

SUSAN CLAIRE WALLS

CURRICULUM VITA

ADDRESS

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EDUCATION

Ph.D. 1991 University of Louisiana at Lafayette
(Environmental and Evolutionary Biology)
Dr. Robert G. Jaeger, Advisor

M.S. 1985 University of Louisiana at Lafayette (Biology)

B.S. 1983 Mississippi State University (Zoology)

EMPLOYMENT

April, 2007- Present Wildlife Biologist, U. S. Geological Survey,
Florida Integrated Science Center, Gainesville, FL

July, 2000 – March, 2007 Research Ecologist, U. S. Geological Survey,
National Wetlands Research Center, Lafayette, LA

1996- June, 2000 Assistant Professor, Department of Biological Sciences,
The University of Southern Mississippi

1994-1996 Assistant Professor, Department of Biology,
The City College of The City University of New York

1992-1993 N.S.F. Postdoctoral Research Associate, Oregon State University
(with Dr. Andrew R. Blaustein)

1991-1992 Instructor, Department of Zoology, Oregon State University

1986-1991 Teaching Assistant, Department of Biology,
University of Louisiana at Lafayette

1983-1985 Teaching Assistant, Department of Biology,
University of Louisiana at Lafayette

1982 Teaching Assistant, Department of Zoology, Mississippi State University

OTHER EMPLOYMENT

1986 Iguana Management Project, Smithsonian Tropical Research Institute,
Balboa, Panama

COURSES TAUGHT

University of Florida, Gainesville, FL (2007-2008):

Guest Lecturer in Wildlife Techniques, Department of Wildlife Ecology and
Conservation

The University of Southern Mississippi (1996-2000):

Biological Science (BSC 103)
Principles of Biological Sciences I (BSC 110)
Principles of Biological Sciences II (BSC 111)
Biology of Vertebrates (BSC 407/507)
Herpetology (BSC 417/517)
Senior Practicum (BSC 497)

The City College of The City University of New York (1994-1996):

Population and Community Biology (Biology 208)

Oregon State University (1991-1992):

General Ecology (BI 370)
General Biology (Ecology and Evolution) (BI 212)
Evolution (BI 445/545)
Graduate Seminar ("Sexual Selection and Sex Determination") (Z 507b)

GRADUATE/HONOR STUDENT COMMITTEES CHAIRED

- 1999-2002 Venetia Briggs, M.S., University of Southern Mississippi, "Agonistic Behavior of the Mediterranean Gecko (*Hemidactylus turcicus*)".
- 1998-2001 Lorie Yates, M.S., University of Southern Mississippi, "The Agonistic Behavior of Three Species of Plethodontid Salamanders (Plethodontidae)".
- 1998-1999 Jill Arnold, B.S., Honors Thesis, University of Southern Mississippi, "The Effects of Genetic Relatedness and Alternate Prey on Cannibalism in Mosquitofish".

MEMBERSHIP ON GRADUATE STUDENT COMMITTEES (DATE INDICATES YEAR OF COMPLETION)

- 2006 Sarah Barlow, M.S., Louisiana State University, "Monitoring Anuran Richness and Relative Abundance in Created Wetlands of Central Louisiana".

- 2004 Tonya Darden, Ph.D., University of Southern Mississippi, “Evolutionary and Ecological Processes within Dystrophic Blackwater Habitats: Speciation, Dispersal and Historic Biogeography in Enneacanthini Sunfishes and Potential Factors Influencing Their Local Distributions”.
- 2003 Pamela Schofield, Ph.D., University of Southern Mississippi, “The Importance of Competition and Physiological Tolerance for Two Gobies (*Microgobius gulosus* and *Gobiosoma robustum*; Family: Gobiidae) in a lagoonal estuarine system (Florida Bay, Florida, USA)”
- 2003 Robert Page, M. S., University of Louisiana at Lafayette, “Signal Ambiguity and the Assessing of Imperfect Information in Red-Backed Salamanders (*Plethodon cinereus*)”.
- 2003 Robert Smith, Ph.D., University of Southern Mississippi, “Resources and Arrival of Landbird Migrants at Northerly Breeding Grounds: Linking *en route* with Breeding Season Events”.
- 2002 John Himes, Ph.D., University of Southern Mississippi, “The Role of the Midland Water Snake, *Nerodia sipedon*, as a Competitor, Predator, and Prey in Freshwater Communities”.
- 2001 Mollie Cashner, M.S., University of Southern Mississippi, “An investigation of chemical alarm systems of a coevolved assemblage of freshwater fishes in the southeastern United States”.
- 2001 Colleen Dywer, M.S., University of Southern Mississippi, “Age-related differences in the pre-migratory behavior of Gray Catbirds”.
- 2001 Megan Gibbons Peterson, Ph.D., University of Louisiana at Lafayette, “Complex behaviors in the red-backed salamander: Foraging and kin discrimination”.
- 2001 Aimée Lee, M.S., University of Southern Mississippi, “The influence of predatory fishing spiders on the foraging ecology and refuge use of larval salamanders”.
- 2000 Scott Smyers, M.S., University of Louisiana at Lafayette, “Behavioral interactions within and between species of juvenile pond-breeding salamanders”.
- 2000 Michael Rubbo, M.S., University of Louisiana at Lafayette, “Ecological interactions and sensory adaptations of three species from a terrestrial leaf litter community”.

