

CURRICULUM VITA

Stephen K. Swallow

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Title: Professor

Department of Agricultural and
Resource Economics
University of Connecticut
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EDUCATION

1988	Duke University	Ph.D.	Resource Economics
1986	Duke University	M.S.	Resource Economics
1982	Cornell University	B.S.	Natural Resources and Wildlife Ecology

Ph.D. Dissertation: Economically interdependent stocks and joint optimal allocation of renewable and exhaustible natural resources, with an application to coastal zone development.

EXPERIENCE

January 2011-present Professor of Agricultural and Resource Economics, and Center for Environmental Science and Engineering, University of Connecticut
January 2011-present Adjunct Professor of Resource Economics, University of Rhode Island
July 1999-2010 Professor of Resource Economics, University of Rhode Island
July 1994-June 1999 Associate Professor of Resource Economics, University of Rhode Island
July 1988-June 1994 Assistant Professor of Resource Economics, University of Rhode Island

Research: Economics of environmental resource management, including land conservation and development, interdependent renewable and nonrenewable resources, land use, valuation of environmental resources, public preferences for environmental management, watershed management planning, multiple use forestry, ecosystem management, and the integration of conservation biology and economics of land resources.

Teaching: Valuation of environmental goods and resources, environmental economics. Prior to 2011: Undergraduate course in "Economics of Environmental Resource Management and Policy" (EEC 310); "Environmental Economics and Policy" (EEC 432)/ "Land Resource Economics" (EEC 532); Ph.D. course in "Welfare Economics" (EEC 630, "Applied Resource Analysis"); M.S./Ph.D. course in "Microeconomic Theory" (EEC 528); M.S. seminar "Conservation Biology and Resource Economics"; Undergraduate-Graduate course in "Interdisciplinary Topics in the Coastal Environment"; MS course in environmental economics (EEC 535). Currently emphasizing 528 and 535.

- July-August 1988 USDA Forest Service and Duke University School of Forestry and Environmental Studies, Research Specialist.
 Research in economics of multiple-use forestry.
- 1983 - 1988 Duke University School of Forestry and Environmental Studies and Department of Economics, Teaching and Research Assistant in Natural Resource Economics and Microeconomics, and Associate in Research in resource economics.
- 1979 - 1982 Wildlife Research / Management Technician, summers and part-time: Cornell Biological Field Station, Bridgeport, NY; Missouri Department of Conservation, Columbia, MO; New York Cooperative Wildlife Research Unit, Ithaca, NY.

AWARDS AND HONORS

- 2013-16 Member, U.S. EPA Science Advisory Board's Environmental Economics Advisory Committee
- 2013-present Associate Editor, *Frontiers in Ecology and the Environment*
- 2011-13 DeFavero Fellow, College of Agriculture and Natural Resources, University of Connecticut, research support
- 2008-11 Elected to URI Faculty Senate (2008-11); Elected to Faculty Senate Executive Committee (2008-2010); Elected Chairperson of the Senate (2009-2010; 2010-2011).
- 2006 Faculty Dissertation Chair for Dana Marie Bauer:
 Honorable Mention, Outstanding Ph.D. Dissertation Award (2005) from American Agricultural Economics Association and
 Outstanding Dissertation in Social Sciences, 2004-2005 (awarded 2006), University of Rhode Island
- 2004-2007 National Science Foundation, LTER (Long-Term Ecological Research) Planning and Synthesis Grant, Meeting of 100, member subcommittee on Biotic Structure, member Conference Committee, lead contributor for LTER Integrated Research Plan, of The Decadal Plan for LTER.
- 2004-2007 Editor, *American Journal of Agricultural Economics*, American Agricultural Economics Association
- 2003 Distinguished Member Award, Northeastern Agricultural and Resource Economics Association
- 2001-2004 President-Elect, President, Immediate Past President, Northeastern Agricultural and Resource Economics Association
- 2001-03 Editorial Council, *Journal of Environmental Economics and Management*

- 2000 Citation for Outstanding Research, from URI President and Provost
- 1999 Research Scientist of the Year, College of the Environment and Life Sciences, University of Rhode Island
- 1998 Invited Presenter, U.S. EPA Workshops on “Valuing and Managing Ecosystems” (October) and “Decision-Making and Valuation for Environmental Policy” (April).
- 1997-1999 Director, Association of Environmental and Resource Economists
- 1997 Land Conservation Award, Rhode Island Chapter of The Nature Conservancy (cited for research on public values; shared with Town of Richmond Open Space Preservation Commission)
- 1996 Invited Keynote Speaker, Scandinavian Society of Forest Economics
- 1996 Invited Presenter, Northeastern Agricultural and Resource Economics Association
- 1995-1998 Director, Northeastern Agricultural and Resource Economics Association
- 1994 Invited Discussant for “Value Elicitation in Laboratory Markets,” American Agricultural Economics Association Annual
- 1994-1996 Associate Editor, *Journal of Environmental Economics and Management*
- 1993-1994 Young Investigator, National Academy of Science and Russian Academy of Science
- 1992-1993 Editorial Council, *Journal of Environmental Economics and Management*
- 1992 National Research Highlight, USDA Forest Service Report to Congress for "Economics of Ecosystem Management"
- 1991-1993 Associate Editor, *Wildlife Society Bulletin*
- 1987 Environmental Conservation Fellowship, National Wildlife Federation
- 1986 Environmental Conservation Fellowship, National Wildlife Federation
- 1982 P.F. English Award for "Outstanding performance as an undergraduate," The Wildlife Society, Northeast Section
- 1982 Best Paper, Northeast Wildlife Conference, The Wildlife Society, Northeast Section

1981 Academic scholarship, Cornell University

1978-1982 Cornell National Scholar, Cornell University

PATENTS

Swallow, S.K., L.C. Smith, and C.M. Anderson. "Revenue Raising Auction Processes for Public Goods," Patent No.: US 8,429,023 B2. Date of Patent Apr. 23, 2013. Patent Application 12/653,125 filed December 8, 2009 Associated with NSF grant No DEB0621014 (LTER-VCR) (USPTO Allowance issued 1/16/2013).

PUBLICATIONS

BOOKS

R.J. Johnston and S.K. Swallow (eds.) 2006. *Economics and Contemporary Land Use Policy*. Resources for the Future, Washington, D.C. 309pp.

