James A. Stoeckel, Ph.D. Department of

Fisheries and Allied Aquacultures Auburn University, 203 Swingle Hall

Auburn, AL 36849

Professional Preparation

Northern Kentucky University	Biology	B.S., 1988
Ohio State University	Zoology	M.S., 1994
Miami University	Zoology	Ph.D., 2007

Appointments

Auburn University	Associate Professor:	2013-present
	Assistant Professor:	2007 - 2013
Miami University	Teaching/Research Assistant:	2002-2007
Illinois Natural History Survey	Asst. Supportive / Tech. Scientist:	1993-2002
The Ohio State University:	Teaching/Research Assistant:	1988-1993

Recent Publications (2012-2016: *undergraduate, **graduate student)

- Connelly, SJ, JA Stoeckel, RA Gitzen, CE Williamson, and MJ Gonzalez. 2016. Effect of clonal selection on Daphnia tolerance to dark experimental conditions. PLOS One, online July, 1-13
- Yoder, JA, JA Stoeckel, BS Helms, AL Lorenz, and AJ Jajack. 2016. Hygric stresses and strategies in maintaining the association between crayfish and ectosymbiotic worms across vastly different environments. Symbiosis 69(3):141-150.
- Gascho Landis**, A.M., and J.A. Stoeckel. 2016. Multi-stage disruption of freshwater mussel reproduction by high suspended solids in short and long-term brooders. Freshwater Biology 61:229-238.
- Stoeckel JA, BS Helms, M Catalano, JM Miller, K Gibson, and PM Stewart. 2015. Field and model-based evaluation of a low-cost sampling protocol for a coordinated, crayfish life-history sampling effort. Freshwater Crayfish 21(1):131-141.
- Haag, W.R., and J.A. Stoeckel. 2015. The role of host abundance in regulating populations of freshwater mussels with parasitic larvae. Oecologia 178(4):1159-1168.
- Ames**, C.W., B.S Helms, and J.A. Stoeckel. 2015. Habitat mediates the outcome of a cleaning symbiosis for a facultatively burrowing crayfish. Freshwater Biology 60(5): 989-999.
- Mosley**, T.L., W.R. Haag, and J.A. Stoeckel. 2014. Egg fertilization in a freshwater mussel: effects of distance, flow and male density. Freshwater Biology. 59:2137-2149.
- Luo, Y**., C. Li**, A. Gascho Landis, G. Wang**, J. Stoeckel, and E. Peatman. 2014. Transcriptomic profiling of differential responses to drought in two freshwater mussel species, the giant floater *Pyganodon grandis* and the pondhorn, *Uniomerus tetralasmus*. PLOS One. 9(2): 1-14.
- Helms, B., W. Budnick*, P. Pecora*, J. Skipper*, E. Kosnicki, J. Feminella, and J. Stoeckel. 2013. The influence of soil type, congeneric cues, and floodplain connectivity on the local distribution of the devil crayfish (*Cambarus diogenes* Girard). Freshwater Science. 32(4):1333-1344.
- Helms, B., Z.J. Loughman, B.L. Brown, and J. Stoeckel. 2013. Recent advances in crayfish biology, ecology, and conservation. Freshwater Science. 32(4):1273-1275.
- Skelton, J.**, K.J. Farrell**, R.P. Creed, B.W. Williams, C. Ames**, B.S. Helms, J. Stoeckel, and B.L. Brown. 2013. Servants, scoundrels, and hitchhikers: current understanding of the complex interactions between crayfish and their ectosymbiotic worms (Branchiobdellida). Freshwater Science. 32(4):1345-1357.
- Gascho Landis, A.**, W.R. Haag, and J.A. Stoeckel. 2013. High suspended solids loads as a factor in reproductive failure of a freshwater mussel. Freshwater Science. 32(1):70-81.
- Helms, B.S., C. Figiel, J. Rivera*, J.A. Stoeckel, G. Stanton, and T. Keller. 2013. Life history observations, environmental associations, and soil preferences of the Piedmont Blue Burrower (*Cambarus (Depressicambarus) harti*, Hobbs). Southeastern Naturalist. 12(1):143-160.
- Gough, H.*, A. Gascho Landis**, and J.A. Stoeckel. 2012. Behaviour and physiology are linked in freshwater mussel responses to drought conditions. Freshwater Biology.57:2356-2366.
- Gascho Landis**, A., W.R. Haag, and J.A. Stoeckel. 2012. Effects of temperature, photoperiod, and gravidity on lure display and glochidial release in a freshwater mussel. Journal of the North American Benthological Society. 31(3):775-786.

