2:15 PM	Great Lakes BC			
Scharbach, T.	12A.8	Thu	9:45 AM	Great Lakes BC	19	Mon	3:00 PM
Schneider, M.	102	Tue	3:00 PM	Boundary Waters	143	Thu	3:00 PM
Schneider, M.	15B.2	Thu	4:45 PM	Great Lakes A			
Schrom, R.	2B.5	Mon	11:30 AM	Great Lakes A			
Schueth, A.	7A.1	Tue	1:30 PM	Great Lakes BC			
Schuur, T. J.	9B.2	Wed	8:15 AM	Great Lakes A			
Schvartzman, D.	61	Tue	3:00 PM	Boundary Waters			
Shah, N. H.	162	Thu	3:00 PM	Boundary Waters			
Sharma, M.	6B.2	Tue	10:45 AM	Great Lakes A			
Shedd, L.	71	Tue	3:00 PM	Boundary Waters			
Shedd, L.	14A.1	Thu	1:30 PM	Great Lakes BC			
Sherman, Z.	10B.5	Wed	11:30 AM	Great Lakes A			
Shimizu, R.	4B.4	Mon	5:15 PM	Great Lakes A			
Shin, K.	26	Mon	3:00 PM	Boundary Waters			
Simpson, M.	10B.6	Wed	11:45 AM	Great Lakes A			
Snyder, J. C.	91	Tue	3:00 PM	Boundary Waters			
Snyder, J. C.	97	Tue	3:00 PM	Boundary Waters			
Snyder, J. C.	14A.4	Thu	2:15 PM	Great Lakes BC			
Southward, S. J.	99	Tue	3:00 PM	Boundary Waters			
Stechman, D. M.	7A.2	Tue	1:45 PM	Great Lakes BC			
Stechman, D. M.	104	Tue	3:00 PM	Boundary Waters			
Stein, T. H. M.	6B.4	Tue	11:15 AM	Great Lakes A			
Stouffer, B.	6B.1	Tue	10:30 AM	Great Lakes A			
Stough, S. M.	10A.1	Wed	10:30 AM	Great Lakes BC			
Sun, J.	146	Thu	3:00 PM	Boundary Waters			
Sun, J.	15A.2	Thu	4:45 PM	Great Lakes BC			
Sun, K.	81	Tue	3:00 PM	Boundary Waters			
Suzuki, K.	11B.4	Wed	2:15 PM	Great Lakes A			
Swinney, L. M.	87	Tue	3:00 PM	Boundary Waters			
Syed, H. A.	16A.3	Fri	8:30 AM	Great Lakes BC			
T				W			
Takahashi, N.	1	Mon	3:00 PM	Boundary Waters			
Takahashi, N.	9B.3	Wed	8:30 AM	Great Lakes A			
Tan, S.	15B.4	Thu	5:15 PM	Great Lakes A			
Tanamachi, R.	50	Mon	3:00 PM	Boundary Waters			
Tanamachi, R.	4A.3	Mon	5:00 PM	Great Lakes BC			
Tang, L.	8A.2	Tue	4:45 PM	Great Lakes BC			
Tang, Y. S.	16B.4	Fri	8:45 AM	Great Lakes A			
Tao, Z.	161	Thu	3:00 PM	Boundary Waters			
Teshiba, M.	155	Thu	3:00 PM	Boundary Waters			
Theisen, A.	136	Thu	3:00 PM	Boundary Waters			
Theisen, A.	15B.1	Thu	4:30 PM	Great Lakes A			
Thurai, M.	11B.3	Wed	2:00 PM	Great Lakes A			
Tokay, A.	176	Thu	3:00 PM	Boundary Waters			
Torres, S. M.	7B.3	Tue	2:00 PM	Great Lakes A			
Tridon, F.	V13	Wed	9:00 AM				
Troemel, S.	12A.1	Thu	8:00 AM	Great Lakes BC			
Tuftedal, K.	105	Tue	3:00 PM	Boundary Waters			
Tunde, A.	30	Mon	3:00 PM	Boundary Waters			
Tzeng, M. D.	10A.4	Wed	11:15 AM	Great Lakes BC			
U				X			
Ueki, A.	113	Tue	3:00 PM	Boundary Waters			
V				Y			
Van Baelen, J.	4A.4	Mon	5:15 PM	Great Lakes BC			
Van Den Heever, S. C.	1.1	Mon	8:30 AM	Great Lakes BC			
VanAlstine, A.	101	Tue	3:00 PM	Boundary Waters			
VanAlstine, A.	14A.3	Thu	2:00 PM	Great Lakes BC			
Verdelho, F.	V7	Wed	9:00 AM				
Viteri Lopez, A. S.	125	Thu	3:00 PM	Boundary Waters			
Vivekanandan, J.	65	Tue	3:00 PM	Boundary Waters			
V (Continued)				W			
von Lerber, A.				Wada, T.	163	Thu	3:00 PM
von Lerber, A.				Wakimoto, R. M.	11A.3	Wed	2:00 PM
				Walker McLinden, M.	4	Mon	3:00 PM
				Wang, J.	170	Thu	3:00 PM
				Wang, J.	51	Mon	3:00 PM
				Wang, S.	10A.3	Wed	11:00 AM
				Ward, K.	88	Tue	3:00 PM
				Warde, D. A. Sr.	121	Tue	3:00 PM
				Warde, D. A. Sr.	122	Tue	3:00 PM
				Weiss, C. C.	7A.3	Tue	2:00 PM
				Wendler, T.	108	Tue	3:00 PM
				Werner, C. G.	107	Tue	3:00 PM
				Wijekularatne, R.	V9	Wed	9:00 AM
				Williams, C. R.	5	Mon	3:00 PM
				Williams, C. R.	11B.6	Wed	2:45 PM
				Wilson, J.	1.3	Mon	9:30 AM
				Wong, K. H.	14B.5	Thu	2:30 PM
				Wugofski, S.	31	Mon	3:00 PM
				Wugofski, S.	181	Thu	3:00 PM
				Wurman, J.	7A.6	Tue	2:45 PM
				Wurman, J.	68	Tue	3:00 PM
				Wurman, J.	69	Tue	3:00 PM
X				Y			
Xu, F.				Yang, J.	39	Mon	3:00 PM
				Ying Wa, C.	92	Tue	3:00 PM
				Yu, L. N.	13	Mon	3:00 PM
				Yu, T. Y.	43	Mon	3:00 PM
				Yu, T. Y.	70	Tue	3:00 PM
				Yu, T. Y.	9B.5	Wed	9:00 AM
Z				Z			
				Zaremba, T. J.	9A.2	Wed	8:15 AM
				Zaremba, T. J.	172	Thu	3:00 PM
				Zhang, J.	141	Thu	3:00 PM
				Zhang, P.	52	Mon	3:00 PM
				Zhang, P.	53	Mon	3:00 PM
				Zhang, S.	2B.4	Mon	11:15 AM
				Zhu, Z.	27	Mon	3:00 PM
				Zhuang, B. X.	12A.2	Thu	8:15 AM
				Zrnica, D. S.	7B.2	Tue	1:45 PM

