

Taylor R. Stewart

Ph.D. Candidate
University of Vermont
Department of Biology
Rubenstein Ecosystem Science Laboratory
3 College St, Burlington, VT 05401
Email: taylor.stewart@uvm.edu
920.268.5459

EDUCATION

Doctor of Philosophy: University of Vermont, Burlington, VT

Department of Biology

Advisor: Dr. Jason D. Stockwell

Expected: 12/2020

Bachelor of Science: Northland College, Ashland, WI – 05/2014

Major: Natural Resources – Emphasis in Fisheries and Wildlife Ecology

Graduating Honors: *Natural Resources Department Merit*

Senior Thesis: Age and Growth of Pygmy Whitefish, *Prosopium coulterii*, in Lake Superior

PROFESSIONAL EXPERIENCE

University of Vermont

Graduate Research Assistant

Burlington, VT

05/2016 - Present

USGS Lake Erie Biological Station

Fisheries Research Technician

Sandusky, OH

05/2014 – 05/2016

USGS Lake Superior Biological Station

Fisheries Research Technician

Ashland, WI

01/2012 – 05/2016

PUBLICATIONS

Peer-Reviewed Publications:

Stewart, T.R., D.H. Ogle, O.T. Gorman, and M.R. Vinson. 2016. Age, Growth, and Size of Lake Superior Pygmy Whitefish (*Prosopium coulterii*). *Am. Midl. Nat.* 175(1):24–36.

Stewart, T.R., 2016. Lake Erie Fish Community Data. U.S. Geological Survey data release.

<http://dx.doi.org/10.5066/F79C6VHJ>.

Kraus, R.T., C.M. Holbrook, C.S. Vandergoot, **T.R. Stewart**, M.D. Faust, D. Watkinson, C. Charles, M. Pegg, E. Enders, and C.C. Krueger. 2018. Evaluation of Acoustic Telemetry Grids for Determining Aquatic Animal Movement and Survival. *Methods Ecol. Evol.* 9(6):1489–1502.

Sorrentino, M.G., **T.R. Stewart**, J.E. Marsden, and J.D. Stockwell. *In Review*. Differential Lipid Dynamics in Stocked and Wild Juvenile Lake Trout. *J. Great Lakes Res.*

Preprint: <https://doi.org/10.1101/718692>

Technical Reports:

LEBS. 2015. Fisheries Research and Monitoring Activities of the Lake Erie Biological Station, 2014.

Prepared by B. Bodamer-Scarbro, W.H. Edwards, C. Gawne, P.M. Kočovský, R.T. Kraus, M.W.

Rogers, and **T.R. Stewart**. Report of the Lake Erie Biological Station (LEBS) to the Great Lakes Fishery Commission at the Annual Meeting of Lake Committees, Ypsilanti, Michigan.

LEBS. 2016. Fisheries Research and Monitoring Activities of the Lake Erie Biological Station, 2015. Prepared by B. Bodamer-Scarbro, W.H. Edwards, P.M. Kočovský, R.T. Kraus, M.W. Rogers, A.L. Schoonyan, and **T.R. Stewart**. Report of the Lake Erie Biological Station (LEBS) to the Great Lakes Fishery Commission at the Annual Meeting of Lake Committees, Ypsilanti, Michigan.

Manuscripts in Preparation:

Lachance, H.M., **T.R. Stewart**, M.H. Pespeni, T.J. Krabbenhoft, and J.D. Stockwell. Shedding light on an Understudied Environmental Factor: How Does Light Impact Cisco (*Coregonus artedii*) Embryos and Larvae? J. Great Lakes Res.

PROFESSIONAL PRESENTATIONS

Contributed Oral Conference Presentation:

Stewart, T.R., M. Zucchetta, J. Karjalainen, C. Goulon, O. Anneville, M.R. Vinson, J. Wanzenböck, I.J. Winfield, and J.D. Stockwell. A Modeling Approach to Better Understand Impacts of Changing Thermal Habitat on Coregonine Spawning and Egg Incubation Across Latitudes and Continents. ELLS-IAGLR, Evian-les-Bains, France. September 2018.

Stewart, T.R., E. Lasne, C. Goulon, J. Guillard, M.R. Vinson, J. Wanzenböck, I.J. Winfield, and J.D. Stockwell. Coregonines in the Face of Climate Change: A Collaborative Global Experiment. 148th Annual Meeting of the American Fisheries Society, Atlantic City, NJ. August 2018.

Stewart, T.R., M.R. Vinson, and J.D. Stockwell. Effect of Photoperiod Intensity on Cisco (*Coregonus artedii*) Egg Development. 13th International Coregonid Symposium, Bayfield, WI. September 2017.

Stewart, T.R., D.H. Ogle, O.T. Gorman, and M.R. Vinson. Age, Growth, and Size of Lake Superior Pygmy Whitefish. American Fisheries Society National Meeting, Portland, OR. August 2015.

Contributed Poster Conference Presentation:

Stewart, T.R., A.M. Muir, M.R. Vinson, K.R. Newman, and J.D. Stockwell. Opportunities and Constraints for Coregonid Response to a Changing Environment: A Global Assessment. 13th International Coregonid Symposium, Bayfield, WI. September 2017.

