

CMI Best Paper Award for Postdoctoral Fellow

The Robert H. Socolow CMI Best Paper Award for Postdoctoral Fellow is presented annually to a CMI affiliated postdoctoral research associate or associate research scholar selected for his or her contributions to an important CMI paper in the past two years. This year's recipient is Jane Baldwin.

Jane Wilson Baldwin, Jay Benjamin Dessy, Gabriel Vecchi, and Michael Oppenheimer "Temporally Compound Heat Wave Events and Global Warming: An Emerging Hazard," published in *Earth's Future* (AGU) (2019)

Heat waves are multiday periods of extremely hot temperatures and among the most deadly natural disasters. Studies show that heat waves will become longer, more numerous, and more intense with global warming. However, these studies do not consider the implications of multiple heat waves occurring in sequence, or "compounding."

In this study, we analyze physics-based simulations of Earth's climate and temperature observations to provide the first quantifications of hazard from compound heat waves. We demonstrate that compound events will constitute a greater proportion of heat wave risk with global warming. This has important policy implications, suggesting that vulnerability from prior heat waves will be increasingly important to consider in assessing heat wave risk and that heat wave warning systems that currently primarily consider future-predicted weather should also account for the recent history of weather.