CHAPTERS

Opaluch, J. J., S. K. Swallow, T. Weaver, C. W. Wessells, D. Wichelns. 1993. Landfill site evaluation based on public preferences concerning impacts on natural and social resources in Rhode Island. Invited presentation in "Economics of Solid Waste Management in R. C. Ready, A. Pagoulators, and W. M. Park, eds., Southern Regional Information Exchange Group-10 and Southern Rural Development Center and Farm Foundation, Mississippi State, MS (SRIEG-10 no. 30), pp. 53-77 Contribution no. 2672).

Wear, D. N. and S.K. Swallow. 1994. The Economics of Location and Forest Management for Multiple Benefits: A Review, Discussion and Speculation. In D.C. Le Master and R.A. Sedjo, eds., *Modeling Sustainable Forest Ecosystems: Proceedings of a Conference in Washington, D.C. November 18-20, 1992*, American Forests, Washington, D.C., pp. 106-121.

Swallow, S.K. 1997. Modeling Public Preferences for Environmental Management Planning and Decisions. O. Saastamoinen and S. Tikka, eds., *Proceedings of the Biennial Meeting of the Scandinavian Society of Forest Economics. Mekrijärvi, Finland, March 1996*. *Scandinavian Forest Economics*,36:23-41.

Johnston, R.J., and S.K. Swallow. 2006. Introduction: *Economics and Contemporary Land Use Policy*. Pages 1-18 in R.J. Johnston and S.K. Swallow (eds.) *Economics and Contemporary Land Use Policy*. Resources for the Future, Washington, D.C.

Johnston, R.J., S.K. Swallow, D.M. Bauer, and L.D. Philo. 2006. Support for Conservation Policies and Values for Conservation. Pages 23-266 in R.J. Johnston and S.K. Swallow (eds.) *Economics and Contemporary Land Use Policy*. Resources for the Future, Washington, D.C.

Johnston, R.J., S.K. Swallow, D.M. Bauer, E. Uchida, C.M. Anderson. 2014. Connecting Ecosystem Services to Land Use: Implications for Valuation and Policy. Chapter 8 in J.M. Duke and JJ Wu (eds.), *The Oxford Handbook of Land Economics*, Oxford University Press, 196-225.

Smith, Elizabeth C., and Stephen. K. Swallow. 2013. Lindahl Pricing for Public Goods and Experimental Auctions for the Environment. In, Jason Shogren (ed.) *Encyclopedia of Energy, Natural Resource, and Environmental Economics*, volume 3, pp. 45-51. Amsterdam: Elsevier.

ARTICLES IN REFEREED JOURNALS

Swallow, S. K., R. J. Gutiérrez, and R. A. Howard, Jr. 1986. Snag versus forest characteristics as determinants in primary cavity-site selection by birds. *Journal of Wildlife Management* 50(4):576-583.

Swallow, S. K., R. A. Howard, Jr., and R. J. Gutiérrez. 1988. Snag preferences of woodpeckers foraging in a northeastern hardwood forest. *Wilson Bulletin* 100(2):236-246.

Swallow, S. K., and C. M. Marin. 1988. Long run price inflexibility and efficiency loss for municipal water supply. *Journal of Environmental Economics and Management* 15(2):233-247.

Swallow, S. K., P. J. Parks and D. N. Wear. 1990. Policy relevant nonconvexities in the production of multiple forest benefits. *Journal of Environmental Economics and Management* 19(3):281-296. (RI AES Contribution no. 2492.)

Swallow, S. K. 1990. Depletion of the environmental basis for renewable resources: The economics of interdependent renewable and nonrenewable resources. *Journal of Environmental Economics and Management* 19(3):264-280. (RI AES contribution no. 2475.)

Swallow, S. K., J. J. Opaluch, and T. Weaver. 1992. Siting noxious facilities: An approach that integrates technical, economic, and political considerations. *Land Economics* 68(3):283-301. (RI AES Contribution no. 2668.)

Opaluch, J. J., S. K. Swallow, T. Weaver, C. W. Wessells, and D. Wichelns. 1993. Evaluating impacts from noxious facilities: Including public preferences in current siting mechanisms. *Journal of Environmental Economics and Management* 24(1):41-59. (RI AES Contribution no. 2638.)

Wichelns, D., J. J. Opaluch, S. K. Swallow, T. F. Weaver, and C. W. Wessells. 1993. A landfill site evaluation model that includes public preferences regarding natural resources and nearby communities. *Waste Management & Research* 11:185-201.

- Swallow, S. K., and D. N. Wear. 1993. Spatial interactions in multiple-use forestry and substitution and wealth effects for the single stand. *Journal of Environmental Economics and Management* 25(2):103-120. (RI AES Contribution no. 2713.)
- Swallow, S. K., T. Weaver, J. J. Opaluch, and T. S. Michelman. 1994. Heterogeneous preferences and aggregation for environmental policy assessment: A landfill siting case. *American Journal of Agricultural Economics* 76(3):431-443. (RI AES Contribution no. 2795.)
- Swallow, S. K. 1994. Intra-season harvest regulation for fish and wildlife recreation: An application to fishery policy. *American Journal of Agricultural Economics* 76(4):924-935. (RI AES Contribution no. 2718.)
- Swallow, S. K. 1994. Renewable and nonrenewable resource theory applied to coastal agriculture, forest, wetland, and fishery linkages. *Marine Resource Economics* 9(4):291-310. (RI AES Contribution no. 3024).
- Swallow, S.K. 1994. Value elicitation in laboratory markets: Discussion and applicability to contingent valuation. *American Journal of Agricultural Economics* 76(5):1096-1100. (Invited discussion for 1994 Annual Meetings of American Agricultural Economics Association, San Diego, CA, August 10.) (RI AES Contribution no. 3025).
- Johnston, R. J., T. F. Weaver, L. A. Smith, and S. K. Swallow. 1995. Contingent valuation focus groups: Insights from ethnographic interview techniques. *Agricultural and Resource Economics Review* 24(1):56-69. (RI AES Contribution no. 3093).
- Swallow, S. K. 1996. Resource Capital Theory and Ecosystem Economics: Developing Nonrenewable Habitats with Heterogeneous Quality. *Southern Economic Journal* 63(1):106-123. (RI AES Contribution no. 3173)
- Swallow, S.K. 1996. Economic Issues in Ecosystem Management: An Introduction and Overview. *Agricultural and Resource Economics Review* 25(2):83-100. (RI AES Contribution no. 3399) (Invited paper presented to the 1996 Annual Meeting of the Northeastern Agricultural and Resource Economics Association.)
- Swallow, S.K., P. Talukdar, and D.N. Wear. 1997. Spatial and Temporal Specialization in Forest Ecosystem Management under Sole Ownership. *American Journal of Agricultural Economics* 79(2):311-326. (RI AES Contribution no. 3351)
- Spencer, M.A., S.K. Swallow, and C.J. Miller. 1998. Valuing Water Quality Monitoring: A Contingent Valuation Experiment Involving Hypothetical and Real Payments. *Agricultural and Resource Economics Review* 26(1):28-42. (RI AES Contribution no. 3567)