- 2000 Stephan Woltmann, M.S., University of Southern Mississippi, “Autumn migration behavior and winter distribution of migratory hawks”.
- 2000 David Cimprich, Ph.D., University of Southern Mississippi, “Predation risk and the predator avoidance behavior of migrant birds during stopover”.

TECHNICAL TRAINING RECEIVED (in USGS)

- Project Leadership, Management and Communications, Washington, DC, May 2006
- Leadership Intensive Training, Lafayette, LA, January, 2005
- Supervisory Challenge in the USGS, Denver, CO, 2003
- Introduction to GPS for Natural Resources, University of Louisiana at Lafayette, Lafayette, LA, 2001
- National Wetlands Research Center and Redfish Point, Vermillion Bay, LA, 2001
Motorboat Operator Certification Course
- Introduction to Desktop GIS (Arcview) for Natural Resources, University of Louisiana at Lafayette, Lafayette, LA, 2001
- Introduction to National Wetlands Classification System, University of Louisiana at Lafayette, Lafayette, LA, 2001

PUBLICATIONS

Book Chapters:

Blaustein, A.R. and **S.C. Walls**. 1995. Aggregation and kin recognition. In: *Amphibian Biology*, vol. 3 (Ed. by H. Heatwole and B. K. Sullivan). Chipping Norton, Australia: Surrey Beatty & Sons, pp. 568-602.

Mathis, A., R.G. Jaeger, W.H. Keen, P.K. Ducey, **S.C. Walls** and B.W. Buchanan. 1995. Aggression and territoriality in salamanders and a comparison with the territorial behaviour of frogs. In: *Amphibian Biology*, vol. 3 (Ed. by H. Heatwole and B. K. Sullivan). Chipping Norton, Australia: Surrey Beatty & Sons, pp. 633-676.

Dorcas, M.E., S.J. Price, **S.C. Walls** and W.J. Barichivich. 2009. Auditory Monitoring of Anuran Populations. Chapter 16 in C.K. Dodd, Jr. (ed.): *Techniques in Ecology and Conservation*. 31 manuscript pages, Oxford University Press. In press.

Book Reviews:

Walls, S.C. 1993. Book Review: *Cannibalism: Ecology and Evolution among Diverse Taxa*. M. A. Elgar and B. J. Crespi. *The Quarterly Review of Biology* 68:621.

Walls, S.C. 2008. Review of “*The Ecology and Behavior of Amphibians*”, by K.D. Wells, for *The Quarterly Review of Biology* 83:416-417.

Peer-reviewed Journal Articles:

- Walls, S.C.** and R. Altig. 1986. Female reproductive biology and larval life history of *Ambystoma* salamanders: a comparison of egg size, hatchling size, and larval growth. *Herpetologica* **42**:334-345.
- Walls, S.C.** and R.G. Jaeger. 1987. Aggression and exploitation as mechanisms of competition in larval salamanders. *Canadian Journal of Zoology* **65**:2938-2944.
- Jaeger, R.G. and **S.C. Walls**. 1989. On salamander guilds and ecological methodology. *Herpetologica* **45**:111-119.
- Walls, S.C.** and R.G. Jaeger. 1989. Growth in larval salamanders is not inhibited through chemical interference competition. *Copeia* **1989**:1049-1052.
- Walls, S.C.**, A. Mathis, R.G. Jaeger and W.F. Gergits. 1989. Male salamanders with high quality diets have faeces attractive to females. *Animal Behaviour* **38**:546-548.
- Walls, S.C.** 1990. Interference competition in post-metamorphic salamanders: interspecific differences in aggression by coexisting species. *Ecology* **71**:307-314.
- Semlitsch, R.D. and **S.C. Walls**. 1990. Geographic variation in the egg-laying strategy of the mole salamander, *Ambystoma talpoideum*. *Herpetological Review* **21**:14-15.
- Walls, S.C.** and R.E. Roudebush. 1991. Reduced aggression toward siblings as evidence of kin recognition in cannibalistic salamanders. *The American Naturalist* **138**:1027-1038.
- Walls, S.C.** and R.D. Semlitsch. 1991. Visual and movement displays function as agonistic behavior in larval salamanders. *Copeia* **1991**:936-942.
- Walls, S.C.** 1991. Ontogenetic shifts in the recognition of siblings and neighbours by juvenile salamanders. *Animal Behaviour* **42**:423-434.
- Walls, S.C.**, A.R. Blaustein and J.J. Beatty. 1992. Amphibian biodiversity of the Pacific Northwest with special reference to old growth stands. *Northwest Environmental Journal* **8**:53-69.
- Walls, S.C.**, J.J. Beatty, B.N. Tissot, D.G. Hokit and A.R. Blaustein. 1993. Morphological variation and cannibalism in a larval salamander (*Ambystoma macrodactylum columbianum*). *Canadian Journal of Zoology* **71**:1543-1551.
- Walls, S.C.**, S.S. Belanger and A.R. Blaustein. 1993. Morphological variation in a larval salamander: dietary induction of plasticity in head shape. *Oecologia* **96**:162-168.
- Semlitsch, R.D. and **S.C. Walls**. 1993. Competition in two species of larval salamanders: a test of geographic variation in competitive ability. *Copeia* **1993**:587-595.

