**Peng Wang, Ph.D.**

**Email:** [wangpeng@miami.edu](mailto:wangpeng@miami.edu)

**Phone:** (786) 266-3320

**Web:** [https://wangpengphd.github.io](https://wangpengphd.github.io/)

**Address:** 4600 Rickenbacker Causeway, Ocean Sciences Dept., Miami, FL 33149, USA

**Education**

* Ph.D. in Meteorology and Physical Oceanography 2011 – 2016

University of Miami, Miami, USA

* B.S. in Ocean Sciences 2007 – 2011

Ocean University of China, Qingdao, China

**Careers**

* Postdoctoral Research Associate, University of Miami, USA 2016 – Current

**Publications**

*Peer-reviewed Articles:*

* **Wang, P.**, Özgökmen, T. M., Haza, A. C., 2016. Material dispersion by oceanic internal waves. *Environmental Fluid Mechanics*, [DOI: doi:10.1007/s10652-016-9491-y](http://link.springer.com/article/10.1007%2Fs10652-016-9491-y).
* **Wang, P.**, Özgökmen, T. M., 2016. Spiral inertial waves radiated from geophysical vortices. *Ocean Modelling*, [DOI: 10.1016/j.ocemod.2016.01.001](http://dx.doi.org/10.1016/j.ocemod.2016.01.001).
* **Wang, P.**, Özgökmen, T. M., 2015. How do hydrodynamic instabilities affect 3D transport in geophysical vortices? *Ocean Modelling*, [DOI:10.1016/j.ocemod.2015.01.002](http://dx.doi.org/10.1016/j.ocemod.2015.01.002).
* Rypina, I., Pratt, L. J., **Wang, P.**, Özgökmen, T. M., Mezić, I., 2015. Resonance phenomena in 3D time-dependent volume-preserving flows with symmetries. *Chaos*, [DOI: 10.1063/1.4916086](http://dx.doi.org/10.1063/1.4916086).
* Pratt, L. J., Rypina, I. I., Özgökmen, T. M., **Wang, P.**, Childs, H., Bebieva, Y., 2014. Chaotic advection in a steady, three-dimensional, Ekman-driven eddy. *Journal of Fluid Mechanics*, [DOI:10.1017/jfm.2013.583](http://dx.doi.org/10.1017/jfm.2013.583).

*Conference Papers:*

* Zambianchi, E., Poulain, P., **Wang, P.**, Kalampokis, A., Berta, M., Borghini, M., Buonocore, B., Cianelli, D., Falco, P., Gerin, R., Iermano, I., Mantovani, C., Nicolaides, G., Özgökmen, T., Sofianos, S., Uttieri, M., Zervakis, V., 2013. Surface circulation in the Gulf of Naples during the GELaTo 2012 experiment. *40th CIESM Congress – Marseille, France, October 2013.*

*Ph.D. Dissertation:*

* **Wang, P.**, 2016. Material dispersion by ocean eddies and waves. *Open Access Dissertations*, [Paper 1653](http://scholarlyrepository.miami.edu/oa_dissertations/1653/).

**Conferences and Presentations**

* Nov. 2016, Miami, FL, USA. Consortium for Advanced Research on Transport of Hydrocarbon in the Environment (CARTHE-II All Hands Meeting).

--- *Oral presentation*: “Simulating Langmuir circulations without phase averaging

surface gravity waves”.

* May 2016, Woods Hole, MA, USA. AmeriMech Symposium on Fluid Transport and Nonlinear Dynamics.

--- *Poster presentation*: “Spiral inertial waves emitted from geophysical vortices”.

* Feb. 2016, New Orleans, LA, USA. Ocean Sciences Meeting (AGU).

--- Poster presentation: “Spiral inertial waves emitted from geophysical vortices”.

* Sep. 2015, La Jolla, CA, USA. Dynamical Systems Theory and Lagrangian Data Assimilation in 3D+1 Geophysical Fluid Dynamics (MURI Ocean 3D+1).

--- *Oral presentation*: “Spiral inertial waves emitted from geophysical vortices”.

* Dec. 2014, San Francisco, CA, USA. American Geophysical Union Fall Meeting (AGU Fall Meeting).

--- *Poster presentation*: “How do hydrodynamic instabilities affect 3D transport in geophysical vortices”.

* Nov. 2014, Miami, FL, USA. Dynamical Systems Theory and Lagrangian Data Assimilation in 3D+1 Geophysical Fluid Dynamics (Ocean 3D+1).

--- *Oral presentation*: “The material transport and wave radiation in a 3D ocean eddy”.

* Apr. 2014, Hollywood, FL, USA. Consortium for Advanced Research on Transport of Hydrocarbon in the Environment (CARTHE All Hands Meeting).

--- *Oral presentation*: “3D instability in an isolated geophysical vortex”.

* Feb. 2013, Chapel Hill, NC, USA. Dynamical Systems Theory and Lagrangian Data Assimilation in 3D+1 Geophysical Fluid Dynamics (Ocean 3D+1).

--- *Oral presentation*: “Chaotic advection a periodically-perturbed, three-dimensional rotating cylinder”.

* Jun. 2012, Miami, FL, USA. Lagrangian Analysis and Prediction of Coastal and Ocean Dynamics (LAPCOD-V).

**Professional Experiences**

* Research Assistant at University of Miami Aug. 2011 – May 2016
* Teaching Assistant for *Geophysical Fluid Dynamics* Oct. 2015 – Nov. 2015
* Visiting Scholar for the summer school of *Fluid Dynamics on Sustainability and the Environment* at École Polytechnique, France Sep. 2015
* Nearshore research cruises along Florida southeast coast (twice) Jul. and Sep. 2014
* Teaching Assistant for *Computer Models of Fluid Dynamics* Aug. 2013 – Dec. 2013
* Teaching Assistant for *Introduction to Physical Oceanography* Jan. 2013 – May 2013

**Professional Skills**

Fortran; MATLAB; VisIt; Linux/Unix; Nek5000; ParaView; HTML; etc.

**Professional Affiliations**

American Geophysical Union

**Awards and Honors**

* Outstanding Student at Ocean University of China 2009 – 2010
* Excellent Students Scholarship at Ocean University of China 2009 – 2010
* Excellent Academy Scholarship at Ocean University of China 2008 – 2010
* First Prize of National Undergraduate Ocean Knowledge Contest, China 2008
* Second Prize of National Undergraduate Mathematics Contest, Shandong, China2009

**Voluntary Services**

* Volunteer for *National Gandhi Day of Service* Oct. 2015
* Volunteer for UM/RSMAS Student Auction Mar. 2015
* Volunteer for *Baynanza Beach Cleanup and Exotic Plant Removal*  Apr. 2014
* Member of UM/RSMAS MPO Student Seminar Committee Sep. 2013 – May 2014
* Member of UM/RSMAS Garden Club Jan. 2013 – Mar. 2016