

The New Wave

September 2025 Edition



We hope everyone had a great summer and that you were able to spend quality time with family and friends. This is our first edition of *The New Wave* following our summer break.

Our incoming President Pat McCarthy introduces himself in the President's Welcome that can be accessed here. We feature a special section this month related to the joint CMOS-CGU congress 2025 held in Saskatoon and the plans for Congress 2026, as well as the announcement concerning the release of a report on The Future of Hydrological and Meteorological Services in Canada that was compiled by the Canadian Council of the Academies.

All CMOS members are automatically subscribed to *The New Wave*. However, if you wish to opt out at any time, simply click the unsubscribe link at the bottom of the newsletter.

We would like to hear from you! Please send any suggestions, comments or constructive criticisms

Events

CMOS/CGU Joint Congress 2025 - Results

The May 25 - 29, 2025 congress was held at TCU Place in Saskatoon, SK. Participation included: 85 virtually and 346 in person for a total of 431. 161 members of CMOS and 190 members of CGU participated. Approximately 145 students attended and about 200 participants were first time participants. The CMOS archives contains a <u>summary of the program and abstracts</u> and a <u>collection of photos</u> from the congress.

Highlights of the Congress included a panel discussion on Enhancing Collaboration for Weather Preparedness in Canada. Chaired by Jim Abraham CMOS Past-President, the panel included Doris Fortin – Director General of Policy, Partnership and Planning at the Meteorological Service of Canada; Scott Kehler – CMOS Councillor and President and Chief Scientist at Weatherlogics; Peter Quinlan – Meteorologist at Global News in Saskatoon; and Julie Mireille Thériault – CMOS Councillor and Professor at UQAM's Earth and Atmospheric science department. The weather enterprise was framed as a triangle of public sector agencies, private sector companies, and academic institutions, with increasing recognition of the role of media, NGOs, and community stakeholders. The session concluded with strong encouragement for tangible next steps:

- Initiate new conversations across the public, private, academic, and community sectors.
- Engage students and early-career professionals in real-world, cross-sectoral projects.
- Advocate for meteorological science in public policy, funding strategies, and national resilience agendas.
- Design inclusive partnerships that bring in diverse voices—from climate researchers to community advocates to the general public.

Additionally, a student mentoring lunch resulted in a packed room with lively conversations all around as CMOS and CGU members shared their career experiences with students from across the country.

The summary of the participant survey results are available from English participants and French
participants. While response was fairly low compared to the number of attendees, the majority of respondents were virtual attendees who noted issues with the mechanics of online attendance which is leading the CMOS Council to rethink the hybrid model for future Congresses. Notably, the survey reflected the importance of this annual event to members as a venue to meet with colleagues and share

the latest knowledge in the fields of meteorology and oceanography.

Plans for CMOS Congress 2026

The 60th CMOS Congress will be held virtually during the first week of June 2026. The event will be coordinated by a national group composed of members from various regions, rather than by a specific center or region. Part of this group will also contribute to the achievement of the strategic objective of scientific excellence, in accordance with the current strategic plan.

The organization of the virtual congress is currently focused on optimizing the time dedicated to parallel sessions. To date, two options are being considered: 1) a block of competing scientific presentations lasting 60 minutes, instead of the usual 90-minute format; 2) the introduction of a block of very short oral presentations, favoring the summary presentation of research. Participants in this "flash" format would choose between a 5-minute oral presentation or a poster session accompanied by a 2-minute promotional oral presentation.

The group will meet on Friday, September 12, to finalize the selection of the theme and dates for the congress. It will also begin the process of issuing a call for sessions for the October-November period and the call for abstracts for the January-February period.

Stay tuned for further details

Recent Events

A look back at the latest happenings! From conferences, seminars, and publications to exciting international events, catch up on key moments, insights, and takeaways from recent events relevant to the CMOS community.

- Adapting to a drier world in a changing climate: <u>Launch of the OECD Global Drought Outlook</u>
- Tomorrow's Weather: AMS Presidents on the Challenges and Opportunities Facing the Weather Enterprise: https://www.youtube.com/watch?v=to0jokEXbY0
- Two recently published videos shed light on Destination Earth (DestinE) by examining key elements of its development – the ESA Use Cases and the Community. https://destination-earth-use-cases-and-community-explained/
- MEOPAR WEBINAR SERIES REPORT: <u>Canadian Perspectives and Pathways for Ocean-Based</u> <u>Climate Interventions JULY 8</u>, 2024:

An international, peer-reviewed publication released each summer, the State of the Climate is
the authoritative annual summary of the global climate published as a supplement to
the Bulletin of the American Meteorological Society.

Upcoming Events

- CMOS Toronto Centre Seminar <u>Climate Services for Health Protection in a Warming World</u> Dr.
 Peter Berry. September 16, 2025
- Understanding Federally Identified Flood Risk Areas (FIFRA): Context, Purpose, and Implementation - CWRA Sep 17, 2025
- CMOS Ottawa Centre Seminar: On Thursday September 25th, Dr. Wayne Jenkinson, DG,
 National Hydrological Service (NHS) will speak on national innovation, impact, and improved water data Dr. Wayne Jenkinson. September 25, 2025.
- 37th International Conference on Alpine Meteorology (ICAM) | 29th September 3rd October 2025 | Valamar Diamant Hotel, Poreč, Croatia.
- Royal Meteorological Society virtual Master Class; <u>Tropical Meteorology</u> by Doug Parker.
 October 1, 2025
- Climate Change and Environment Conference 2025 hosted by the Geneva Association: Investing
 in Adaptation and Local Resilience (virtual) Oct 29, 2025:
 - https://www.genevaassociation.org/events/climate-change-environment-conference-2025
- 6th Symposium of the Committee on Space Research (COSPAR): <u>Space Exploration 2025: A</u>
 <u>Symposium on Humanity's Challenges and Celestial Solutions</u>. November 3 7, 2025 Nicosia,
 Cyprus
- Ocean Sciences Meeting in Glasgow, Scotland. <u>The Ocean Sciences Meeting (OSM)</u> is the flagship conference for the ocean sciences and the larger ocean-connected community. February 22-27, 2026 Glasgow Scotland