- Blaustein, A.R., T. Yoshikawa, K. Asoh and **S.C. Walls**. 1993. Ontogenetic shifts in tadpole kin recognition: loss of signal and perception. *Animal Behaviour* **46**:525-538.
- Blaustein, A.R., P.D. Hoffman, D.G. Hokit, J.M. Kiesecker, **S.C. Walls** and J. B. Hays. 1994. UV repair and resistance to solar UV-B in amphibian eggs: a link to population declines? *Proceedings of the National Academy of Science USA* **91**:1791-1795.
- Seaman, J.W., Jr., **S.C. Walls**, S.E. Wise and R.G. Jaeger. 1994. Caveat emptor: rank transform methods and interaction. *Trends in Ecology and Evolution* **9**:261-263.
- Walls, S.C.** and A.R. Blaustein. 1994. Does kinship influence density dependence in a larval salamander? *Oikos* **71**:459-468.
- Walls, S.C.** 1995. Differential vulnerability to predation and refuge use in competing larval salamanders. *Oecologia* **101**:86-93.
- Walls, S.C.** and A.R. Blaustein. 1995. Larval marbled salamanders, *Ambystoma opacum*, eat their kin. *Animal Behaviour* **50**:537-545.
- Blaustein, A.R., J.M. Kiesecker, D.G. Hokit and **S.C. Walls**. 1995. Amphibian declines and UV radiation. *BioScience* **45**:514-515.
- Blaustein, A.R., J.M. Kiesecker, **S.C. Walls** and D.G. Hokit. 1996. Field experiments, amphibian mortality, and UV radiation. *BioScience* **46**:386-388.
- Hokit, D.G., **S.C. Walls** and A.R. Blaustein. 1996. Context-dependent kin discrimination in larvae of the marbled salamander, *Ambystoma opacum*. *Animal Behaviour* **52**:17-31.
- Walls, S.C.**, C. S. Conrad, M.L. Murillo and A. R. Blaustein. 1996. Agonistic behaviour in larvae of the Northwestern salamander (*Ambystoma gracile*): the effects of kinship, familiarity and population source. *Behaviour* **133**:965-984.
- Walls, S.C.** 1996. Differences in foraging behaviour explain interspecific growth inhibition in competing salamanders. *Animal Behaviour* **52**:1157-1162.
- Walls, S.C.** 1998. Density dependence in a larval salamander: the effects of interference and food limitation. *Copeia* **1998**:926-935.
- Walls, S.C.** and M.G. Williams. 2001. The effect of community composition on persistence of prey with their predators in an assemblage of pond-breeding amphibians. *Oecologia* **128**:134-141.
- Walls, S.C.**, D.G. Taylor and C.M. Wilson. 2002. Interspecific differences in susceptibility to competition and predation in a species-pair of larval anurans. *Herpetologica* **58**:104-118.
- Muths, E., R.E. Jung, L.L. Bailey, M.J. Adams, P.S. Corn, C.K. Dodd Jr., G.M. Fellers, W.J. Sadinski, C.R. Schwalbe, **S.C. Walls**, R.N. Fisher, A.L. Gallant, W.A. Battaglin and D.E.

- Green. 2005. Amphibian Research and Monitoring Initiative (ARMI): A successful start to a national program in the United States. *Applied Herpetology* **2**:355-371.
- Lichtenberg, J.S., S.L. King, J.B. Grace, and **S.C. Walls**. 2006. Habitat associations of chorusing anurans in the Lower Mississippi River Alluvial Valley. *Wetlands* **26**:736-744.
- Mitchell, J.C. and **S.C. Walls**. 2006. Field notes: *Opheodrys aestivus* (Rough Greensnake). *Catesbeiana* **26**:26-27.
- Mitchell, J.C., J.D. Groves, and **S.C. Walls**. 2006. Keratophagy in reptiles: review, hypotheses, and recommendations. *South American Journal of Herpetology* **1**:42-53.
- Drake, D.L., R. Altig, J.B. Grace, and **S.C. Walls**. 2007. Occurrence of oral defects in larval anurans. *Copeia* **2007**:449-458.
- Mitchell, J. C. and **S. C. Walls**. 2008. Cannibalism. In Sven Erik Jørgensen and Brian D. Fath (Editor-in-Chief), Population Dynamics. Vol. 1 of *Encyclopedia of Ecology*, 5 vols. pp. 513-517. Oxford: Elsevier.
- Mitchell, J.C., **S.C. Walls** and J.W. Beck. 2008. *Virginia striatula* (Rough Earth Snake). Aggregation and urban habitat. *Herpetological Review*. **39**:474-475.
- Rothermel, B. B., **S. C. Walls**, J. C. Mitchell, C. K. Dodd, Jr., L. K. Irwin, D. E. Green, V. M. Vazquez, J. W. Petranka and D. J. Stevenson. 2008. Widespread occurrence of the amphibian chytrid fungus (*Batrachochytrium dendrobatidis*) in the southeastern United States. *Diseases of Aquatic Organisms* **82**:3-18.
- Walls, S.C.** 2009. The role of climate in the dynamics of a hybrid zone in Appalachian salamanders. 24 manuscript pages, accepted for publication in *Global Change Biology*. (2007 Impact factor 4.786).

