# HING ONG (A.K.A. HENG WANG)

Curriculum Vitae		Updated on 22 Dec 2021
hxoi EDUCATI	ng@ucdavis.edu ON	He/him
PhD	University at Albany, State University of NY, Atmospheric	Sciences 2020
MS	National Taiwan University, Atmospheric Sciences	2016
BS	National Taiwan University, Atmospheric Sciences	2014
PROFESSIONAL EMPLOYMENT		
Postdoctoral Scholar, University of California, Davis 2020 to present		
Research Assistant, National Taiwan University 2016 to 2		2016 to 2017
HONORS AND AWARDS		
2020 Climate and Global Change Postdoctoral Fellowship, NOAA (declined)		
2019	Government Scholarship to Study Abroad, Ministry of Education, Taiwan	
2019	Student Presenter Award—Poster 1st Place, Annual Meeting, AMS	
2014	Dean's Award, College of Science, National Taiwan University	
PUBLICATIONS		
Journal Publications		
2021	Classical W.C. Ora H. O. Vilana I. D. A. Callara and	

- Skamarock, W. C., **Ong, H.**, & Klemp, J. B., A fully compressible nonhydrostatic deep-atmosphere equations solver for MPAS. *Mon. Weather Rev.*, *149*(2), 571–583.
- **Ong, H.**, Comments on "On the structure and formation of UTLS PV dipole/jetlets in tropical cyclones by convective momentum surges". *Mon. Weather Rev.*, 148(11), 4693–4695.
- 2020 **Ong, H.**, & Roundy, P. E., The compressional beta effect: Analytical solution, numerical benchmark, and data analysis. *J. Atmos. Sci.*, 77(11), 3721–3732.
- 2020 **Ong, H.**, & Roundy, P. E., Nontraditional hypsometric equation. *Q. J. R. Meteorol. Soc.*, *146*(727), 700–706.

- 2019 **Ong, H.**, & Roundy, P. E., Linear effects of nontraditional Coriolis terms on intertropical convergence zone forced large-scale flow. *Q. J. R. Meteorol. Soc.*, 145(723), 2445–2453.
- 2017 **Ong, H.**, Wu, C. M., & Kuo, H. C., Effects of artificial local compensation of convective mass flux in the cumulus parameterization. *J. Adv. Model. Earth Syst.*, 9(4), 1811–1827.

## **INVITED PRESENTATIONS**

- 2021 "Atmospheric rivers: Integrated vapor kinetic energy and preliminary budget analyses," National Taiwan University, Taipei, Taiwan, Dec 16. Delivered in Taiwanese Hokkien.
- 2021 "The nontraditional Coriolis terms and convective system propagation," Geophysical Fluid Dynamics Laboratory, Princeton, NJ, Sep 23.
- 2021 "Radiative-convective equilibrium with the nontraditional Coriolis terms," Department of Atmospheric Science, Colorado State University, Fort Collins, CO, Feb 17.
- 2020 "Is vorticity tilting the primary source of potential vorticity in the eye of a hurricane?" Department of Atmospheric Sciences, National Taiwan University, Taipei, Taiwan, Dec 22.
- 2020 "The significance of the nontraditional Coriolis terms in tropical large-scale dynamics," Department of Land, Air and Water Resources, University of California, Davis, CA, Feb 24.
- 2020 "The significance of the nontraditional Coriolis terms in tropical large-scale dynamics," Research Center for Environmental Changes, Academia Sinica, Taipei, Taiwan, Jan 10.
- 2020 "The significance of the nontraditional Coriolis terms in tropical large-scale dynamics," Department of Atmospheric Sciences, National Taiwan University, Taipei, Taiwan, Jan 9.
- 2019 "The significance of the nontraditional Coriolis terms in tropical large-scale dynamics," Department of Earth, Atmospheric and Planetary Sciences, Massachusetts Institute of Technology, Cambridge, MA, Oct 30.
- 2019 "The significance of the nontraditional Coriolis terms in tropical large-scale dynamics," Mesoscale and Microscale Meteorology Laboratory, National Center for Atmospheric Research, Boulder, CO, Jul 25.

- 2019 "The significance of the nontraditional Coriolis terms in tropical large-scale dynamics," Central Weather Bureau, Taipei, Taiwan, Jun 20.
- 2018 "Ertel potential vorticity charging and scaling for the nontraditional Coriolis term," Department of Atmospheric Sciences, National Taiwan University, Taipei, Taiwan, Jun 26.

# TEACHING EXPERIENCE

Teaching Assistant, University at Albany, State University of NY

2018 to 2020

Applications of Subseasonal to Seasonal Dynamics

Ocean Science

Water and Climate Change Atmospheric Dynamics

Teaching Assistant, National Taiwan University

2014 to 2016

Lab. of Synoptic Meteorology (Lecturer)

Fluid Mechanics

Program and Scientific Computing

#### PROFESSIONAL SERVICE

## **Journal Reviewer**

Geophysical Research Letters Monthly Weather Review

Journal of Geophysical Research: Atmospheres

Journal of Atmospheric Sciences

#### LANGUAGES

**English**: Professionally proficient

Chinese Mandarin: Native (my official name until Dec 2021, Heng Wang)

**Taiwanese Hokkien:** Native (my official name since Dec 2021, Hing Ong)