- J. Kline and S.K. Swallow. 1998. The Demand for Local Access to Coastal Recreation in Southern New England. *Coastal Management* 26(3):177-190. (RI AES Contribution no. 3590)
- Johnston, R.J., and S.K. Swallow. 1999. Asymmetries in Ordered Strength of Preference Models: Implications of Focus Shift for Discrete Choice Preference Estimation. *Land Economics* 75(May):295-310. (RI AES Contribution no. 3608)
- R.J. Johnston, Stephen K. Swallow, and Thomas F. Weaver. 1999. Estimating Willingness to Pay and Resource Trade-offs with Different Payment Mechanisms: An Evaluation of a Funding Guarantee for Watershed Management. *Journal of Environmental Economics and Management* 38(July):97-120. (RI AES Contribution no. 3688)
- Swallow, S.K., and R.A. Sedjo. 2000. Eco-Labeling Consequences in General Equilibrium: A Graphical Assessment. *Land Economics* 76(February):28-36. (RI AES Contribution no. 3732)
- Swallow, S.K., J.J. Opaluch, and T.F. Weaver. 2001. Ordered-Response Model for Ordinarily Dichotomous, Discrete Choice Data. *Journal of Environmental Economics and Management* 41(January):70-93. (RI AES Contribution no. 3574)
- Sedjo, R.A., and S.K. Swallow. 2002. Voluntary Eco-Labeling and the Price Premium. *Land Economics* 78(2):272-284. (RI AES Contribution no. 3885)
- Johnston, R.J., D.M. Bauer, S.K. Swallow. 2002. Spatial Factors and Stated Preference Values for Public Goods: Considerations for Rural Land Use. *Land Economics* 78(4):481-500.
- R.J. Johnston, S.K. Swallow, C.W. Allen, and L.A. Smith. 2002. Designing Multidimensional Environmental Programs: Assessing Tradeoffs and Substitution in Watershed Management Plans. *Water Resources Research* 38(7): IV1-13.
- Johnston, R.J., S.K. Swallow, D.M. Bauer, C.M. Anderson. 2003. Preferences for Residential Development Attributes and Support for the Policy Process: Implications for Management and Conservation of Rural Landscapes. *Agricultural and Resource Economics Review* 32(1): 65-82.
- Johnston, Robert J., Stephen K. Swallow, Timothy J. Tyrrell, and Dana Marie Bauer. 2003. "Rural Amenity Values and Length of Residency," *American Journal of Agricultural Economics* 85(4):1000-1015.
- Bauer, Dana Marie, Nicole E. Cyr, Stephen K. Swallow. 2004. Public Preferences for Compensatory Mitigation of Salt Marsh Losses: A Contingent Choice of Alternatives in Rhode Island. *Conservation Biology* 18(2):401-411.

- Swallow, Stephen K., and Marisa Mazzotta. 2004. Assessing Public Priorities for Experiment Station Research: Contingent Value and Public Preferences for AES Research in Rhode Island. *American Journal of Agricultural Economics* 86(4):975-989.
- Jiang, Yong, Stephen K. Swallow, and Michael P. McGonagle. 2005. Context-Sensitive Benefit Transfer Using Stated Choice Models: Specification and Convergent Validity for Policy. *Environmental and Resource Economics* 31(August): 477-499.
- McGonagle, M.P. and S.K. Swallow. 2005. Open Space and Public Access: A Contingent Choice Application to Coastal Preservation. *Land Economics* 81(4):477-495.
- Swallow, S.K., and M.P. McGonagle. 2006. Public Funding of Environmental Amenities: Contingent Choices using New Taxes or Existing Revenues for Coastal Land Conservation. *Land Economics* 82(1):56-67.
- Jiang, Yong, Stephen K. Swallow, and Peter W.C. Paton. 2007. Designing a Spatial-explicit Nature Reserve Network Based on Ecological Functions: An Integer Programming Approach Biological Conservation. *Biological Conservation* 140:236-249. (AES Contr. No. 5127)
- Swallow, Stephen K., Elizabeth C. Smith, Emi Uchida, and Christopher M. Anderson. 2008. Ecosystem Services beyond Valuation, Regulation, and Philanthropy: Integrating Consumer Values into the Economy. *Choices* 23(2):47-52. (AES Contr. No. 5142) <http://www.choicesmagazine.org/magazine/article.php?article=21>
- Das, Chhandita, Christopher Anderson and Stephen Swallow. 2009. Direct Estimation of Distributions of Willingness to Pay for Heterogeneous Populations. *Southern Economic Journal* 75(3):593-610. (RI AES Contr. No. 5145)
- Spencer, M.A., S.K.Swallow, J.F. Shogren, and J.A. List. 2009. Rebate Rules in Threshold Public Good Provision. *Journal of Public Economics* 93(5-6):798-806. (AES Contr. No. 5153)
- Bauer, D.M., P.W.C. Paton, S.K. Swallow. 2009. "Are Wetland Regulations Cost-Effective for Species Protection? A Case Study of Amphibian Metapopulations." *Ecological Applications* 20(3):798-815.
- John B. Braden, Daniel G. Brown, Jeff Dozier, Patricia Gober, Sara M. Hughes, David R. Maidment, Sandra L. Schneider, P. Wesley Schultz, James S. Shortle, Stephen K. Swallow, and Carol M. Werner. 2009. "Social science in a water observing system." *Water Resources Research* 45, W11301, doi:10.1029/2009WR008216
- Bauer, D.M., S.K. Swallow, and P.W.C. Paton. 2010. Cost-Effective Conservation of Wetland Species in Exurban Communities: A Spatial Analysis. *Resource and Energy Economics* 32(2):180-202.