40th Conference on Radar Meteorology
28 August – 01 September 2023
Minneapolis, MN and Online

The program organizers would like to acknowledge the following for their contributions to the 40th Conference on Radar Meteorology.

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40th Conference on Radar Meteorology
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AMS Student Travel Grant Recipients

Oluwafemi Omitusa

Konnor Stump

RADAR METEOROLOGY CONFERENCE SERIES

DATE	LOCATION	CONFERENCE NAME
March 1947	Cambridge, MA	(First) Conference on Radar Meteorology
October 1951	Urbana, IL	Second Conference on Radar Meteorology
September 1952	Montreal, PQ, Canada	Third International Conference on Radar Meteorology
November 1953	Austin, TX	Fourth Conference on Radar Meteorology
12-15 September 1955	Asbury Park, NJ	Fifth Conference on Radar Meteorology
26-28 March 1957	Cambridge, MA	Sixth Conference on Radar Meteorology
17-20 November 1958	Miami Beach, FL	Seventh Conference on Radar Meteorology
11-14 April 1960	San Francisco, CA	Eighth Conference on Radar Meteorology
23-26 October 1961	Kansas City, MO	Ninth Conference on Radar Meteorology
22-25 April 1963	Washington, D.C.	10 th Conference on Radar Meteorology
14-18 September 1964	Boulder, CO	11 th Conference on Radar Meteorology
17-20 October 1966	Norman, OK	12 th Conference on Radar Meteorology
20-23 August 1968	Montreal, PQ, Canada	13 th International Conference on Radar Meteorology
17-21 November 1970	Tucson, AZ	14 th Conference on Radar Meteorology
10-12 October 1972	Champaign-Urbana, IL	15 th Conference on Radar Meteorology
22-24 April 1975	Houston, TX	16 th Conference on Radar Meteorology
25-29 October 1976	Seattle, WA	17 th Conference on Radar Meteorology
28-31 March 1978	Atlanta, GA	18 th Conference on Radar Meteorology
15-18 April 1980	Miami Beach, FL	19 th Conference on Radar Meteorology
30 Nov.-3 Dec. 1981	Boston, MA	20 th Conference on Radar Meteorology
19-23 September 1983	Edmonton, AB, Canada	21 st International Conference on Radar Meteorology
10-14 September 1984	Zurich, Switzerland	22 nd International Conference on Radar Meteorology
22-26 September 1986	Snowmass, CO	23 rd Conference on Radar Meteorology
9-13 November 1987	Boston, MA	24 th Conference on Radar Meteorology
24-28 June 1991	Paris, France	25 th International Conference on Radar Meteorology
24-28 May 1993	Norman, OK	26 th Conference on Radar Meteorology
9-13 October 1995	Vail, CO	27 th Conference on Radar Meteorology
7-12 September 1997	Austin, TX	28 th Conference on Radar Meteorology
12-16 July 1999	Montreal, PQ, Canada	29 th International Conference on Radar Meteorology
19-24 July 2001	Munich, Germany	30 th International Conference on Radar Meteorology
6-12 August 2003	Seattle, WA	31 st Conference on Radar Meteorology

24–29 October 2005	Albuquerque, NM	32 nd Conference on Radar Meteorology
6–10 August 2007	Cairns, Australia	33rd Conference on Radar Meteorology
5–9 October 2009	Williamsburg, VA	34th Conference on Radar Meteorology
26–30 September 2011	Pittsburgh, PA	35th Conference on Radar Meteorology
16–20 September 2013	Breckenridge, CO	36 th Conference on Radar Meteorology
14–18 September 2015	Norman, OK	37 th Conference on Radar Meteorology
28 August–1 September 2017	Chicago, IL	38 th Conference on Radar Meteorology
16–20 September 2019	IRAKA, Nara, Japan	39th International Conference on Radar Meteorology
28 August–01 September 2023	Minneapolis, MN	40 th Conference on Radar Meteorology

FLOOR PLAN
Fourth Floor Meeting Rooms

