

September 2021

Courtney Schumacher

Department of Atmospheric Sciences, Texas A&M University
3150 TAMU, 1204 Eller O&M Bldg
College Station, TX 77843-3150

cschu@tamu.edu

<https://atmo.tamu.edu/people/profiles/faculty/schumachercourtney>

Education

2003	Ph.D.	Atmospheric Sciences	University of Washington
2000	M.S.	Atmospheric Sciences	University of Washington
1994	B.A.	Environmental Sciences	University of Virginia

Professional Experience

Fall 2013-present	Professor, Texas A&M University, College Station TX
Fall 2009-Summer 2013	Associate Professor, Texas A&M University, College Station TX
Fall 2003-Summer 2009	Assistant Professor, Texas A&M University, College Station TX

Awards and Fellowships

2019	Fellow of the American Meteorological Society
2016-present	Texas A&M University E.D. Brockett Professorship in Geosciences
2015	AMS Editor's Award for <i>Journal of Climate</i>
2014	AMS Clarence Leroy Meisinger Award
2012	AGU Editors' Citation for Excellence in Refereeing for <i>Eos</i>
2011	Texas A&M Association of Former Students Distinguished Teaching Award
2009	Special Recognition by Texas A&M Women Former Students' Network
2008	College of Geosciences Dean's Distinguished Faculty Teaching Award
2007	College of Geosciences Robert C. Runnels Excellence in Advising Award
2007	Texas A&M University Fish Camp Namesake
2006	NASA New Investigator Program Award
2005	NSF CAREER Award
2004	NASA Goddard Space Flight Center (GSFC) Summer Faculty Fellowship
2001-3	NASA Earth System Science Graduate Fellowship

Field Program Experience

2018-19	NOAA Years of the Maritime Continent (YMC), Sumatra, Indonesia
2014-15	DOE Green Ocean Amazon (GoAmazon2014/5), Manacapuru, Brazil
2011-12	NSF DYNAMO/JAMSTEC CINDY2011/DOE AMIE, Addu Atoll, Maldives
2006	DOE Tropical Warm Pool-International Cloud Experiment (TWP-ICE), Darwin, Australia
1999	NASA Kwajalein Experiment (KWAJEX), Kwajalein, Marshall Islands
1997	NOAA Tropical Eastern Pacific Process Study (TEPPS), 8N, 125W

Professional Memberships

2009-present	National Weather Association
2002-present	American Geophysical Union
2001-present	American Meteorological Society

Publications (* indicates student/post-doc I have advised)

In review

- [5] Bai, H.*, and **C. Schumacher**, 2021: Topographic influences on diurnally driven MJO rainfall over the Maritime Continent. *J. Geophys. Res.*, submitted.
- [4] Huaman, L.*, **C. Schumacher**, A. Fink, and E. Buttitta*, 2021: Diurnal variation of meridional flow and rainfall over West African during the pre-monsoon and monsoon seasons. *J. Geophys. Res.*, submitted.
- [3] Wang, J.*, R. K. W. Wong, M. Jun, **C. Schumacher**, R. Saravanan, and C. Sun, 2021: Statistical and machine learning methods applied to the prediction of different tropical rainfall types. *Envi. Res. Comm.*, submitted.
- [2] Tai, S., Z. Feng, P. Ma, **C. Schumacher**, and J. Fast, 2021: Diurnal cycle of precipitation in the Amazon: Contrasting observationally constrained cloud-system resolving and global climate models. *JAMES*, submitted.
- [1] Tang, S. and coauthors, 2021: Long-term single-column model intercomparison on the diurnal cycle of precipitation over midlatitude and tropical land. *Quart. J. Roy. Meteor. Soc.*, submitted.