- Newell, L.W., and **S.K. Swallow**. 2013. Real-Payment Choice Experiments: Valuing Forested Wetlands and Spatial Attributes within a Landscape Context. *Ecological Economics* 92(August):37-47. <http://dx.doi.org/10.1016/j.ecolecon.2012.08.008>
- Swallow, Stephen K. 2013. Demand-side Value for Ecosystem Services and Implications for Innovative Markets: Experimental Perspectives on the Possibility of Private Markets for Public Goods. *Agricultural and Resource Economics Review* 42(1):33-56.
- Bauer, Dana Marie, and Stephen K. Swallow. 2013. Conserving Metapopulations in Human-Altered Landscapes at the Urban-Rural Fringe. *Ecological Economics* 95(November):159-170. <http://dx.doi.org/10.1016/j.ecolecon.2013.08.013>
- Jiang, Yong, and Stephen K. Swallow. 2014. Providing an Ecologically Sound Community Landscape at the Urban-Rural Fringe: A Conceptual, Integrated Model. *Journal of Land Use Science* (in press) (DOI: 10.1080/1747423X.2014.898103) .
- Kafle, A., S.K. Swallow, and E.C. Smith. 2015. Does Public Funding Affect Preferred Tradeoffs and Crowd-in or Crowd-out Willingness to Pay? A Watershed Management Case. *Environmental and Resource Economics* 60:471-495 (DOI 10.1007/s10640-014-9782-z)

REFEREED IN PROGRESS (selected)

- Smith, Elizabeth C., Stephen K. Swallow. 2014. An Individualized Price Auction for Public Goods, Selling Ecosystem Services Locally. In revision
- Uchida, Emi, Stephen K. Swallow, Arthur Gold, James Opaluch, Achyut Kafle, Nathaniel Merrill, Clayton Michaud, and Carrie Anne Gill. 2015. Integrating Watershed Hydrology and Economics to Establish a Market Process for Water Quality: A Field Experiment. In review, *Frontiers in Ecology and the Environment*.
- Zhi Li, Christopher M. Anderson, and Stephen K. Swallow. 2015. Uniform Price Mechanisms for Threshold Public Goods Provision with Private Value Information: Theory and Experiment. In revision for submission.
- Zhi Li, Christopher M. Anderson, and Stephen K. Swallow. 2015. Uniform Price Mechanisms for Threshold Public Goods Provision with Complete Information: An Experimental Investigation. In revision for third round review by *Journal of Public Economics*.
- Swallow, Stephen K., Christopher M. Anderson, and Emi Uchida. 2015. The Bobolink Project: Selling Public Goods from Ecosystem Services Using Provision Point Mechanisms. Submitted for second review, *American Journal of Agricultural Economics*.
- Liu, Pengfei, S.K. Swallow, C.M. Anderson. 2014. Threshold Level Public Goods Provision with Multiple Units: Experimental Effects of Disaggregated Groups with Rebates. Submitted for second review, *Land Economics*.

Kafle, Achyut, and Stephen K. Swallow. 2015. Order Effects in Repeated Multinomial Choices: Evidence from a Choice Experiment Regarding Wetland Preservation. In review, *American Journal of Agricultural Economics*

Bauer, D.M., S.K. Swallow, P Liu, R.J. Johnston. 2013. Assessing Rural Residents' Willingness to Exchange Town Amenities and Development Services. In revision for second review, *Agricultural and Resource Economics Review*.

Haskell, J., Emi Uchida, Hiro Uchida, Stephen Swallow. 2011. Willingness-to-Pay for Ecosystem Services: Do Payment Elicitation Mechanisms Matter? In revision for review by *Environmental and Resource Economics*.

Jiang, Yong, and S.K. Swallow. 2011. Application of Impact Fees Coupled with Conservation Payments in Public Provision of Environmental Goods at the Urban-Rural Fringe: A Conceptual Model with and Empirical Application. In preparation.

Whinstanley Newell, L., and S.K. Swallow. 2005. Are Stated Preferences Invariant to the Prospect of Real Money Choice? In revision for second review, *American Journal of Agricultural Economics*.

Whinstanley Newell, L., and S.K. Swallow. 2002. Developing a Stated Preference Survey Involving Real Money Choice. Working Paper, Department of Environmental and Natural Resource Economics, University of Rhode Island (manuscript in progress).

Jiang, Yong, and S.K. Swallow. 2009. "Residential Development, Habitat, and 'Takings:' an Impact Fee Framework Coupled with Market-Based land Conservation Programs to Seek a Balance in Regulating Private Land of Public Ecosystem Value." Unpublished manuscript.

BOOK REVIEWS

Swallow, S.K. 1997. "Biodiversity Loss: Economic and Ecological Issues Edited by Charles Perrings, Karl-Göran Mäler, Carl Folke, C.S. Holling, and Bengt-Owe Jansson, Cambridge: Cambridge University Press, 1995, Pp. ix, 332. *Southern Economic Journal*, July.

PAPERS PRESENTED

Swallow, S. K. and R. J. Gutiérrez. 1982. Snag and forest characteristics of roosting and nesting sites preferred by cavity-nesting birds: a multivariate approach. Presented to 1982 annual meeting of the Northeast Section of the Wildlife Society, Cherry Hill, NJ.

Swallow, S. K. 1989. Renewable and exhaustible resource theory applied to North Carolina shrimp and coastal development. Paper presented to 1989 Annual Meeting of American Agricultural Economics Association, Baton Rouge, LA, July 28-Aug. 2; Dept. Resource Economics, Univ. Rhode Island, Staff Paper no. 89-02 (RI AES Contribution no. 2523).

Ganapathy, U. and S. K. Swallow. 1990. Trade-offs between renewable and nonrenewable resources: Oil development and caribou in the Arctic National Wildlife Refuge. Presented to 1990 Annual Meeting of the American Agricultural Economics Association, Vancouver, B.C., Canada, Aug. 4-8; Dept. Resource Economics, Univ. Rhode Island, Staff Paper no. 90-07 (RI AES Contribution no. 2637).

Swallow, S. K. 1990. Intra-season regulation and economic efficiency in recreational fisheries: An application to Pacific salmon. Presented to 1990 Annual Meeting of the American Agricultural Economics Association, Vancouver, B.C., Canada, Aug. 4-8; Dept. Resource Economics, The Univ. Rhode Island, Staff Paper no. 90-06 (RI AES Contribution no. 2584).

Swallow, S. K., D. Wichelns, J. J. Opaluch, and T. Weaver. 1990. A new approach to siting noxious facilities within old political-regulatory paradigms: Some insights from a New England landfill siting process. Presented to 1990 Annual Meeting of the Northeastern Agricultural and Resource Economics Association, June 18-20, Truro, Nova Scotia, Canada. Dept. Resource Economics, Univ. Rhode Island, Staff Paper no. 90-08 (RI AES Contribution no. 2652).