- Wang, R.**, C. Li**, J.A. Stoeckel, G. Moyer, Z. Liu, and E. Peatman. 2012. Rapid development of molecular resources for a freshwater mussel, *Villosa lienosa* (Bivalvia: Unionidae) using a RNA seq-based approach. Freshwater Science 31(3):695-708.
- Stoeckel, J.A., J. Morris*, E. Ames*, M.J. Vanni, W. Renwick, and M.J. Gonzalez. 2012. Exposure times to the spring herbicide flush along a stream-reservoir system. Journal of the American Water Resources Association 48(3):616-634.

Recent Funding

- Hatch/Multistate Program; Stoeckel, J.A. A metabolic approach to assessing interactions between climate change, agrochemicals, and freshwater mussel health. Oct 2015 Sept 2017. \$50,000.
- USFWS, SSP Program; Powell, J., E. Irwin, D. Devries, R. Wright, and J.A. Stoeckel. Determination of species-specific dissolved oxygen and temperature requirements for non-game riverine fishes. 01/01/2015 12/12/2017. \$70,000
- USDA Forest Service Center for Bottomland Hardwoods Research, Stoeckel, J.A.(PI), and W.R. Haag (co-PI). Factors influencing freshwater mussel recruitment and survival. 07/01/2014 07/15/2019. \$5,000
- USFWS, Warm Springs, Georgia; PI: Stoeckel, J.A., G.Moyer. Cooperative Agreement: Development of eDNA detection for aquatic invasive species in the southeastern United States. 8/14/2012 –12/31/2017. \$300.875.
- Stratus Consulting/NOAA; PI: Stoeckel, J.A. Natural Resource Damage Assessment related to the DWH Oil Spill. Confidential, work subject to litigation. April 2012 Sept. 2013. \$189,000.
- USFWS, Panama City Field Office; PI: Stoeckel, J.A., and S. Sammons. Habitat Availability and Associations of Unionid Species in the Apalachicola River, Florida. Dec. 2011 Dec. 2013. \$85,039
- USFWS Aquatic Invasive Species Region 4; PI: Stoeckel, J.A., W. Duncan, and E. Irwin. Invasion risk of zebra mussels (*Dreissena polymorpha*) into the Mobile River Basin: Assessment of veliger production and drift in the Tenn-Tom Waterway. June 2011 May 2013. \$19,695
- National Science Foundation, Collaborative Proposal: Parasite or partner? Causes and consequences of conditional outcomes in a cleaning symbiosis. 03/01/10 12/30/12. Auburn University subproject: Stoeckel, J.A. (PI) and Helms, B.S. (co-PI) \$109,073; Appalachian State University subproject: Creed, R. (PI) \$267,655; Clemson University subproject: Brown, B.L. (Clemson P.I., and overall project P.I.) \$220,708. Total budget = \$597,436.

Thesis/Dissertation Advisor

Student	Degree	Year	Current Employer
D. Allen Pattillo	M.S.	2010	Iowa State University
Tyler Mosley	M.S.	2012	Cabinet Maker
Andrew Gascho Landis	Ph.D.	2013	SUNY Cobbleskill
Catlin Ames	M.S.	2013	Missouri Department of Conservation
Reuben Smit	M.S.	2014	Florida Fish and Wildlife Conserv. Comm.
Ian Palmer	M.S.	ABD 2014	Self employed
Michael Hart	M.S.	2014	Auburn University
Rebekah Borgert	M.S.	2015	•
Kathryn Mitchell	M.S.	in progress	
Lindsay White	Ph.D.	in progress	
Rebecca Tucker	M.S.	in progress	

Teaching

Semester	Title	Level
Spring, every other year	Fish 6970 Conservation of Aquatic Organisms (3 cr)	Undergrad/Grad
Spring, every other year	Fish 7270 Crustacean and Molluscan Aquaculture (4 cr)	Graduate
On Demand	Fish 4960 Directed Studies in Crustacean or Molluscan	Undergraduate
	Ecology (2 cr)	-
2011, 2013	Aqua 303 Crustacean and Molluscan Aquaculture (3 cr)	Undergraduate
	Can Tho University, Vietnam	