Manuscripts Currently in Review:

- Faulkner, S., W. Barrow, B. Keeland, **S. Walls**, D. Telesco and D. Fuller. Effects of Conservation Practices on Wetlands in the Mississippi Alluvial Valley. Submitted to *Ecological Applications*.
- Waddle, J.H., R.M. Dorazio, **S.C. Walls**, K.G. Rice, J. Beauchamp, M. Schuman and F.J. Mazzotti. Estimating patterns of co-occurrence for interacting species. Submitted to *Ecological Applications*.
- Walls, S.C.**, J.H. Waddle, and R.M. Dorazio. Estimating occupancy dynamics in an assemblage of anuran amphibians. Submitted to *Journal of Wildlife Management*.
- Barichivich, W.J., **S.C. Walls**, and M.E. Brown. *Ambystoma talpoideum* (Mole Salamander). Late-season oviposition. Submitted as a Natural History Note to *Herpetological Review*.

RESEARCH GRANTS**Proposals Pending:**

- 2009 \$269,618 *“Validation of Amphibian Models for Use in the Southwest Florida Feasibility Study: Evaluation of Pre-restoration Communities and Potential Impacts of Climate Change.”* Submitted to the Broad Agency Announcement, Department of the Interior, Greater Everglades Science.
- 2009 \$ 25,000 *“Wetland pond ecosystems and amphibians: sentinels for assessing the potential consequences of global climate change.”* Submitted to the U.S. Fish and Wildlife Service Quick Response Program for the Southeast Region.

Funded:

- 2008 \$68,250 *“Validation of Amphibian Models for Use in the Southwest Florida Feasibility Study: Evaluation of Pre-restoration Communities and Potential Impacts of Climate Change.”* Funded by USGS Greater Everglades Priority Ecosystems Science Program.
- 2007 \$88,801 Competitive Award from the USGS Amphibian Research and Monitoring Initiative (ARMI): *“Examination of the potential effects of feral hogs (Sus scrofa) on the federally threatened Flatwoods Salamander, Ambystoma cingulatum”*
- 2004 \$70,860 Competitive Award from the USGS Amphibian Research and Monitoring Initiative (ARMI): *“Advancing Froglogger Technology: Leaping into the Future”*.
- 2000 \$ 7,500 Research Award from the Summer Faculty Research Grant Program of The University of Southern Mississippi
- 1997 \$ 7,500 Research Award from the Summer Faculty Research Grant Program of The University of Southern Mississippi
- 1995 \$ 3,852 Research Award from the Black Rock Forest Consortium (Cornwall, New York)
- 1995 \$ 8,200 Research Award from the Professional Staff Congress of The City University of New York (PSC-CUNY).
- 1992 \$ 4,000 National Science Foundation, Research Experiences for Undergraduates Supplemental Grant; co-principal investigator with Dr. Andrew R. Blaustein.
- 1991 \$ 85,000 National Science Foundation (2 years) (*“The ontogeny and adaptive significance of kin recognition in a model amphibian*

system"); co-principal investigator with Dr. Andrew R. Blaustein.

- 1988 \$ 450 Grant-in-Aid of Research, Sigma Xi ("*Geographic variation in the coexistence of two species of larval salamanders (Ambystoma): the role of interspecific competition*").

PRESENTATIONS – INVITED AND OTHER ADDRESSES TO SOCIETIES

- 1983 Walls, S. C. and R. Altig. "Female reproductive biology of two freshwater crustaceans from temporary forest ponds in Mississippi". Presented at the Meeting of the Association of Southeastern Biologists, Lafayette, Louisiana.
- 1984 Walls, S. C. and R. Altig. "The female reproductive biology of the marbled salamander, *Ambystoma opacum*, in Mississippi." Presented at the Combined Meeting of the American Society of Ichthyologists and Herpetologists, Society for the Study of Amphibians and Reptiles, and the Herpetologists' League, Norman, Oklahoma.
- 1986 Walls, S. C. "Aggression, exploitation and fungal infection as mechanisms of competition in larval *Ambystoma*." Presented at the Combined Meeting of the Society for the Study of Amphibians and Reptiles and the Herpetologists' League, Springfield, Missouri.
- 1986 Werner, D. I., S. C. Walls and D. Feener. "Incubation of *Iguana iguana* eggs: conditions and their effect on hatchling quality." Presented at the Combined Meeting of the Society for the Study of Amphibians and Reptiles and the Herpetologists' League, Springfield, Missouri.
- 1987 Walls, S. C., S. A. Mathis and R. G. Jaeger. "Male salamanders have sexy feces." Presented at the Meeting of the Animal Behavior Society, Williamstown, Massachusetts.
- 1987 Walls, S. C. "Aggression in juvenile salamanders: asymmetries in contests for refuges." Presented at the Meeting of the American Society of Zoologists, New Orleans, Louisiana.
- 1988 Walls, S. C. and R. G. Jaeger. "Competition in salamander larvae (*Ambystoma*): is growth inhibited through chemical interference?" Presented at the Combined Meeting of Herpetologists' League, the Society for the Study of Amphibians and Reptiles, and the American Society of Ichthyologists and Herpetologists, Ann Arbor, Michigan.
- 1989 Walls, S. C. "The effects of body size and residency on asymmetric contests among juvenile salamanders." Presented at the Meeting of the Animal Behavior Society, Highland Heights, Kentucky.
- 1990 Walls, S. C. and R. E. Roudebush. "Reduced aggression toward siblings as evidence of kin recognition in cannibalistic salamanders." Presented at the