Swallow, S. K., T. Weaver, J. J. Opaluch, D. Wichelns. 1991. Contingent surveys for policy evaluation and differential impacts on socioeconomic groups: A landfill siting case. Presented to 1991 Annual Meeting of the Northeastern Agricultural and Resource Economics Association, June 17-19, Durham, NH (RI AES Contribution no. 2660).

Opaluch, J. J., S. K. Swallow, T. Weaver, C. W. Wessells, D. Wichelns. 1991. Evaluating impacts from noxious facilities: Including public preferences in current siting mechanisms. Presented to 1991 Annual Meeting of European Association of Environmental and Resource Economics, Stockholm, Sweden, June 10-14 (presented by J. J. Opaluch).

Opaluch, J. J., S. K. Swallow, T. Weaver, C. W. Wessells, D. Wichelns. 1991. A contingent survey for landfill siting. Presented to 1991 Annual Meeting of the American Agricultural Economics Association, Manhattan, Kansas, August 4-7 (presented by J. J. Opaluch).

Swallow, S. K. 1992. "Some Economic Perspectives on Biological Diversity: Solid Points that Miss the Point." Panel discussion on "Biodiversity Research: Is there a Role for New York State?," The New York Natural History Conference II, April 29-May 1, Albany. New York State Museum Circular 54.

Swallow, S. K. and D. N. Wear. 1992. Spatial interactions between forest stands managed for multiple uses: A simple extension of the Hartman model. Presented to 1992 Annual Meeting of the American Agricultural Economics Association, Baltimore, MD, August 9-12 (RI AES Contribution no. 2755).

Opaluch, J. J., S. K. Swallow, T. Weaver, C. W. Wessells, D. Wichelns. 1993. Landfill site evaluation based on public preferences concerning impacts on natural and social resources in Rhode Island. Invited presentation in "Economics of Solid Waste Management in the 90s: Proceedings of a Regional Workshop" (April 18, 1991, Lexington, KY), R. C. Ready, A. Pagoulators, and W. M. Park, eds., Southern Regional Information Exchange Group-10 and Southern Rural Development Center and Farm Foundation, Mississippi State, MS (SRIEG-10 no. 30), pp. 53-77 (Presented by S. K. Swallow) (RI AES Contribution no. 2672).

Johnston, R. J., T. F. Weaver, L. A. Smith, and S. K. Swallow. 1993. Using Ethnographic Methodology in Focus Groups to Improve Contingent Valuation: An Introduction to Theory and Application. Presented to Annual Meeting of the Northeastern Agricultural and Resource Economics Association, Mystic, CT, June 19-21 (RI AES Contribution no. 2926).

Talukdar, P., S. K. Swallow, and D. N. Wear. 1993. Interdependent Forest Stands with Locationally Unique Inputs to Ecosystem Outputs: A Two Stand Forest under One Management. Presented to the 1993 Annual Meeting of the Northeastern Agricultural and Resource Economics Association, Mystic, CT, June 19-21 (RI AES Contribution no. 2867).

Swallow, S. K., T. F. Weaver and J. J. Opaluch. 1993. Ordered-Response Model for Ordinarily Dichotomous Referendum, Contingent Valuation Data. Presented to the 1993 Annual Meeting of the American Agricultural Economics Association, Orlando, FL, August 1-4 (RI AES Contribution no. 2847).

Swallow, S.K., T. F. Weaver, L. A. Smith, and R. J. Johnston. 1994. Economic Tradeoffs: An Example from Watershed Management. Presented to Society of Soil Scientists of Southern New England Conference on Riparian Buffer Zones, Sturbridge, MA, November 21-22.

Swallow, S.K., T.F. Weaver, L.A. Smith, and R.J. Johnston. 1995. Designing Environmental Programs: Policy Relevant Payment Vehicles, In-kind Tradeoffs, Substitute Values, and Watershed Management Planning. Presented to the 1995 Annual Meeting of the American Association of Agricultural Economists and Summer Meeting of the Association of Environmental and Resource Economists, August 6-9, Indianapolis, IN. (RI AES Contribution no. 3198)

Opaluch, J.J. and S.K. Swallow. 1996. Methods for Interpreting Strength of Preference indicators. Presented to INFORMS Annual Meeting, for National Science Foundation and U.S. Environmental Protection Agency (May).

Sedjo, R. A., S.K. Swallow, and A. Goetzl. 1997. Forest Products Trade and Certification: An Economic Assessment. Presented to Workshop on "Forest Certification and Sustainability Indicators: Economic Perspectives," The Lodge at Kananaskis, Kananaskis Village, Alberta, Canada, February 20-22. Voluntary paper prepared for the World Forestry Congress, Antalya Turkey 13-22 October, 1997. (drafted October 17, 1996.)

- Swallow, S.K. and R. A. Sedjo. 1997. Some Simple Analytics of Eco-Labeling of Wood Products: Are the Market and Ecosystem Implications Clear? Presented to the Annual Meetings of the Northeastern Agricultural and Resource Economics Association, Sturbridge, MA, June 22-24.
- Swallow, S.K., M.A. Spencer, C.J. Miller, P. Paton, R. Deegen, J. Shogren. 1998. Stated Preference Valuation Using Real Money for Real Forested Wetlands. In *Proceedings: 1998 Decision-Making and Valuation for Environmental Policy Workshop, 2-3 April, 1998, Washington, D.C.* Sponsored by NSF/EPA Partnership for Environmental Research.
- Sedjo, Roger A. and S.K. Swallow. 1998. Some Analytics and Implications of Eco-Labeling. Presented to the First World Congress of Environmental and Resource Economists, June 25-27, Venice, Italy.
- Swallow, S.K. 1998. The Value of Open Space Preservation, or the Economic Loss from Open Space Development, in Richmond, Rhode Island. Presented to *The Seventh International Symposium on Society and Resource Management*, May 27-31, Columbia, MO.
- Swallow, S.K. and M. McGonagle. 1998. Preferences and Willingness to Pay of Barbados' Residents for Alternative Sewage System Designs to Protect Water Quality on Barbados' West Coast. Presented to *The Seventh International Symposium on Society and Resource Management*, May 27-31, Columbia, MO.
- Swallow, S.K. 1998. Public Preferences for Open Space Preservation. Presented to Rhode Island's Critical Lands Workshop, Sponsored by URI Cooperative Extension, July 17, URI Alton Jones Conference Center, West Greenwich, Rhode Island.
- Poirier, N. and S. Swallow. 1998. Contingent Valuation of Salt Marsh Mitigation. Presented to the Annual Meeting of The Wildlife Society, Buffalo, NY, September.
- Swallow, S.K. 1998. Methods and Applications for Ecosystem Valuation: A Collage. Presented to NSF/EPA Workshop in "Valuing and Managing Ecosystem Resources: Economic Research Supported by NSF/EPA," October 29, Washington, D.C.
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Service Markets. Presented to Fourth World Congress of Environmental and Resource Economists, Montreal, Canada, June 28 to July 2, 2010. (paper link: <http://www.webmeets.com/WCERE/2010/Prog/> , Session: Environmental Valuation: Methodology III, Wednesday 30 June 2010, 2:00:00 PM - 3:45:00 PM)