Published/in-press

- [70] Huaman, L.*, E. Maloney, **C. Schumacher**, and G. Kiladis, 2021: Easterly waves in the East Pacific during the OTREC 2019 field campaign. *J. Atmos. Sci.*, accepted.
- [69] Bai, H.*, and **C. Schumacher**, 2021: The interaction between the nocturnal Amazonian low-level jet and convection in CESM. *J. Climate*, accepted.
- [68] Riley-Dellaripa, E. M., A. Funk, **C. Schumacher**, H. Bai*, and T. Spanghel, 2021: Adapting the COSP radar simulator to compare GCM output and GPM precipitation radar observations. *J. Atmos. Ocean Tech.*, doi: 10.1175/JTECH-D-20-0089.1.
- [67] Maupin, C. R., E. B. Roark, K. Thirumalai, C.-C. Shen, **C. Schumacher**, S. Van Kampen-Lewis, A. L. Housson, C. L. McChesney, O. Baykara, J. Chou, K. White IV, and J. W. Partin, 2021: Abrupt glacial variability of Southern Great Plains storms. *Nat. Geosci.*, doi:10.1038/s41561-021-00729-w.
- [66] Etten-Bohm, M.*, J. Yang*, **C. Schumacher**, M. Jun, 2021: Evaluating the relationship between lightning and the large-scale environment and its use for lightning prediction in global climate models. *J. Geophys. Res.*, **126**, doi:10.1029/2020JD033990.
- [65] Bai, H.*, G. Deranadyan, **C. Schumacher**, A. Funk, C. E. Epifanio, A. Ali, Enderwin, F. Radjab, R. Adriyanto, N. Nurhayati, Y. Nugraha, and A. Fauziah, 2021: Formation of nocturnal offshore rainfall near the west coast of Sumatra: Land breeze or gravity wave? *Mon. Wea. Rev.*, **149**, 715-731, doi:10.1175/MWR-D-20-0179.1.
- [64] Tian, Y., Y. Zhang, S. A. Klein, and **C. Schumacher**, 2021: Interpreting the diurnal cycle of clouds and precipitation in the ARM GoAmazon observations: Shallow to deep convection transition. *J. Geophys. Res.*, **126**, doi:10.1029/2020JD033766.
- [63] Anselmo, E.*, L. Machado, and **C. Schumacher**, and G. Kiladis, 2021: Amazonian mesoscale convective systems: Life cycle and propagation characteristics. *International Journal of Climatology*, doi: 10.1002/joc.7053.
- [62] Anselmo, E.*, **C. Schumacher**, and L. Machado, 2020: The Amazonian low-level jet and its connection to convective cloud propagation and evolution. *Mon. Wea. Rev.*, **148**, 4083-4099, doi:10.1175/MWR-D-19-0414.1.
- [61] Huaman, L.*, **C. Schumacher**, and G. Kiladis, 2020: Eastward propagating disturbances in the tropical Pacific. *Mon. Wea. Rev.*, **148**, 3713-3728, doi:10.1175/MWR-D-20-0029.1.
- [60] Ren, T., P. Yang, **C. Schumacher**, X. Huang, and W. Lin, 2020: Impact of cloud longwave scattering on radiative fluxes associated with the Madden-Julian Oscillation in the Indian Ocean and

