

# Stephen Bourguet

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<b>EDUCATION</b>	Harvard University <i>PhD Candidate, Department of Earth and Planetary Sciences</i> • Advisor: Marianna Linz • Diversity, Inclusion, and Belonging Committee: Graduate Student Recruitment and Retention subgroup member Expected Graduation May 2023
	Brown University <i>Bachelor of Science with Honors, Environmental Engineering and Geology-Physics</i> May 2017
	California Institute of Technology/Jet Propulsion Lab <i>NASA Summer School on Satellite Observations and Climate Models</i> Summer 2022
<b>AWARDS</b>	Harvard University Certificate of Distinction in Teaching, Fall 2021 Skaff Family Environmental Graduate Fellowship Award, Fall 2018 - Spring 2019 Karen T. Romer Undergraduate Research and Teaching Award, Summer 2016
<b>TEACHING EXPERIENCE</b>	Teaching Fellow, Harvard University • GENED 1094: Confronting Climate, Fall 2019 and Fall 2020 • EPS 101: Global Warming Science, Spring 2020 • ES 261: Stratospheric Dynamics, Spring 2021 • EPS 50: Intro to the Fluid Earth, Fall 2021 and Fall 2022 EPS Short-Term Project Mentor, Summer 2022 • Lead an undergraduate through a literature review titled: <i>Studying climate change using basic thermodynamics</i> Volunteer coach for January term introduction to Python course, January 2021 Volunteer coach for Climate Modeling Summer Program at EPS/Harvard, Summer 2020 Teaching Assistant, Brown University • ENGN 0810: Fluid Mechanics, Fall 2016 Peer Tutor in Differential Equations and Physics, Jan 2015 - May 2017
<b>PROFESSIONAL ACTIVITIES</b>	Reviewer for Geophysical Research Letters American Geophysical Union and American Meteorological Society member
<b>RESEARCH EXPERIENCE</b>	Graduate Research Assistant, Harvard University Sept 2018 - Present Superfund Lab Research Assistant, Brown University Sept 2017 - June 2018 Undergraduate Researcher, Brown University May 2016 - May 2017
<b>PEER-REVIEWED PUBLICATIONS</b>	M. Baum, M. Fu, and <b>S. Bourguet</b> , “Sensitive Dependence of Global Climate to Continental Geometry”, <i>Geophysical Research Letters</i> , DOI: 10.1029/2022GL098843 (2022) <b>S. Bourguet</b> and M. Linz, “The Impact of Improved Spatial and Temporal Resolution of Reanalysis Data on Lagrangian Studies of the Tropical Tropopause Layer”, <i>Atmospheric Chemistry and Physics Discussions</i> , 1–18, DOI: 10.5194/acp-2022-159 (2022) M. Zhang, K. Yamada, <b>S. Bourguet</b> , J. Guelfo, and E. M. Suuberg, “Vapor Pressure of Nine Perfluoroalkyl Substances (PFASs) Determined Using the Knudsen Ef-

fusion Method”, *Journal of Chemical and Engineering Data*, 65 (5), 2332–2342 DOI: 10.1021/acs.jced.9b00922 (2020)

## MANUSCRIPTS IN PREP

H. Quan, B. Zhang, **S. Bourguet**, M. Linz, and G. Chen, “How Do Different Processes Shape Temperature Probability Distributions? A Percentile-averaged Temperature Tendency Decomposition”, *Submitted to Journal of Climate* (2022)

**S. Bourguet** and M. Linz, “A correction to the stratospheric water vapor feedback in CMIP6 models”, *In prep* (2022)

H. Sun, **S. Bourguet**, S. Eastham, and D. Keith, “Investigating inert particle transport in the stratosphere for stratospheric aerosol injection strategies”, *In prep* (2022)

## CONFERENCE PRESENTA- TIONS

Poster: American Meteorological Society Annual Meeting, “The Impact of Improved Temporal and Vertical Resolution on Lagrangian Studies of the Tropical Tropopause Layer”, January 2022

Poster: American Geophysical Union Fall Meeting, “The Three Dimensional Stratospheric Circulation in Isentropic Coordinates”, December 2020

## COMMUNITY ACTIVITIES

Grad Students and Postdoc seminar series host	Fall 2022
Grad Students in Geoscience Getting Lunch and Explaining Science host	Spring 2022
Heartbreak Hill Running Company run club coach	January 2020 - Present
CovEducation tutor	March 2020 - June 2020
NSF Research Experiences for Undergraduates (REU) mentor	Summer 2019
Breakthrough Greater Boston mentor	Dec 2018 - May 2019
Fox Point Elementary School volunteer	Sept 2014 - May 2017
Don Scott Memorial Foundation student director	Sept 2011 - June 2013