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Greenfield, Josh, Stephen Swallow, Christopher Anderson. 2009. "Marketing ecosystem services using the bobolink as an example." Poster presented to the URI Coastal Fellows Program, December.

Gaudio, Rachel, Stephen Swallow, Christopher Anderson. 2009. "A survey of customer attitudes at Rhode Island farmers markets and their effect on marketing ecosystem services." Poster presented to the URI Coastal Fellows Program, December.

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Smith, Elizabeth C. and Stephen Swallow. 2010. Generating Revenues from WTP for Ecosystem Restoration: An Auction Experiment on Public Goods. Presented to the Annual Meeting of the Agricultural and Applied Economics Association, July 25-27, Denver, CO

Swallow, Stephen. 2010. Public value and consumer markets for ecosystem services. Presented to Workshop on Scale, location, and spatial interactions in the economic analysis of multi-functional natural resources: Lessons for forestry. Laboratoire d'Economie Forestière, 16-17 September, Nancy, France.

Swallow, Stephen. K. 2010. Experimental markets for connecting ecosystem services to consumers' values and decision support. Presented to ACES: A Community on Ecosystem Services, December 6-9, 2010, Gila River Indian Community, Arizona.

Swallow, S.K. 2011. Integrating Social Sciences with Long-Term Ecological Research: Perspectives in Economics from VCR and LTER Decadal Plan. Invited presentation to the All Scientists Meeting, Luquillo Long Term Ecological Research Site, Puerto Rico, January 4-5.

- Bauer, D.M., P.W.C. Paton, and S.K. Swallow. 2011. Are wetland buffers cost-effective for species protection? Invited presentation at the Wetland Buffers Symposium: Theory, Science, Policy and Implementation. Baraboo, WI, February 16-17.
- Swallow, S.K., with C.M. Anderson, E. Uchida, and E.C. Smith. 2011. Experimental Markets for Ecosystem Services: Can Society Incorporate Public Goods into the Business Economy? Presented to the 5th Connecticut Conference Natural Resources, March 7, University of Connecticut, Storrs, CT.
- Swallow, Stephen. 2011 “Experimental Economics and an Experimental Market or Auction for Funding Public goods: Applications to Ecosystem Services and Restoration.” Presented to Environmental Seminar Series 2011, Pennsylvania State University, State College, PA, April 13.
- Smith, Elizabeth C., and Stephen K. Swallow. 2011. A Comparison of field and Lab Experiments in a Lindahl-Inspired Auction for Public Goods: Application to Ecosystem Restoration. Presented to Association of Environmental and Resource Economists’ Summer Conference, Seattle Renaissance Hotel, June 8-10.
- Swallow, Stephen K., Christopher M. Anderson, Pengfei Liu, and Zhi Li. 2011. Developing Ecosystem Services Businesses as New Revenues for Farms in Communities Facing Exurban Development. Presented to the USDA/NIFA/AFRI Project Director’s Meeting, Miami, FL. November 7-9.
- Swallow, Stephen K. 2012. Demand-Side Values for Ecosystem Services and Implications for Innovative Ecosystem Service Markets. Invited Plenary Speaker, 2012 NAREA [Northeastern Agricultural and Resource Economics Association] Workshop, The Economics of Agricultural and Rural Ecosystem Services, June 12-13, Lowell, MA.
- Liu, Pengfei, Swallow, Stephen K. and Anderson, Christopher M., ASSESSING A PROVISION GAME FOR TWO UNITS OF A PUBLIC GOOD, WITH DIFFERENT GROUP ARRANGEMENTS, MARGINAL BENEFITS, AND REBATE RULES: EXPERIMENTAL EVIDENCE, No 123205, 2012 Annual Meeting, August 12-14, 2012, Seattle, Washington, Agricultural and Applied Economics Association.
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- Santos, Julie I, Emi Uchida, Christopher Anderson, Stephen Swallow. 2012. Using Stated Preferences to Predict Outcomes in Markets for Ecosystem Services: Accounting for

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- Swallow, S.K. 1995. An Assessment of the Potential Recreation Value of Sand Nourishment to Create a 3000 to 6000 Foot, Recreational Beach along Plymouth Long Beach, Plymouth, Massachusetts. Swallow Environmental Economics, Wyoming, RI, November 1.
- Swallow, S.K. 1996. A Preliminary Report on the Richmond Open Space Survey, Town of Richmond, Rhode Island. Submitted to Town of Richmond, January 18. 10pp.
- Swallow, S.K. and Jeffrey Kline. 1996. Benefit Assessment of the Gooseberry Island Causeway, Managed by Horseneck Beach State Park, Massachusetts. Submitted to Aubrey Consulting, Inc., Cataumet, MA by Swallow Environmental Economics, Wyoming, RI, June 30. 24pp.+ app.
- Swallow, S.K. and Michael McGonagle. 1996. Residents' Preferences for Design of Barbados' West Coast Sewerage Project. Submitted to Stanley International Group Inc., St. James, Barbados, W.I. and Edmonton, Alberta, Canada by Swallow Environmental Economics, Wyoming, RI. November 9. 45pp. + 3 App.
- Alexander, Martin E., Nathan C. Benson, Timothy J. Brown, Norman L. Christensen, Jr., Hanna J. Cortner, Philip N. Omi, R. Gordon Schmidt, Ayn Shilisky, Stephen K. Swallow. 2007. U.S. Forest Service R&D Wildland Fire External Peer Review, June 18-21. Report to the Chief, U.S. Forest Service, 22pp.
- Liu, Pengfei, Stephen K. Swallow, and Christopher M. Anderson. 2011. Assessing a Provision Game for Two Units of a Public Good, with Different Group Arrangements, Marginal Benefits, and Rebate Rules: Experimental Evidence. Zwick Center for food and Resource Policy, Department of Agricultural and Resource Economics, University of Connecticut, Working Paper Series No. 5, 39pp.