Stewart, T.R., M.R. Vinson, and J.D. Stockwell. Effect of Photoperiod Intensity on Cisco (*Coregonus artedii*) Egg Development. 60th Annual International Association of Great Lakes Research Meeting, Detroit, MI. May 2017.

Stewart, T.R., D.H. Ogle, and M.R. Vinson. Age and Growth of Pygmy Whitefish, *Prosopium coulterii*, in Lake Superior. Wisconsin Chapter of the American Fisheries Society Annual Meeting, Green Bay, WI. February 2013.

Invited Speaker:

USGS Great Lakes Science Center – 04/2017

Seminar Title: “Physiological consequences of changes in photoperiod intensity on cisco (*Coregonus artedii*) recruitment”

Lake Erie Committee Meeting – 03/2015

Seminar Title: “Online Data Reporting & Visualization Tools”

Lake Erie Committee, Forage Task Group Meeting – 02/2015

Seminar Title: “*Status and Trends of Forage Fish in Western Basin of Lake Erie*”

FUNDED GRANTS

2019 – **Stewart, T.R.** and J.D. Stockwell. Influence of changing lake temperatures on early life stages of freshwater whitefishes at local to global scales: modeling and experimental approaches. Vermont Water Resources and Lake Studies Center: \$41,737

2018 – Stockwell, J.D. and **T.R. Stewart**. Workshop to Establish a Collaborative Global Experiment to Understand Coregonid Adaptive Response to Changing Thermal Regimes. National Science Foundation: \$14,865

2017 – **Stewart, T.R.**, M.R. Vinson, and J.D. Stockwell. Lake Superior Larval Cisco Population Dynamics. Great Lakes Restoration Initiative: \$125,000

2016 – **Stewart, T.R.**, M.R. Vinson, and J.D. Stockwell. Lake Superior *Coregonus artedii* Egg Development and Larvae Survival Dynamics. Great Lakes Restoration Initiative: \$225,000

SIGNIFICANT ACHIEVEMENTS

Stewart, T.R. 2015. <https://lebs.shinyapps.io/western-basin/>. Written in programming language R (R Development Core Team, 2015. Vienna, Austria. www.r-project.org) version 3.2.2 (2015-08-14).

TEACHING & OUTREACH

Teaching Experience:

Graduate Teaching Assistant, University of Vermont, Plant Biology 095, Plants on the Move – 2019
Course Instructors: Dr. Jane Molofsky

Graduate Teaching Assistant, University of Vermont, Biology Core 102, Ecology and Evolution – 2019
Course Instructors: Dr. Jane Molofsky & Don Stratton

Graduate Teaching Assistant, University of Vermont, Biology 001, Principles of Biology – 2016
Course Instructors: Dr. Laura Almstead & Dr. Sarah Wittman

Co-Instructor, American Fisheries Society National Meeting, Continuing Education Workshop - 2015
Workshop Title: “*Age and Growth Analyses with R*”
Course Instructor: Dr. Derek Ogle

Teaching Assistant, Northland College, Natural Resources 349, Fisheries Science & Management – 2014
Course Instructor: Dr. Derek Ogle

Teaching Assistant, Northland College, Natural Resources 225, Fisheries & Wildlife Techniques – 2013
Course Instructors: Dr. Derek Ogle & Dr. Paula Anich

Outreach & Volunteer Work:

Wisconsin Department of Natural Resources

- Crew leader and principal investigator in a historical tagging study of spawning White and Longnose Suckers in Pikes Creek, Bayfield, WI – 2014
- Sampled Lake Sturgeon harvested from Lake Winnebago for biological information (length, weight, sex, maturity, and fecundity) – 2014
- Collected spawning Salmonids from Big Rock Fish Refugee with a seine, measured length and inserted T-bar anchor tags – 2013

U.S. Fish & Wildlife Service

- Collected juvenile Salmonids in Whittlesey Creek National Wildlife Refuge with a backpack electrofishing unit – 2013

University of Minnesota – Duluth

- Assisted in the live capture of deepwater, Lake Superior species (Siscowet, Kiyi, and Deepwater Sculpin) for low-light foraging and physiology study – 2013, 2012

U.S. Forest Service

- Constructed fish pyramids and performed tree fall drops in Cisco Lake, Wisconsin, to enhance spawning habitat – 2012

PROFESSIONAL TRAINING & WORKSHOPS

“Vermont Boating License” – 06/2016

Vermont State Police

“American Red Cross Lifeguarding Certification” – 10/2015

Kalahari Waterparks, Resorts & Conventions

“Early Development of Four Cyprinids Native to the Yangtze River, China” – 07/2015

Amy E. George from USGS - Columbia Environmental Research Center

University of Toledo – Lake Erie Center

“Department of Interior Motorboat Operator Certification Course” – 07/2015

Gary L. Rutz

USGS - Lake Erie Biological Station

“American Red Cross Adult First Aid/CPR/AED with Anaphylaxis Shock” – 03/2014

Autumn J. Kelley

Northland College

“Wilderness Search & Rescue Certification” – 03/2013

Northland College

“PADI Open Water Scuba Certification” – 05/2012

Northland College

AFFILIATIONS & AWARDS

Professional Affiliations:

American Fisheries Society

International Association of Great Lakes Research

Awards:

Northland College’s Matthew Berg Endowed Award – 04/2014

Northland College’s Natural Resources Department Merit Award – 05/2014

13th International Coregonid Symposium General Student Travel Award – 09/2017