CANDICE M. MILLER

candice.miller@yahoo.com (701) 659-0008

<u>Present Address</u> Oklahoma State University Natural Resource Ecology and Management 008c Ag Hall Stillwater, Oklahoma 74078 <u>Permanent Address</u> 907 8th Avenue Northwest Jamestown, North Dakota 58401

I. EDUCATION

- Oklahoma State University, Stillwater, Oklahoma: 2010 present Degree: PhD Major: Natural Resource Ecology and Management-Fisheries Option Anticipated Graduation: May 2014 Dissertation: TBA Advisor: Daniel E. Shoup, Ph.D.
 Eastern Illinois University, Charleston, Illinois: 2008 – 2010 Degree: Master of Science Major: Biological Sciences Anticipated Graduation: May 2010 Thesis: Population Demographics of Crappie in Illinois Reservoirs
 - Advisor: Charles L. Pederson, Ph.D. Advisor: Robert E. Colombo, Ph.D.
- <u>University of North Dakota</u>, Grand Forks, North Dakota: 2004 2007 Degree: Bachelor of Science
 Major: Fisheries and Wildlife Biology
 Advisor: Richard D. Crawford, Ph.D.

II. PROFESSIONAL EXPERIENCE

- Graduate Teaching Assistant, Oklahoma State University: Stillwater, Oklahoma August 2010 – present; Supervisor: Daniel E. Shoup, Ph.D., Department of Natural Resource Ecology and Management
- Graduate Research Assistant, Eastern Illinois University: Charleston, Illinois
 August 2008 2010; Supervisor: Charles L. Pederson, Ph.D., Department of Biological Sciences
- Seasonal Fisheries Aide, North Dakota Game and Fish Department: Riverdale, North Dakota May 2008 – August 2008; Supervisor: Dave Fryda, Missouri River System Fisheries Supervisor
- *Biological Aide*, US Fish and Wildlife Service, Lake Ilo National Wildlife Refuge: Dunn Center, North Dakota

May 2007 - August 2007; Supervisor: Cory Richardson, Refuge Manager

- Seasonal Wildlife Aide, North Dakota Game and Fish Department: Jamestown, North Dakota May 2006 – August 2006; Supervisor: Brian Kietzman, Wildlife Resource Management Supervisor
- Biological Aide, Idaho Department of Fish and Game, Sawtooth Fish Hatchery: Stanley, Idaho May 2005 – August 2005; Supervisor: Brent Snider, Hatchery Manager
- *Volunteer*, US Fish and Wildlife Service, Garrison Dam National Fish Hatchery: Riverdale, North Dakota

May 2004 - August 2004; Supervisor: Rob Holm, Project Leader

III. ORGANIZATIONS

- American Fisheries Society: 2008 present
- Oklahoma State University American Fisheries Society Subunit: 2010 present
- Oklahoma State University NREM Graduate Student Organization: 2010 present

- Eastern Illinois University Fish and Wildlife Ecology Club: 2008 present
 - President 2009 present
- Eastern Illinois University Biological Graduate Student Association: 2008 present
 - Vice President 2009 present
 - Treasurer 2008 2009
- University of North Dakota Wildlife Society: 2004 2007
 - Secretary 2005 2006

IV. PUBLICATIONS

- Colombo, R.E., Phelps, Q.E., **Miller, C.M.**, Garvey, J.E., Heidinger, R.C., and Richards, N.S. 2010. Comparison of Channel Catfish Age Estimates and Resulting Population Demographics Using Two Common Structures. North American Journal of Fisheries Management.
- Colombo, R.E., **Miller, C.M.**, Phelps, Q.E., Garvey, J.E., and Heidinger, R.C. (in review). Predicting the Impact of Harvest on the Yield of Channel and Flathead Catfish in the Wabash Using Population Modeling.
- Colombo, R.E., Phelps, Q.E., **Miller, C.M.**, Garvey, J.E., and Heidinger, R.C. (in preparation). The Effect of a Fisheries Reserve on the Demographics of Catfish Populations in a Large Unimpounded River.