- Meeting of the Animal Behavior Society, Binghamton, New York.
- 1990 Walls, S. C. "Interspecific differences in foraging behavior explain the differential growth of competing larval salamanders." Presented at the Combined Meeting of the Herpetologists' League and the Society for the Study of Amphibians and Reptiles, New Orleans, Louisiana.
- 1991 Walls, S. C. "Behavioral differences in response to intraguild predation in two competing species of larval *Ambystoma*." Presented at the Combined Meeting of the Herpetologists' League and the Society for the Study of Amphibians and Reptiles, University Park, Pennsylvania.
- 1992 Walls, S. C. "Competition in postmetamorphic *Ambystoma*: implications for juvenile recruitment in the terrestrial environment." **Invited presentation** in the Canadian Association of Herpetologists' Symposium, "Ecology and Evolution of Ambystomatid Salamanders", held at the Combined Meeting of the American Society of Ichthyologists and Herpetologists, the Herpetologists' League, and the American Elasmobranch Society. Urbana-Champaign, Illinois.
- 1992 Walls, S. C., J. J. Beatty, B. N. Tissot, D. G. Hokit and A. R. Blaustein. "Divergent patterns of morphological variation in a polyphenic larval salamander." Presented at the Combined Meeting of the American Society of Ichthyologists and Herpetologists, the Herpetologists' League, and the American Elasmobranch Society. Urbana-Champaign, Illinois.
- 1992 Walls, S. C., A. R. Blaustein and D. G. Hokit. "Ecological correlates of kin recognition." Presented at the Meeting of the Ecological Society of America, Honolulu, Hawaii.
- 1993 Walls, S. C. and A. R. Blaustein. "Aggregation and kin recognition behavior in amphibians." **Invited symposium presentation** at the Meeting of the Animal Behavior Society, University of California at Davis.
- 1993 Walls, S. C., C. S. Conrad and A. R. Blaustein. "Sibling cannibalism in a larval salamander: discriminating cannibals or kamikaze prey?" Presented at the Meeting of the Animal Behavior Society, University of California at Davis.
- 1994 Hokit, D. G., S. C. Walls and A. R. Blaustein. "Context-dependent kin discrimination in a larval salamander (*Ambystoma opacum*)." Presented at the Combined Meeting of the Herpetologists' League/Society for the Study of Amphibians and Reptiles, University of Georgia, Athens.
- 1995 Walls, S. C. "Sibling cannibalism: a side-effect of 'species' recognition?" Presented at the meeting of the Northeast Regional Animal Behavior Society, Smith College, Northampton, Massachusetts.
- 1996 Walls, S. C. "Variation in kinship behavior in larval marbled salamanders: what

- are the ecological and evolutionary factors?" **Invited presentation** in the symposium, "Intraspecific Variation in the Behavior and Ecology of Amphibians", held at the Combined Annual Meeting of the American Society of Ichthyologists and Herpetologists/Herpetologists' League, New Orleans, Louisiana.
- 1997 Walls, S. C. Density dependence in a larval salamander: the contributions of interference and food limitation. Presented at the Combined Meeting of the American Society of Ichthyologists and Herpetologists/Herpetologists' League/Society for the Study of Amphibians and Reptiles, University of Washington, Seattle, Washington.
- 1997 Walls, S. C. and M. G. Williams. "The assembly of communities of pond-breeding amphibians: does high species richness promote coexistence between predators and their prey?" Presented at the Combined Meeting of the American Society of Ichthyologists and Herpetologists/Herpetologists' League/Society for the Study of Amphibians and Reptiles, University of Washington, Seattle, Washington.
- 2000 Lee, A. T., L. D. Yates and S. C. Walls. "Predator-prey interactions between the fishing spider, *Dolomedes vittatus* and the three-lined salamander, *Eurycea guttolineata*." Presented at the Annual Meeting of the Animal Behavior Society, Morehouse College and Zoo Atlanta, 5-9 August 2000.
- 2001 Arnold, J. C. and S. C. Walls. "The effects of genetic relatedness and alternate prey on cannibalism in mosquitofish." Presented at the Annual Meeting of the American Society of Ichthyologists and Herpetologists, Pennsylvania State University, 5-10 July 2001.
- 2001 Walls, S. C., R. Taylor, J. Lichtenberg, and J. Doherty. "The effect of conspecifics on the performance of juvenile spadefoot toads: the consequences of variation in body size." Presented at the Annual Meeting of the Herpetologists' League and the Society for the Study of Amphibians and Reptiles, Indianapolis, IN, 27-31 July 2001.
- 2002 Walls, S. C. "The importance of temporal and environmental variation for species' coexistence in a guild of pond-breeding salamanders." Presented at the combined annual meeting of the American Society of Ichthyologists and Herpetologists; The Herpetologists' League; and The Society for the Study of Amphibians and Reptiles, Kansas City, MO, 3-8 July, 2002.
- 2003 Lichtenberg, J. S., S. L. King, J. B. Grace and S. C. Walls. "Habitat associations of chorusing anurans in the Lower Mississippi River Alluvial Valley." Annual meeting of the Society of Wetland Scientists, New Orleans, LA, June, 2003.
- 2003 Walls, S., K. Wharton, J. Doherty, D. Drake and K. Roberts. "Monitoring anuran calling activity and associated climatic factors at different wetland types." Presented in the Amphibian Research and Monitoring symposium at the annual meeting of the Society of Environmental Toxicology and Chemistry, Austin, TX, 9-13 November, 2003.