- Kafle, Achyut, Stephen Swallow, and Elizabeth Smith. 2011. "Effects of Public Funding on Local Tradeoffs and Willingness to Pay (WTP) in a Choice Experiment: Blackstone River Watershed Management" Zwick Center for food and Resource Policy, Department of Agricultural and Resource Economics, University of Connecticut, Working Paper Series No.6, 43pp.
- Liu, Pengfei, Stephen K. Swallow, Christopher M. Anderson. 2013. Threshold Level Public Goods Provision with Multiple Units: Experimental Effects of Disaggregated Groups with Rebates. Zwick Center for Food and Resource Policy, Department of Agricultural and Resource Economics, University of Connecticut, Working Paper Series No. 24, 40pp.
- Bauer, Dana Marie, Stephen K. Swallow, Pengfei Liu, Robert J. Johnston. 2013. Do Exurban Communities Want More Development? Zwick Center for food and Resource Policy, Department of Agricultural and Resource Economics, University of Connecticut, Working Paper Series No. 25, 41pp.
- Swallow, Stephen K., Pengfei Liu, Eric Seabloom, Elizabeth Borer. 2013. A Simple Lesson in Economic Valuation: Do Scientists Value Expanding the Nutrient Network? Zwick Center for food and Resource Policy, Department of Agricultural and Resource Economics, University of Connecticut, Working Paper Series No. 26, 26pp.

NEWSLETTER ITEMS

- Swallow, S.K. 1992. "Some unofficial comments from an Associate Editor of the Wildlife Society Bulletin." Human Dimensions in Wildlife Newsletter 11(4):3-4.
- Swallow, S.K. 1994. "Observations from Northwestern Russia: Opportunities in Natural Resource Management, Nonmarket Valuation, and Environmental Economics. AERE Newsletter 14(1, May):18-22.
- Swallow, S.K. 1998. "URI Research Project Seeks to Set Public Value of Forest Stewardship." *The Forest Conservationist* 8(1, Winter):4. (Published by Rhode Island Forest conservator's Organization, Inc.)
- Swallow, S.K. 2001. "2002 NAREA Annual Meetings." Northeastern Agricultural and Resource Economics Association Newsletter, Fall 2001, page 2-3.
- Swallow, S.K. 2002. "2002 NAREA Annual Meetings." Northeastern Agricultural and Resource Economics Association Newsletter, Spring 2002, page 2.

ABSTRACTS

- Swallow, S. K. and R. J. Gutiérrez. 1982. Snag and forest characteristics of roosting and nesting sites preferred by cavity-nesting birds: a multivariate approach. Transactions of the Northeast Section of The Wildlife Society 39:94.

- Swallow, S. K. 1989. Renewable and exhaustible resource theory applied to North Carolina shrimp and coastal development. American Journal of Agricultural Economics 71(5):1339 (RI AES Contribution no. 2523).
- Ganapathy, U. and S. K. Swallow. 1990. Trade-offs between renewable and nonrenewable resources: Oil development and caribou in the Arctic National Wildlife Refuge. American Journal of Agricultural Economics 72(5):1360 (RI AES Contribution no. 2637).
- Swallow, S. K. 1990. Intra-season regulation and economic efficiency in recreational fisheries: An application to Pacific salmon. American Journal of Agricultural Economics 72(5):1360 (RI AES Contribution no. 2584).
- Swallow, S. K., D. Wichelns, J. J. Opaluch, and T. Weaver. 1990. A new approach to siting noxious facilities within old political-regulatory paradigms: Some insights from a New England landfill siting process. Northeastern Journal of Agricultural and Resource Economics 19(2):147-148 (RI AES Contribution no. 2652).
- Swallow, S. K., T. Weaver, J. J. Opaluch, D. Wichelns. 1991. Contingent surveys for policy evaluation and differential impacts on socioeconomic groups: A landfill siting case. Northeastern Journal of Agricultural and Resource Economics, 20(2):219 (RI AES Contribution no. 2660).
- Swallow, S. K. and D. N. Wear. 1992. Spatial interactions between forest stands managed for multiple uses: A simple extension of the Hartman model. American Journal of Agricultural Economics 74(5):1294 (RI AES Contribution no. 2755).
- Johnston, R. J., T. F. Weaver, L. A. Smith, and S. K. Swallow. 1993. Using Ethnographic Methodology in Focus Groups to Improve Contingent Valuation: An Introduction to Theory and Application. Agricultural and Resource Economics Review 22(2):224.
- Talukdar, P., S. K. Swallow, and D. N. Wear. 1993. Interdependent Forest Stands with Locationally Unique Inputs to Ecosystem Outputs: A Two Stand Forest under One Management. Agricultural and Resource Economics Review 22(2):226 (RI AES Contribution no. 2867).
- Swallow, S. K., T. F. Weaver and J. J. Opaluch. 1993. Ordered-Response Model for Ordinarily Dichotomous Referendum, Contingent Valuation Data. American Journal of Agricultural Economics 75(5):1308 (RI AES Contribution no. 2847).
- Swallow, S.K., T. F. Weaver, L. A. Smith, and R. J. Johnson. 1994. Economic Tradeoffs: An Example from Watershed Management. In Peter L.M. Veneman, ed., Proceedings Riparian Buffer Zones Conference, Society of Soil Scientists of Southern New England, Sturbridge, MA, November 21-22, pp. 23-25.