- Maritime Continent. *J. Geophys. Res.*, JGRD56305, doi: 10.1029/2020JD032591.
- [59] Hopper, L. J., **C. Schumacher**, K. Humes*, and A. Funk, 2020: Drop-size distribution variations associated with different storm types in Southeast Texas. *Atmosphere*, **11**, doi:10.3390/atmos11010008.
- [58] Cardoso-Bihlo, E., B. Khouider, **C. Schumacher**, and M. De La Chevrotiere, 2019: Using radar data to calibrate a stochastic parameterization of organized convection. *JAMES*, **11**, 10.1029/2018MS001537.
- [57] Yang, J.*, M. Jun, **C. Schumacher**, and R. Saravanan, 2019: Predictive statistical representations of observed and simulated rainfall using generalized linear models. *J. Climate*, **32**, 3409-3427, doi: 10.1175/JCLI-D-18-0527.1.
- [56] Jun, M., **C. Schumacher**, and R. Saravanan, 2019: Global multivariate point pattern models for rain type occurrence. *Spatial Statistics*, **31**, doi: 10.1016/j.spasta.2019.04.003.
- [55] Huaman, L.*, and **C. Schumacher**, 2018: Assessing the vertical latent heating structure of the East Pacific ITCZ using the CloudSat CPR and TRMM PR. *J. Climate*, **31**, 2563-2577, doi: 10.1175/JCLI-D-17-0590.1.
- [54] Ahmed, F.*, and **C. Schumacher**, 2018: Spectral signatures of moisture-convection feedbacks in the Indian Ocean. *J. Atmos. Sci.*, **75**, 1995-2015, doi:10.1175/JAS-D-17-0138.1.
- [53] Dupuis, C.*, and **C. Schumacher**, 2018: Using Lomb-Scargle analysis to derive empirical orthogonal functions from gappy meteorological data. *J. Appl. Met. Climate*, **57**, 2217-2229, doi: 10.1175/JAMC-D-17-0250.
- [52] Biasutti, M., A. Voigt, W. R. Boos, P. Braconnot, J. C. Hargreaves, S. P. Harrison, S. M. Kang, B. E. Mapes, J. Scheff, **C. Schumacher**, A. H. Sobel, and S.P. Xie, 2018: Global energetics and local physics as drivers of past, present and future monsoons. *Nature Geoscience*, **11**, 392-400, doi: 10.1038/s41561-018-0137-1.
- [51] Machado, L. A. T., and coauthors, 2018: Overview: Precipitation characteristics and sensitivities to the environmental conditions during GoAmazon2014/5 and ACRIDICON-CHUVA. *Atmos. Chem. Phys.*, **18**, 6461-6482, doi: 10.5194/acp-18-6461-2018.
- [50] de Sá, S. S., and coauthors, 2018: Urban influence on the concentration and composition of submicron particulate matter in central Amazonia. *Atmos. Chem. Phys.*, **18**, 12185-12206, doi: 10.5194/acp-18-12185-2018.
- [49] Ahmed, F.*, and **C. Schumacher**, 2017: Geographical differences in the tropical precipitation-moisture relationship and rain intensity onset. *Geophys. Res. Lett.*, **44**, 1114-1122, doi:10.1002/2016GL071980.
- [48] Stan, C., D. M. Straus, J. S. Frederiksen, H. Lin, E. D. Maloney, and **C. Schumacher**, 2017: Review of tropical-extratropical teleconnections on intraseasonal time scales. *Rev. Geophys.*, doi: 10.1002/2016RG000538.
- [47] Giangrande, S., and coauthors, 2017: Cloud Characteristics, thermodynamic controls and radiative impacts during the observations and modeling of the Green Ocean Amazon (GoAmazon2014/5) Experiment. *Atmos. Chem. Phys.*, doi:10.5194/acp-17-14519-2017.
- [46] Martin, S., P. Artaxo, L. Machado, A. Manzi, R. Souza, **C. Schumacher**, J. Wang, J. Brito, K. Jardine, A. Medeiros, S. de Sa, T. Biscaro, A. Calheiros, B. Portela, and 44 other authors in alphabetical order, 2017: The Green Ocean Amazon Experiment (GoAmazon2014/5) observes pollution affecting gases, aerosols, clouds, and rainfall over the rain forest. *Bull. Amer. Meteor. Soc.*, doi:10.1175/BAMS-D-15-00221.1.
- [45] Tang, S., S. Xie, Y. Zhang, M. Zhang, **C. Schumacher**, H. Upton*, M. Jensen, K. Johnson, M. Wang, M. Ahlgrim, Z. Feng, P. Minnis, and M. Thieman, 2016: Large-Scale vertical velocity, diabatic heating and drying profiles associated with seasonal and diurnal variations of convective systems observed in the GoAmazon2014/5 experiment. *Atmos. Chem. Phys.*, **16**, 14249-14264, doi:10.5194/acp-16-14249-2016.