- 2003 Walls, S. C., J. L. Doherty, K. Roberts, D. L. Drake, K. L. Wharton and J. McCoy. "The utility of PDAs as automated recording devices: the future frogloggers?" Presented in the Amphibian Research and Monitoring symposium at the annual meeting of the Society of Environmental Toxicology and Chemistry, Austin, TX, 9-13 November, 2003.
- 2003 Drake, D. L., S. C. Walls and R. Altig. "Occurrence of visually-detectable oral defects in larval anurans." Presented in the Amphibian Research and Monitoring symposium at the annual meeting of the Society of Environmental Toxicology and Chemistry, Austin, TX, 9-13 November, 2003.
- 2004 Walls, S. C., K. L. Wharton, J. L. Doherty, D. L. Drake and K. Roberts. "Monitoring anuran amphibians in the Atchafalaya Basin, Louisiana: species richness varies with site hydrology and climate." Presented at the Combined Meeting of the American Society of Ichthyologists and Herpetologists/Herpetologists' League/Society for the Study of Amphibians and Reptiles/American Elasmobranch Society, Norman, OK, 26-31 May, 2004.
- 2004 Drake, D. L., S. C. Walls and R. Altig. "Oral defects in tadpoles from natural sites. Joint meeting of Ichthyologists and Herpetologists." Presented at the Combined Meeting of the American Society of Ichthyologists and Herpetologists/Herpetologists' League/Society for the Study of Amphibians and Reptiles/American Elasmobranch Society, Norman, OK, 26-31 May, 2004.
- 2004 Wharton, K. L., J. L. Doherty, K. Roberts, D. L. Drake and S. C. Walls. "The future frogloggers: PDAs as automated recording devices." Presented at the Combined Meeting of the American Society of Ichthyologists and Herpetologists/Herpetologists' League/Society for the Study of Amphibians and Reptiles/American Elasmobranch Society, Norman, OK, 26-31 May, 2004.
- 2005 Drake, D. L., R. Altig, and S. C. Walls. "Post-injury regeneration of the major components of the oral discs of larval ranids." Presented at the Combined Meeting of the American Society of Ichthyologists and Herpetologists/Herpetologists' League/Society for the Study of Amphibians and Reptiles/American Elasmobranch Society, Tampa, FL, 6-11 July, 2005.
- 2005 Irwin, L., and S. Walls. "A partnership approach to monitoring the health of amphibians in the Lower Mississippi Valley." Presented at the Lower Mississippi River Ecosystem Team Meeting (U.S. Fish & Wildlife Service), Stuttgart, AR, 23-25 August 2005.
- 2006 Walls, S. C., Wharton, K. L., Doherty, J. L., and Drake, D. L. "Relationship between anuran species richness and the composition of bottomland hardwood forests." Joint Meeting of Ichthyologists and Herpetologists, 12-17 July 2006, New Orleans, LA
- 2006 Faulkner, S., W. Barrow, B. Keeland and S. Walls. 2006. **Invited presentation** in the workshop, "Managing Agricultural Landscapes for Environmental Quality: Strengthening the Science Base", organized by the Soil and Water Conservation Society, Kansas City, MO.