V. PRESENTATIONS

- Miller, C.M., Colombo, R.E. and Pederson, C.L. 2010. Comparative Fish Assemblages of the Lake Decatur Watershed. National AFS. Pittsburgh, Pennsylvania.
- Miller, C.M., Colombo, R.E., Phelps, Q.E., Garvey, J.E., and Heidinger, R.C. 2010. Predicting the Impact of Harvest on the Yield of Channel and Flathead Catfish in the Wabash River using Population Modeling. Catfish 2010. St. Louis, Missouri.
- Miller, C.M., Colombo, R.E., and Pederson, C.L. 2010. Poster: Diversity of Ichthyofauna in the Tributary Streams of the Sangamon River. Rend Lake, Illinois.
- Miller, C.M., Colombo, R.E., Phelps, Q.E., Garvey, J.E., and Heidinger, R.C. 2010. Predicting the Impact of Harvest on the Yield of Channel and Flathead Catfish in the Wabash River using Population Modeling. Illinois AFS. Rend Lake, Illinois.
- Miller, C.M., Colombo, R.E., and Pederson, C.L. 2009. Poster: Comparative Fish Assemblages of the Lake Decatur Watershed. Midwest Fish and Wildlife Conference. Springfield, Illinois.

VI. ABSTRACTS SUMBITTED

Miller, C.M., Colombo, R.E., and Pederson, C.L. 2010. Poster: Diversity of Ichthyofauna in the Tributary Streams of the Sangamon River. Midwest Fish and Wildlife Conference. Minneapolis, Minnesota.

VII. AWARDS AND GRANTS

- Graduate Student Investigator Award, Eastern Illinois University: March 2010
- Illinois AFS Travel Award, Illinois American Fisheries Society: February 2010
- **Duffy Award**, Illinois American Fisheries Society and the North Central Division of the American Fisheries Society: November 2009
- Williams Travel Award, Eastern Illinois University: November 2009, March 2010
- **Research and Creative Activities Award,** Eastern Illinois University Graduate School: April 2009, March 2010
- Cum Laude graduate, University of North Dakota Commencement: December 2007
- Glen Allen Paur Award, University of North Dakota Department of Biology: October 2007
- STAR Award, US Fish and Wildlife Service: August 2007

VIII. UNDERGRADUATE MENTEES

- Population Demographics of Crappie in Four Midwestern Reservoirs
 - Sarah Thompson
 - Ethan Stephenson
 - Greg King
 - o Branden Farmer

IX. SKILLS/ABILITIES

Field Work

- Proficient with Global Positioning Systems (GPS), including cartographical features for programming and offsets
- Proficient with fish nets including both active (larval trawls and seines) and passive (gill nets, deepwater gill nets, fyke nets) gear types
- Proficient in electric seining and boat electrofishing techniques
- Skilled with driving motored boats, also with loading and unloading boats on trailers
- Proficient in fish spawning techniques
- Familiar with salmonid redd counting techniques
- Familiar with fish tagging techniques including: Petersen disk tags, PIT tags, Coded Wire Tags (CWT), Visible Implant Elastomer tags, and dangler tags

Computer Technologies

- Proficient with spreadsheet mathematical function and graphs, macro development, and statistical analysis
- Proficient with ArcGIS and ArcCatalog including importing and exporting data sets
- Proficient with implementation and interpretation of ArcGIS Geostatistical Analyst (Inverse Distance Weighting, Semivariogram fitting, Kriging, etc.), Spatial Statistical Tools including point patter analysis functions (Ripley's K, Moran's I, K-Nearest Neighbor, etc.), Cluster Mapping (Anselin Moran's I, Getis-Ord G*, etc.)
- Proficient with Federal Geographic Committee standards for metadata compliance for GIS and map publishing
- Proficient with home-range analysis interpretation including adaptive and fixed kernel estimation
- Proficient with analysis and interpretation of landscape metrics (Fragstats, Patch Analyst)
- Familiar with SAS statistical software

Laboratory

- Proficient with water chemistry analyses including: hardness, alkalinity, ammonia, phosphates and nitrates
- Familiar with fish aging techniques including scale and otolith reading