- [44] Giangrande, S. E., T. Toto, M. P. Jensen, M. J. Barholomew, Z. Feng, A. Protat, C. R. Williams, **C. Schumacher**, and L. Machado, 2016: Convective cloud vertical velocity and mass-flux characteristics from radar wind profiler observations during GoAmazon2014/5. *J. Geophys. Res.*, **121**, 12,891–12,913, doi:10.1002/2016JD025303.
- [43] Fuentes, J. D., M. Chamecki, R. M. Nascimento dos Santos, C. von Randow, P. Stoy, G. Katul, D. R. Fitzjarrald, A. O. Manzi, T. Gerken, A. Trowbridge, L. S. Freire, J. Ruiz-Plancarte, J. M. F. Maia, J. Tota, N. L. Dias, G. Fisch, **C. Schumacher**, O. Acevedo, and J. R. Mercer, 2016: Linking meteorology, turbulence, and air chemistry in the Amazon rainforest during the GoAmazon project. *Bull. Amer. Meteor. Soc.*, doi:10.1175/BAMSD-15-00152.1.
- [42] Aggarwal, P., U. Romatschke, L. Araguas-Araguas, D. Belachew, F. Longstaffe, P. Berg, **C. Schumacher**, and A. Funk, 2016: Water isotope ratios reveal the proportions of convective and stratiform precipitation. *Nature Geoscience*, **9**, 624–629, 10.1038/ngeo273.
- [41] Ahmed, F.*, **C. Schumacher**, Z. Feng, and S. Hagos, 2016: Exchanging size for rain in a tropical latent heating retrieval. *J. Appl. Meteor. Clim.*, **55**, 1965–1982, doi:10.1175/JAMC-D-15-0038.1.
- [40] Liu, P., Q. Zhang, C. Zhang, Y. Zhu, M. Khairoutdinov, H. Kim, **C. Schumacher**, and M. Zhang, 2016: A revised real-time multivariate MJO index. *Mon. Wea. Rev.*, **144**, 627–642, doi:10.1175/MWR-D-15-0237.1.
- [39] Gerken, T., D. Wei, R. J. Chase, J. D. Fuentes, **C. Schumacher**, L. A. T. Machado, and coauthors, 2016: Downward transport of ozone rich air and implications for atmospheric chemistry in the Amazon rainforest. *Atmospheric Environment*, **124**, 64–76, doi:10.1016/j.atmosenv.2015.11.014.
- [38] Martin, S. T., P. Artaxo, L. A. T. Machado, A. O. Manzi, R. A. F. Souza, **C. Schumacher**, J. Wang, M. O. Andreae, H. M. J. Barbosa, J. Fan, G. Fisch, A. H. Goldstein, A. Guenther, J. L. Jimenez, U. Poschl, M. A. Silva Dias, J. N. Smith, and M. Wendisch, 2016: Introduction: Observations and modeling of the Green Ocean Amazon (GoAmazon2014/5). *Atmos. Chem. Phys.*, **16**, 4785–4797, doi: 10.519/acp-16-4785-2016.
- [37] Ahmed, F.*, and **C. Schumacher**, 2015: Convective and stratiform components of the precipitation-moisture relationship. *Geophys. Res. Lett.*, **42**, 10,453–10,462, doi:10.1002/2015GL066957.
- [36] Xu, W., S. A. Rutledge, **C. Schumacher**, and M. Katsumata, 2015: Properties and spatial variability of MJO convection observed by C-band radars in DYNAMO. *J. Atmos. Sci.*, **72**, 4126–4147.
- [35] **Schumacher, C.**, S. N. Stevenson*, and C. R. Williams, 2015: Vertical motions of the tropical convective cloud spectrum over Darwin, Australia. *Quart. J. Roy. Meteor. Soc.*, **141**, 4126–4147, doi:10.1002/qj.2520.
- [34] DePasquale, A. M.*, **C. Schumacher**, and A. Rapp: Radar observations of MJO and Kelvin wave interactions during DYNAMO/CINDY2011/AMIE, 2014. *J. Geophys. Res. –Atmos*, **119**, 6347–6367, doi:10.1002/2013JD021031.
- [33] Homeyer, C. R.*, **C. Schumacher**, and L. J. Hopper*, 2014: Assessing the applicability of the tropical convective-stratiform paradigm in the extratropics using radar divergence profiles. *J. Climate*, **27**, 6673–6686.
- [32] Feng, Z., S. A. McFarlane, **C. Schumacher**, S. Ellis, J. Comstock, and N. Bharadwaj, 2014: Constructing a merged cloud-precipitation radar dataset for tropical convective clouds during the DYNAMO/AMIE experiment at Addu Atoll. *J. Atmos. Ocean Tech*, **31**, 1021–1042.
- [31] Lappen, C., and **C. Schumacher**, 2014: The role of tilted heating in the evolution of the MJO. *J. Geophys. Res. –Atmos.*, **119**, 2966–2989.
- [30] Hopper, L. J.*, **C. Schumacher**, and J. P. Stachnik*, 2013: Implementation and assessment of undergraduate experiences in SOAP: An atmospheric science research and education program. *J. Geoscience Education*, **61**, 415–427.
- [29] Stachnik, J. P. *, **C. Schumacher**, and P. E. Ciesielski, 2013: Total heating characteristics of the ISCCP tropical and subtropical cloud regimes. *J. Climate*, **26**, 7097–7116.
- [28] Funk, A.*, **C. Schumacher**, and J. Awaka, 2013: Analysis of rain classifications over the tropics by