Previews & Updates

Canadian Council of the Academies' Report on the Future of Hydrological and Meteorological Services in Canada

In early 2025, the Meteorological Service of Canada (MSC) asked the Canadian Council of the Academies (CCA) to examine the essential functions of a public hydro-meteorological service and how they could be adapted to keep pace with growing demands. The report *The Future of Hydrological and Meteorological Services in Canada* (released on Sept 11, 2025) considers how the MSC could support leadership and coordination both at home and abroad and better engage users.

Canada's weather service is at a crossroads as Artificial Intelligence (AI), climate change, and geopolitics are reshaping the landscape. Financial constraints are also putting pressure on the weather service to adapt. The panel determined that strengthening and diversifying domestic and international partnerships will help resist fragmentation of services and improve the end-to-end resilience of forecasts and warnings. AI has the potential to drastically change the way weather predictions are made. At the same time, it is essential that the MSC continue to provide and maintain Canada's backbone infrastructure, such as a country-wide observation system and modelling capabilities, which remain critical to Canada's weather enterprise and climate change adaptation strategy.

By embracing standards, building partnerships, and taking a stronger leadership role where needed, the MSC can leverage its resources to maximize efficiency and return on investment while protecting Canadian sovereignty, safety, and prosperity.

The Future of Hydrological and Meteorological Services in Canada can be downloaded at www.cca-reports.ca.

Bulletin & A-O Previews

CMOS will be looking for a new **Director of Publications**. An updated description of this position will be posted on the <u>career section</u> of the website soon.

CMOS will also be looking for a new **CMOS Bulletin Editor**. An updated description of this role will be posted on the <u>career section</u> of the website soon.

Council & Executive Matters

Annual General Meeting

The Annual General Meeting was held virtually on June 19, 2025. The <u>Annual Review</u> summarizes all the Society activities from 2024. The <u>draft minutes</u> detail all the decisions made.

The membership approved a new membership category, early career professional and the awarding of

a fellowship to Dr. Susan Allen.

New Council Members

CMOS Council welcomed three new <u>councillors-at-large</u> during the AGM: Polina Erofeeva, Xander Wang and Jim Abraham (Jim transitioned from the Executive Committee to Council). Special thanks were shared with Ada Loewen and Emily MacPherson for their time and commitment on Council over the past four years.

Committee News

The **School and Public Education Committee (SPEC)** is in search of a new chair. The terms of reference for the committee are found here. CMOS needs someone to help promote meteorology, oceanography and climate change activities to the next generations. Please email the Executive Director if you are interested, exec-dir@cmos.ca.

Centres' Updates

Winnipeg Centre gave a weather talk to kindergarten kids at the Carpenters Montessori School in the city. Lots of weather stories, bubbles, balloons, weather instruments, etc. kept the kids entertained. Next year, Puppets!

(Photo below, courtesy of the Carpenters Montessori School)



The annual Winnipeg weather office golf tournament was held in July. The tournament has been held for twenty years. Over 40 participants from the Prairie Storm Prediction Centre, DND weather school, Water Survey, Northern Operation, Shared Services and retired staff. It was another great event. Five CMOS members participated.

(photo below of the 5 Winnipeg CMOS members - Left to right, Pat McCarthy, Kyle Ziolkowski, Dan Fulton, Brad Vrolijk and Keane Kokolsky)



News Items

This section brings you curated articles on recent severe events, cutting-edge research, and ongoing developments over the past couple of months. Reports and impacts of the wildfire situation in Canada dominated the summer's news and reports and reactions to the US reductions to science funding continued. Increasing use of Artificial Intelligence in Earth Sciences also continues to be in the news. This edition features some of the more interesting articles from the entire period since our last publication in June.

- •
- Harinder Ahluwalia Honoured by AMS
- Canada wildfire season already second worst on record as experts warn of 'new reality
- Le Canada vit une des pires saisons des feux de son histoire : la nouvelle norme?
- Canada's election: what Mark Carney's win means for science
- Scientific societies say they'll step up after Trump puts key climate report in doubt
- Une équipe de McGill veut défendre la science contre les menaces de Trump

- Why the US government is trying to revive the climate change 'debate'
- Costs for climate disasters to reach \$145B in 2025, says Swiss Re
- Satellite Monitoring Reveals Offshore Oil Pollution Hotspots
- Climat: le blanchissement mondial des coraux bat record sur record
- A.I. Is Quietly Powering a Revolution in Weather Prediction
- L'intelligence artificielle pour se préparer aux catastrophes climatiques
- N.W.T. fire officials warn of Al-generated images, misinformation circulating online
- Climate crisis has tripled length of deadly ocean heatwaves, study finds
- It's challenging to predict extreme thunderstorms improving this will help reduce their deadly and costly impacts
- Saltier, hotter & fast losing ice: Dramatic shift for Southern Ocean
- Ocean acidification the 'ticking time bomb' worse than first feared
- American Meteorological Society Responds to DOE Climate Synthesis Report