- 2007 Walls, S., S. Faulkner, W. Barrow, and B. Keeland. USGS sponsored workshop, “Understanding Agriculture’s Effects on Amphibians and Reptiles in a Changing World”. St. Louis, MO, January 2007.
- 2007 Walls, S., S. Faulkner, W. Barrow, and B. Keeland. “Evaluating wetland restoration practices in the Lower Mississippi Valley: impacts on amphibian species richness.” Joint meeting of Ichthyologists and Herpetologists, St. Louis, MO, 11-16 July 2007.
- 2007 Mitchell, J.C. and S.C. Walls. “Nest Site Selection by Diamond-backed Terrapins (*Malaclemys terrapin*) on Fisherman Island, Virginia.” Joint meeting of Ichthyologists and Herpetologists, St. Louis, MO, 11-16 July 2007.
- 2008 Ball, L. C. and S. C. Walls. “Using Model-Based Monitoring in a National Amphibian Monitoring Program.” **Invited presentation** at the annual meeting of the Society of Conservation Biologists, Chattanooga, TN, 13 July 2008.
- 2008 Rothermel, B. B., S. C. Walls, J.C. Mitchell, C.K. Dodd, Jr., L.K. Irwin, D.E. Green, V.M. Vazquez, J.W. Petranka and D.J. Stevenson. “Widespread Occurrence of *Batrachochytrium dendrobatidis* in the Southeastern United States”. Presented at the annual Joint Meeting of Ichthyologists and Herpetologists, Montreal, Canada, 26 July 2008.
- 2008 Barichivich, W.J., A.W. Demopoulos and S.C. Walls. “Stable isotopes as a tool to determine trophic interactions of feral pigs (*Sus scrofa*) at St. Marks National Wildlife Refuge.” Annual meeting of the Gopher Tortoise Council, Jekyll Island, GA, 4 October 2008.
- 2008 Walls, S.C. “Temporary wetland ecosystems in the face of climate change: an amphibian perspective.” Annual meeting of the Gopher Tortoise Council, Jekyll Island, GA, 4 October 2008.
- 2008 Walls, S. C. 2008. “Temporary wetland ecosystems in the face of climate change: an amphibian perspective.” **Invited Keynote Presentation** in the session, “Climate Change, Wetlands, and Water Resources of the Southeast”. Annual meeting of the South Central and South Atlantic Chapters, Society of Wetland Scientists, University of Alabama, Tuscaloosa, AL, 10 October 2008.
- 2009 Walls, S.C., K.G. Rice and F.J. Mazzotti. “Amphibians as indicators of restoration success in Southwest Florida. Presented at the Joint meeting of Southeast and North Carolina Partners in Amphibian and Reptile Conservation (SEPARC and NCPARC), Montreat, NC, 20 February 2009.
- 2009 Walls, S.C., S.C. Richter, and W.J. Barichivich. “Ephemeral wetland ecosystems in the face of climate change: an amphibian perspective.” Presented at the JMIH, 22-27 July 2009, Portland, OR.

- 2009 Waddle, J.H., S.C. Walls and R.M. Dorazio. "Occupancy dynamics in a Louisiana Assemblage of Anurans". Presented at the JMIH, 22-27 July 2009, Portland, OR.
- 2009 Barichivich, W.J., D.L. Calhoun, A.M. Cressler, M.S. Dalton, W.B. Hughes and S.C. Walls. "*Batrachochytrium dendrobatidis* surveillance in Great Smoky Mountains National Park: implications for environmental monitoring of a disease pathogen." Presented at the JMIH, 22-27 July 2009, Portland, OR.

PRESENTATIONS - INVITED INSTITUTIONAL SEMINARS

1. Smithsonian Tropical Research Institute (Balboa, Panama); February, 1986.
2. Department of Zoology, Oregon State University; October, 1991.
3. Ecology and Evolution Group, Department of Biology, University of Oregon; May, 1992.
4. Department of Biology, Reed College (Portland, Oregon); September, 1992.
5. Department of Biology, Southwest Missouri State University; October, 1992.
6. Department of Biological Sciences, State University of New York - Albany; March, 1993.
7. Department of Biology, The City College of The City University of New York; March, 1993.
8. Mountain Lake Biological Station (Pembroke, Virginia); July, 1994.
9. Columbia University, Seminar on Population Biology; February, 1995.
10. Department of Biology, State University of New York - Cortland; February, 1995.
11. Department of Biology, Hofstra University (Hempstead, New York); February, 1995.
12. Department of Biology, Queens College of The City University of New York; September, 1995.
13. Department of Biological Sciences, The University of Southern Mississippi; April, 1996.
14. American Museum of Natural History Systematics Discussion Group/CUNY Colloquium in Ecology, Evolution, and Behavioral Biology; May, 1996.
15. Department of Biological Sciences, Mississippi State University; November, 1996.
16. Department of Biological Sciences, Southeastern Louisiana State University, May, 1999.
17. Department of Biology, University of Mississippi, January, 2000.
18. Department of Biological Sciences, University of Louisiana at Lafayette, March, 2001.
19. Department of Biology, Stephens College, Columbia, Missouri, April, 2001.
20. Department of Biology, Utica College of Syracuse University, Utica, New York, November, 2001.
21. Keynote speaker at the meeting of the Louisiana Herpetological Research Group, Louisiana Universities Marine Consortium (LUMCON), Cocodrie, Louisiana, November, 2001.
22. National Wetlands Research Center, Lafayette, Louisiana, December, 2001.
23. Florida Integrated Science Center, Gainesville, Florida, December, 2006.
24. Invited seminar, Department of Wildlife Ecology and Conservation, University of Florida, Gainesville, FL, October, 2007.
25. Archbold Biological Station, Lake Placid, FL, April, 2009.