Version 7 of the TRMM PR 2A23 algorithm. *J. Met. Soc. Japan*, **91**, 257-272.

- [27] Li, W.*, **C. Schumacher**, and S. A. McFarlane, 2013: Radiative heating of the ISCCP upper level cloud regimes and its impacts on the large-scale tropical circulation. *J. Geophys. Res. -Atmos.*, **118**, 592-604.
- [26] Lappen, C., and **C. Schumacher**, 2012: Heating in the tropical atmosphere: What level of detail is critical for accurate MJO simulations in GCMs? *Clim. Dyn.*, **39**, 2547-2568.
- [25] Martin, E. R.*, and **C. Schumacher**, 2012: The relationship between tropical warm pool precipitation, sea surface temperature, and large-scale vertical motion in IPCC AR4 models. *J. Atmos. Sci.*, **69**, 185-194.
- [24] Hopper, L. J.*, and **C. Schumacher**, 2012: Modeled and observed variations in storm divergence and stratiform rain production in southeast Texas. *J. Atmos. Sci.*, **69**, 1159-1181.
- [23] Seroka, G. N.*, R. E. Orville, and **C. Schumacher**, 2012: Radar nowcasting of total lightning over the Kennedy Space Center. *Wea. and Forecasting*, **27**, 189-204.
- [22] Lin, Y., and coauthors, 2012: TWP-ICE global atmospheric model intercomparison: Convection responsiveness and resolution impact. *J. Geophys. Res.*, **117**, D09111, doi:10.1029/2011JD017018.
- [21] Fridlind, A. M., and coauthors, 2012: A comparison of TWP-ICE observational data with cloud-resolving model results. *J. Geophys. Res.*, **117**, D05204, doi:10.1029/2011JD016595.
- [20] Feng, Z., X. Dong, B. Xi, **C. Schumacher**, P. Minnis, and M. Khaiyer, 2011: TOA radiation budget of convective core/stratiform rain and anvil clouds from deep convective systems. *J. Geophys. Res.*, **116**, D23202, doi:10.1029/2011JD016451.
- [19] Stachnik, J. P. *, and **C. Schumacher**, 2011: A comparison of the Hadley Circulation in modern reanalyses. *J. Geophys. Res.*, **116**, D22102, doi: 10.1029/2011JD016677.
- [18] Martin, E. R.*, and **C. Schumacher**, 2011: The Caribbean low-level jet and its relationship to precipitation in IPCC AR4 models. *J. Climate*, **24**, 5935-5950.
- [17] Li, W. *, and **C. Schumacher**, 2011: Tropical thick anvil viewed by the TRMM Precipitation Radar. *J. Climate*, **24**, 1718-1735.
- [16] Mosier, R. M. *, **C. Schumacher**, R. E. Orville, L. D. Carey, 2011: Radar nowcasting of cloud-to-ground lightning over Houston, Texas. *Wea. and Forecasting*, **26**, 199-212.
- [15] Martin, E. R. *, and **C. Schumacher**, 2011: Modulation of Caribbean precipitation by the Madden-Julian Oscillation. *J. Climate*, **24**, 813-824.
- [14] Mullendore, G. L., A. J. Homann, K. Frederick, and **C. Schumacher**, 2009: Radar reflectivity as a proxy for convective mass transport. *J. Geophys. Res.*, **114**, D16103, doi:10.1029/2008JD011431.
- [13] Casey, S. P. F. *, A. E. Dessler, **C. Schumacher**, 2009: Five-year climatology of midtropospheric dry air layers in warm tropical ocean regions as viewed by AIRS/Aqua. *J. Appl. Meteor. Clim.*, **48**, 1831-1842.
- [12] Hopper, L. J. *, and **C. Schumacher**, 2009: Baroclinicity influences on storm divergence and stratiform rain: Subtropical upper-level disturbances. *Mon. Wea. Rev.*, **137**, 1338-1357.
- [11] **Schumacher, C.**, P. E. Ciesielski, and M. H. Zhang, 2008: Tropical cloud heating profiles: Analysis from KWAJEX. *Mon. Wea. Rev.*, **136**, 4289-4300.
- [10] Jakob, C., and **C. Schumacher**, 2008: Precipitation and latent heating characteristics of the major tropical western Pacific cloud regimes. *J. Climate*, **21**, 4348-4364.
- [9] Frederick, K. *, and **C. Schumacher**, 2008: Anvil characteristics as seen by C-POL during the Tropical Warm Pool International Cloud Experiment (TWP-ICE). *Mon. Wea. Rev.*, **136**, 206-222.
- [8] Casey, S. *, A. Dessler, and **C. Schumacher**, 2007: The frequency of tropical precipitating clouds as observed by the TRMM PR and ICESat/GLAS. *J. Geophys. Res.*, **112**, D14215, doi:10.1029/2007JD008468.
- [7] **Schumacher, C.**, M. H. Zhang, and P. E. Ciesielski, 2007: Heating structures of the TRMM field campaigns. *J. Atmos. Sci.*, **64**, 2593-2610.
- [6] **Schumacher, C.**, and R. A. Houze, Jr., 2006: Stratiform precipitation production over sub-Saharan

