

DAVID H. BROMWICH

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5 May 2026

Education:

Ph.D. Meteorology, University of Wisconsin, Madison, 1979

M.Sc. Meteorology, University of Melbourne, Australia, 1976

Diploma of Meteorology, Bureau of Meteorology, Australia, 1971

B.Sc. Honours, Physics, University of Sydney, Australia, 1969

Work Experience:

2017-present Research Professor, Atmospheric Sciences Program, Department of Geography.

2003- 2016 Professor, Atmospheric Sciences Program, Department of Geography. Classes taught: Introduction to Atmospheric Science, Climate System Modeling, Introduction to Climatology, Mesoscale Numerical Weather Prediction, Polar Meteorology and Climatology, and Satellite Meteorology.

1998- 2003 Associate Professor, Atmospheric Sciences Program, Department of Geography.

1993-present Head of Polar Meteorology Group of the Byrd Polar Research Center. Direct and support 3 Ph.D. and 1 M.S. staff members, and 3 Ph.D. students (as of 4/30/26).

1979-present Senior Research Scientist, Research Scientist, Senior Research Associate, Research Associate and Postdoctoral Fellow with the Byrd Polar Research Center. Research specialty: polar meteorology and climatology.

Recognitions and Awards:

Fellow, Royal Meteorological Society, FRMetS, 2019 onward.

AGU Editor's Citation for Excellence in Refereeing, JGR-Atmospheres, 2017, 2019.

Fellow, American Association for the Advancement of Science (AAAS), 2015

Distinguished University Scholar, The Ohio State University, 2005

Antarctic Place Name Recognition, Bromwich Terrace, Antarctica, 2001

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Selected Refereed Publications:

- 2026 **Bromwich, D. H.**, X. Zou, and S.-H. Wang: Interior Antarctica is undergoing marked climate change. *Commun. Earth Environ.*, in press, <https://doi.org/10.1038/s43247-026-03384-4>
- 2026 Hines, K. M., P. M. Rowe, I. Gorodetskaya, A. Chyhareva, **D. H. Bromwich**, M. Fontolan-Litell, S.-H. Wang, S. Krakovska, C. Duran-Alarcon, and R. A. Stillwell. Skillful Polar WRF cloud modeling of a warm winter Atmospheric River at the Antarctic Peninsula. *J. Geophys. Res. Atmos.*, **131**, e2024JD043239. <https://doi.org/10.1029/2024JD043239>
- 2026 Justino, F., **D. H. Bromwich**, and C. Gurjao: Atmospheric rivers as mediators between climate teleconnections and burned area variability in North America. *Commun. Earth Environ.*, **7**, 99, <https://doi.org/10.1038/s43247-025-03124-0>.
- 2026 Rakoczy, B. C., **D. H. Bromwich**, and S.-H. Wang: Evaluation of ERA5 Near-Surface Winds Over Antarctica: Spatial Variability, Biases, and Large-Scale Influences. *J. Climate*, doi: 10.1175/JCLI-D-25-0215.1
- 2026 Zou, X., F. M. Ralph, **D. H. Bromwich**, S. T. Gille, I. V. Gorodetskaya, M. R. Mazloff, D. Lubin, I. Cerovečki, R. Sun, J. D. Wille, and Z. Zhang: Antarctica's uncertain future: global sea-level rise from oceanic and atmospheric forcing, with a focus on atmospheric rivers. *Front. Earth Sci.*, **14**, 1761959, doi: 10.3389/feart.2026.1761959
- 2025 **Bromwich, D. H.**, S. D. Shuvo, A. D. Kennedy, L.S. Bai, A. Szczepanski, J. P. Nicolas, and T. Kurtz, Simulating the 12 February 2020 North Dakota Blizzard: An application of a blowing snow algorithm coupled with the Polar Weather Research and Forecasting Model. *J. Geophys. Res. Atmos.*, **130**, e2025JD043735, <https://doi.org/10.1029/2025JD043735SS>
- 2025 **Bromwich, D. H.**, S.-H. Wang, X. Zou, and A. Ensign: An Updated Reconstruction of Antarctic Near- Surface Air Temperatures at Monthly Intervals Since 1958. *Earth System Science Data (ESSD)*, **17**, 2953–2962, <https://doi.org/10.5194/essd-17-2953-2025>
- 2025 Deb, P., **D. H. Bromwich**, A. Orr, A. Sen, and K. R. Clem, 2025: Recent increase in surface melting of West Antarctic ice shelves linked to Interdecadal Pacific Oscillation. *Commun. Earth. Environ.*, **6**, 99, <https://doi.org/10.1038/s43247-025-02077-8>
- 2025 Jung, T., J. Wilson, E. Bazile, **D. Bromwich**, B. Casati, J. Day, E. De Coning, C. Eayrs, O. Godoy, H. Goessling, R. Grumbine, V. J. Heinrich, J. Inoue, S. J. S. Khalsa, J. Kristiansen, M. Lamers, D. Liggett, S. M. Olsen, D. Perovich, I. A. Renfrew, I. Sandu, M. D. Shupe, V. Smolyanitsky, G. Svensson, Q. Sun, T. Uttal, K. Werner, and Q. Yang: The Year of Polar Prediction (YOPP): Achievements, impacts and lessons learnt. *Bull. Amer. Meteor. Soc.*, **106**, E2519–E2543, <https://doi.org/10.1175/BAMS-D-23-0226.1>
- 2023 Ban, J., Z. Liu, **D. H. Bromwich**, and L. Bai: Improved regional forecasting of an extreme Arctic cyclone in August 2016 with WRF MRI-4DVAR. *Q. J. R. Meteorol. Soc.*, **149**, 3490-3512, <https://doi.org/10.1002/qj.4569>