HONORS, AWARDS, AND RECOGNITION

Honors and Recognition

2000, 2004 Who's Who Among America's Teachers

1990-1991 Who's Who Among Students in American Universities and Colleges

Performance Awards

- U.S. Geological Survey Performance Awards received annually: FY00, FY01, FY02, FY03 and FY04

SERVICE ACTIVITIES

Academic Service:

- 2009 Invited external reviewer of the Graduate Program in Environmental Science at Oregon State University. Invited by the Graduate Council of Oregon State University to serve as a representative of prospective employers of the graduates from its program. 3 June 2009.
- The City College of The City University of New York:
 - 1994-1996: University representative to the Board of Directors for the Black Rock Forest Consortium, an alliance of various academic, scientific and cultural institutions engaged in research, education, and conservation in the Black Rock Forest in New York's Hudson Highlands
- College of Science and Technology, University of Southern Mississippi:
 - 1997-2000: Freshman Mentor Program
 - 1998: Summer Faculty Research Grant Committee
- Department of Biological Sciences, University of Southern Mississippi:
 - 1996-2004: member of 16 graduate student committees (5 at The University of Louisiana at Lafayette)
 - 1998-2002: chair of 5 graduate student committees
 - 1998-1999: directed undergraduate Honors Thesis research
 - 1996 - 2000: Freshman Biology Program Committee
 - 1996: Departmental Seminar Series Committee
 - 1997-2000: Graduate Studies Committee
 - 1997-2000: Environmental Biology Committee
 - 1998: Five-Year Planning Committee

Service to U. S. Geological Survey:

- Served on a Research Grade Evaluation (RGE) Panel for Water Resources Division (WRD), Denver, CO (April 2001)
- Served on a Task Force that made recommendations to USGS research scientists affiliated with the Amphibian Research and Monitoring Initiative (ARMI) concerning strategies for conducting "stressors" research on amphibians (August-December 2001)
- Member of a review panel for competitive research proposals for the Amphibian

Research and Monitoring Initiative (ARMI) (2002)

- Served on a Research Grade Evaluation (RGE) Panel for Biological Resources Division (BRD), Sacramento, CA (November 2007)

Service to Partner Agencies (U.S. Department of the Interior):

- Invited participant in National Park Service Scoping Meeting for the Chihuahuan Desert Parks Inventory and Monitoring Network (May 2001)
- Organized/presented tadpole identification workshop for USFWS (Louisiana and Mississippi refuge personnel), held at Lacassine National Wildlife Refuge (25 March 2003)
- Participated in the Biological Review for Catahoula National Wildlife Refuge (U.S. Fish & Wildlife Service), October, 2004
- Invited participant in Great Smoky Mountains National Park Physical Resources Status meeting (June 2009)

Memberships in, and Service to, Professional Societies:

- **Society of Wetland Scientists**
- **Society of Conservation Biologists**
- **American Society of Ichthyologists and Herpetologists**
Elective Offices Held
1999-present: Member of the Editorial Board for *Copeia*
1997-present: Member of the Board of Governors

Committee Assignments

2005-present: ASIH History of the Society Committee
1997: Judge for the Stoye Award in General Herpetology at the annual meeting in Seattle, WA.
1996: Judge for the Stoye Award in Genetics, Development and Morphology at the annual meeting in New Orleans, LA.

- **Herpetologists' League**
Elective Offices Held
2003: Elected to the Executive Council, Class of 2007

Committee Assignments

2005-present: Chair of the Herpetologists' League Nominating Committee
2002-2003: Associate Editor (Ethology) for *Herpetologica*
2002: Co-organizer of a symposium held at the annual meeting in Kansas City, MO.

- **Society for the Study of Amphibians and Reptiles**
Committee Assignments
1994: Judge of student presentations at the annual meeting in Athens, GA.

1990, 1992, 1997, and 2001: chaired paper sessions at the annual joint meeting of the above-three listed societies

- **Partners in Amphibian and Reptile Conservation (PARC)**
2006: Elected as Chair of the National Research Working Group

SCIENTIFIC JUDGEMENT RENDERED

- Reviewer of manuscripts for *Animal Behaviour*; *Behavioral Ecology and Sociobiology*; *Canadian Journal of Zoology*; *Conservation Biology*; *Copeia*; *Diseases of Aquatic Organisms*; *Ecology*; *Ethology*; *Herpetologica*; *Herpetological Review*; *Hydrobiologia*; *Journal of Herpetology*; *Journal of Zoology*; *Oecologia*; *Southwestern Naturalist*; *The Herpetological Journal*, and reviewed a book chapter manuscript for C.K. Dodd, Jr., for *Techniques in Ecology and Conservation*. Oxford University Press.
- Reviewer of proposals for the National Science Foundation, the National Geographic Society, and the National Fish and Wildlife Federation.
- Reviewer of two books for *The Quarterly Review of Biology*: (1) *Cannibalism: Ecology and Evolution among Diverse Taxa*, by M. A. Elgar and B. J. Crespi (1993) and (2) *The Ecology and Behavior of Amphibians*, by K.D. Wells (2008).