Africa and the tropical East Atlantic as observed by TRMM. *Quart. J. Roy. Meteor. Soc.*, **132**, 2235-2255.

- [5] Houze, R. A., Jr., S. Brodzik, **C. Schumacher**, S. E. Yuter, and C. R. Williams, 2004: Uncertainties in oceanic radar rain maps at Kwajalein and implications for satellite validation. *J. Appl. Meteor.*, **43**, 1114-1132.
- [4] **Schumacher, C.**, R. A. Houze, Jr., and I. Kraucunas, 2004: The tropical dynamical response to latent heating estimates derived from the TRMM Precipitation Radar. *J. Atmos. Sci.*, **61**, 1341-1358.
- [3] **Schumacher, C.**, and R. A. Houze, Jr., 2003: The TRMM Precipitation Radar's view of shallow, isolated rain. *J. Appl. Meteor.*, **42**, 1519-1524.
- [2] **Schumacher, C.**, and R. A. Houze, Jr., 2003: Stratiform rain in the tropics as seen by the TRMM Precipitation Radar. *J. Climate*, **16**, 1739-1756.
- [1] **Schumacher, C.**, and R. A. Houze, Jr., 2000: Comparison of radar data from the TRMM satellite and Kwajalein oceanic validation site. *J. Appl. Meteor.*, **39**, 2151-2164.

