

Heather Zimmerle, M.S.

Physical Oceanographer

EXPERTISE

Physical oceanography, observational oceanography, analysis of satellite imagery and in-situ data measurements, real-time ocean monitoring and forecasting, quality assurance and quality control of large amounts of observational oceanographic data, particularly from undulating and towed hydrographic sensors

QUALIFICATION SUMMARY

- Seven years experience analyzing current features in the Gulf of Mexico
- Experienced with a range of current measurement technologies including acoustic Doppler current profilers (ADCPs), drifting and moored buoys, gliders and autonomous underwater vehicles (AUVs), automatic surface vehicles (ASVs), expendable bathythermographs (XBTs), undulating and towed hydrographic sensors, and air borne systems
- Process and analyze oceanographic data in support of the company's day-to-day operations
- Produce daily written reports featuring current updates and forecasts tailored to the energy industry
- Utilize mathematical, scientific, and programming techniques to compile, interpret, and present real-time metocean data

WORK EXPERIENCE

2016-Present Woods Hole Group, Inc., Physical Oceanographer
2014-2016 Texas A&M University, Research Assistant



Education

2014 – M.S.
Oceanography
Texas A&M University

2011 – B.S.
Meteorology
Western Illinois University

2008 – A.A.
Geography
Lake Michigan College

Publications & Presentations

12

PUBLICATIONS & PRESENTATIONS

N. Sharma, J. S. Storie, L. Ivanov, B. Magnell, M. J. Leber, D. E. Gustafson, and H. M. Zimmerle. 2018. 2014-2017 Loop Current Activity, Offshore Technology Conference, Metocean Advances.

S.F. DiMarco and H. M. Zimmerle. 2017. MCH Atlas: Oceanographic Observations of the Mechanisms Controlling Hypoxia Project. Texas A&M University, Texas Sea Grant, College Station, TX. Publication TAMU-SG-17-601. Pp. 350. ISBN 978-0-692-87961-0.

E. Ramey, S.F. DiMarco, K. Dreger, and H.M. Zimmerle. 2017. Performance of an ocean buoyancy glider in a coastal region: Application to the Gulf of Mexico low oxygen zone. Environmental Science & Technology.

K.M. Thyng, C. A. Greene, R. D. Hetland, H. M. Zimmerle, and S. F. DiMarco. 2016. True colors of oceanography: Guidelines for effective and accurate colormap selection. Oceanography 29(3):9–13, <http://dx.doi.org/10.5670/oceanog.2016.66>.

H.M. Zimmerle and S.F. DiMarco. 2016. Mechanisms Controlling Hypoxia Data Atlas: High-resolution hydrographic and chemical observations from 2003-2014, Ocean Sciences, February 21-26, New Orleans, Louisiana, poster session

S.F. DiMarco, H. Zimmerle, P. Chapman, and M.K. Howard. 2015. Interannual variability of along and- cross-shelf spatial scales of oxygen, chlorophyll, and CDOM in the Gulf of Mexico hypoxic zone from towed observations, Aquatic Sciences, February 22-27, Granada, Spain, poster session

H.M. Zimmerle, S.F. DiMarco, and N.L. Guinasso, Jr. 2014. Quantifying Texas Coastal Current Reversals in the Northwestern Gulf of Mexico using 18 Year Time Series, Ocean Sciences, February 23-28, Honolulu, Hawaii, poster session

H.M. Zimmerle, S.F. DiMarco, and N.L. Guinasso, Jr. 2013. Interannual variability of the Texas Coastal Current in the northwestern Gulf of Mexico from 21 years of observations, ASLO, February 18-22, New Orleans, Louisiana, poster session