

Postdoctoral positions available:

Climate Process Team on Ocean Transport and Eddy Energy

Funded by the National Oceanographic and Atmospheric Administration and the National Science Foundation



Multiple postdoctoral research positions are available as part of a multi-institution Climate Process Team (CPT) on Ocean Transport and Eddy Energy. The CPT aims to survey, improve, and unify new advances in energy-, flow-, and scale-aware parameterizations of mesoscale eddies, in process studies and global ocean models; constrain parameters and parameterized fluxes through a synthesis of up-to-date observations of ocean energetics and transport; and implement and assess schemes within IPCC-class climate models at NCAR, NOAA-GFDL, and DOE-LANL. The expectation is that modernized, energetically-consistent mesoscale eddy parameterizations will significantly reduce climate model biases in ocean currents, stratification, and transport.

- New York University (Supervised by Laure Zanna): Unification of buoyancy and tracer closures; Assessment and parameterization of vertical energy structure; Parameterization of the grey zone. More information and application at <https://apply.interfolio.com/68119>.
- University of Colorado, Boulder (Supervised by Ian Grooms): Assessment of 2D eddy energy equation; parameterization of eddy energy transport; parameterizing dissipation in the eddy energy equation. More information and application are at <https://jobs.colorado.edu/jobs/JobDetail/?jobId=20799>.
- Woods Hole Oceanographic Institution (Supervised by Sylvia Cole): Characterizing scale-dependent EKE from observations; quasi-3D eddy buoyancy and momentum statistics from observations; analysis of vertical eddy structure in observations; synthesis of observations. More information and application are at <https://careers.whoi.edu/opportunities/view-all-openings/science-research/> (position 19-08-09).
- Princeton University (Supervised by Alistair Adcroft): Implementation and assessment of extant parameterizations of mesoscale eddies in process, idealized and global ocean models; consistent and optimized formulation of closures; development and assessment of improved and unified closures; evaluation of new closures in climate models. More information and application at <https://www.princeton.edu/acad-positions/position/13701>.

Applications must include a cover letter, a CV with a list of publications, a statement of research interests, and contact information of 3 references. Applicants wishing to be considered for positions in multiple institutions should indicate this in their cover letter, and submit a separate application to each position of interest. For more information email Laure Zanna (laure.zanna@nyu.edu), or any of the collaborating PIs listed above.