Courses Taught

Undergraduate

ATMO 201 *Weather & Climate*

ATMO 443 *Radar Meteorology*

ATMO 459 *Tropical Meteorology (writing intensive)*

ATMO 291/491 *Undergraduate Research*

Graduate

ATMO 638 *Dynamics of Convective Clouds*

ATMO 656 *Tropical Meteorology*

Student Advising

Current graduate students

Hedanqiu Bai	Ph.D. student since 2016
Lidia Huaman	Ph.D. in progress, M.S. (2018)
Montana Etten-Bohm	Ph.D. in progress, M.S. (2018)
Ryan North	M.S. student since 2020, co-chair with C. Epifanio
Ashley Sebok	Ph.D. student since 2021
Jonathan Lewis	Ph.D. student since 2021

Former graduate students and post-doctoral scholars

Sophie Mayne	Ph.D. (ABD)
Evandro Anselmo	Post-doc (2017)
Fiaz Ahmed	Ph.D. (2016)
Hannah Upton	M.S. (2016)
Chris Dupuis	M.S. (2016)
Emily Monroe	M.S. (2016)
Keith White	M.S. (2015)
Cristiano Eichholz	Visiting Ph.D. (2015), Brazilian advisor: L. Machado
Aaron Funk	M.S. (2013)
Amanda DePasquale	M.S. (2013), co-chair with A. Rapp
Justin Stachnik	Ph.D. (2013)
Jonathan Fliegel	M.S. (2012)
Larry Hopper	Ph.D. (2011), M.S. (2008)
Elinor Martin	Ph.D. (2011)

Matt Mosier	M.S. (2009), co-chair with R. Orville
Sean Casey	Ph.D. (2009), M.S. (2007), co-chair with A. Dessler
Wei Li	Ph.D. (2009)
Celina Hernandez	M.S. (2008)
Karen Brugman	M.S. (2007)
Kaycee Frederick	M.S. (2006)

Supported undergraduate research assistants

Evelyn Barkley	Fall 2021 – present
Austin Begin	Fall 2021 – present
Rachel Eldridge	Spring 2020 – Summer 2021
Erin Buttitta	Summer 2019 – Spring 2020
Leland MacDonald	Fall 2016 – Spring 2018
Lily Campbell	Fall 2015 – Spring 2017
Michaela Rosenmayer	Spring 2014 – Spring 2015
Rachel Sodowsky	Fall 2012 – Spring 2014
Stephanie Stevenson	Summer 2011 – Summer 2012
Aaron Funk	Summer 2010 – Summer 2011
Chad Phelps	Spring 2010 – Spring 2011
Aaron Ferrel	Fall 2007 – Summer 2009
Collin Lawrence	Fall 2007 – Summer 2009
Emily Borchard	Summer 2008
Cameron Homeyer	Summer 2007 – Spring 2008

REU mentees

Lily Houston	Summer 2019
Angela O’Flanagan	Summer 2019
Taylor Aydell	Summer 2017
Holly Mallinson	Summer 2015
Kaitlin Rutt	Summer 2014
DeVondria Reynolds	Summer 2013
Casey Peirano	Summer 2011

External Service Activities

American Meteorological Society

Publications Commission (2021-present), Member-at-large
Awards Oversight Committee (2019)
Suomi Award Committee (2018-2019), Chair (2018)
Atmospheric Research Awards Committee (2016-2018)
Awards Nominating Committee (2015)
Field Campaign Program Committee of the 36th Radar Conference (2013)
STAC Committee on Tropical Meteorology and Tropical Cyclones (2009-2012)
Co-organizer 29th Conference on Hurricanes and Tropical Meteorology (2010)
Committee of Judges for Undergraduate Awards Member (2005-2009) and Chair (2007-2008)
Committee for the Geotis Prize 2007 (33rd International Conference on Radar Meteorology)
Max Eaton Committee 2004, 2006, 2010 (26th, 27th, and 29th Conference on Hurricanes and Tropical Meteorology)

Department of Energy

ARM Science Board (2020-2021)
ARM User Executive Committee (2017-2020)

ASR Radar Science Steering Committee (2012-2015)

National Aeronautics and Space Administration

NASA-JAXA Joint Precipitation Measurement Missions (PMM) Science Team (JPST) (2019-present)

Aerosol (A) - and Clouds, Convection, and Precipitation (CCP) Science Community Cohort (SCC) (2018-2021)

National Weather Association

Membership and Marketing Committee (2009-2011)

World Climate Research Programme (WCRP)/World Weather Research Programme (WWRP)

Subseasonal Prediction Project (S2S) Teleconnections Subproject Committee (2015-2018)