- Swallow, S.K. and R. A. Sedjo. 1997. Some Simple Analytics of Eco-Labeling of Wood Products: Are the Market and Ecosystem Implications Clear? *Agricultural and Resource Economics Review* 25(2).
- Opaluch, J.J. and S.K. Swallow. 1997. Developing Conjoint Stated Preference Methods for Valuation of Environmental Resources within their Ecological Context. Proceedings: 1997 Workshop on Valuation and Environmental Policy, 7-8 April 1997, Arlington, VA, sponsored by NSF/EPA Partnership for Environmental Research, National Science Foundation and U.S. Environmental Protection Agency, pp. 17-18.
- Swallow, S.K., M.A. Spencer, C.J. Miller, P. Paton, R. Deegen, J. Shogren. 1998. Stated Preference Valuation Using Real Money for Real Forested Wetlands. Pages 13-14 in Proceedings of the 1998 Decision-Making and Valuation for Environmental Policy Workshop, April 2-3, Washington, D.C.
- Sedjo, Roger A. and S.K. Swallow. 1998. Some Analytics and Implications of Eco-Labeling. Presented to the First World Congress of Environmental and Resource Economists, June 25-27, Venice, Italy. In World Congress of Environmental and Resource Economists, Book of Abstracts, p. 422.
- Swallow, S.K. 1999. Critical Land Conservation with Development: Using Contingent Choice to Establish Impact Fees for Open Space. Abstract in *Agricultural and Resource Economics Review* 28(2):235, October 1999.
- Swallow, S.K. and M.J. Mazzotta. 1999. Toward Assessing the Non-Market Benefits of Experiment Station Research: A Case Study of Public Preferences for AES Research in Rhode Island. Abstract in *American Journal of Agricultural Economics* 81(5):1283, December 1999.
- Johnston, R., S. Swallow, C. Allen, and L. Smith. 2001. Designing Multidimensional Environmental Programs: Assessing Tradeoffs and Substitution in Watershed Management Plans. *Agricultural and Resource Economics Review* 30(2):222-23.
- Swallow, Stephen K., E. Uchida, and C.M. Anderson. 2008. Creating a private market for ecosystem services: Results from selling hayfield services for grassland birds to ex-urban residents in Jamestown, Rhode Island. ACES: A Conference on Ecosystem Services, 2008: Using Science for Decision Making in Dynamic Systems, Book of Abstracts. December 8-11, Naples, Florida, p. 160.
- Swallow, Stephen. K. 2010. Experimental markets for connecting ecosystem services to consumers' values and decision support. *ACES: A Community on Ecosystem Services, Book of Abstracts*. December 6-9, 2010, Gila River Indian Community, Arizona, page 206.
- Kafle, Achyut, and Stephen K. Swallow. 2012. Ecosystem Auctions for Decision Support for Invasive Plants Management in Southern California. ACES and Ecosystem Service Markets 2012: A Community on Ecosystem Services Linking Science, Practice and Decision Making.

Dec. 10-14, Fort Lauderdale, FL, p.305.

FUNDED GRANTS AND RESEARCH ACTIVITY

- 1984 Duke University Research Council Grant: Water Supply Capacity Expansion Decisions, \$3,000 (with C. M. Marin).
- 1986 Environmental Conservation Fellowship/Grant, National Wildlife Federation (\$3,000).
- 1986 National Oceanic and Atmospheric Administration Grant: "Economic Analysis of Estuarine Development and Preservation," \$7,200 (plus DU Match \$9,800).
- 1987 Environmental Conservation Fellowship/Grant, National Wildlife Federation (\$7,500).
- 1987 Duke University Research Council Grant: "Economics of the Joint Management of Coastal Zone Development and Commercial Fisheries," \$5,000 (with P. J. Parks).
- 1989 USDA Forest Service, Cooperative Agreement: "Stand Level Specialization in Multi-Stand, Multiple-Use Forests," \$9,500 (plus URI Match \$3,870).
- 1989-90 Rhode Island Sea Grant College Program Grant: "Recreational Fish Harvests: The Link Between Economic Benefits, Efficient Resource Allocation, and Policy Options," \$63,500 (plus URI match \$64,452) (with J. M. Gates).
- 1989-92 Rhode Island Agricultural Experiment Station: "Allocation of Recreational Fish Harvests within the Season: A Case Study of a Natural Resource Use Conflict."
- 1989 Rhode Island Solid Waste Management Corporation Grant: "Evaluation of Economic and Social Impacts Associated with the Siting of a Waste Processing or Disposal Facility," \$90,000 (Co-P.I. with D. Wichelns, J. Opaluch, T. Weaver).
- 1991-94 U.S. Geological Survey Grant: "Identifying Options to Address Public Preferences for Watershed Management to Enhance Water Quality," \$136,891 (P.I.; with co-P.I. T. Weaver).
- 1991 URI Council for Research Grant: "Economic Potential of Atlantic Salmon Restoration in New England Using Aquaculture Technology," \$6,490.
- 1992-93 USDA Forest Service, Cooperative Agreement: "Stand-Level Interactions and Production Functions for Multiple Uses on Public or Private Forests," \$20,000.
- 1993-95 Rhode Island Sea Grant College Program Grant: "Public Access and Public Support for Coastal Resource Management: Transferable Assessment of Public Preferences," \$86,146 (P.I. with T. Weaver).

- 1993-94 USDA Forest Service, Cooperative Agreement: "Ecological Heterogeneity, Public and Private Ownership, and the Economics of Forest Ecosystem Management," \$22,932.
- 1993-94 URI Council for Research Grant: "A Feasibility Demonstration of an Economic Approach to Sustainable Ecosystem Management," \$4500.
- 1993-94 National Academy of Sciences, Young Investigator Program Grant on "Ecological Concerns in the Development of the Arctic and Far Northern Regions" (Travel expenses in Russia and North America).
- 1994-96 USDA Cooperative State Research Service National Research Initiative Competitive Grants Program Grant: "Economics of Forest Ecosystem Management when Independent Landowners Manage the Ecosystem," \$60,000 (with D.N. Wear and P. Talukdar).
- 1994-95 NOAA, National Marine Fisheries Service, URI/NOAA Cooperative Marine Education and Research Program, "Preferences and Values of Non-Commercial Fishermen for Harvest Regulations and Size Classes of Bluefin Tuna," \$15,804 (with S. Edwards and J. Gates).
- 1995-1997 National Science Foundation and U.S. Environmental Protection Agency Grant: "Developing Conjoint Stated Preference methods for Valuation of Environmental Resources within their Ecological Context," \$126,000 (with J.J. Opaluch).
- 1996-1998 University of Rhode Island Partnership Grant: "University of Rhode Island Partnership for the Coastal Environment," internal grant for \$350,000 (Steering Committee Member).
- 1996-1997 USDA Cooperative State Research, Education, and Extension Service Higher Education Challenge Grant: "Melding Undergraduate Experiential Learning with Extension," \$80,000 (investigator; P.I.s: A.J. Gold, M. Rice, R.A. Casagrande).
- 1996-1998 National Science Foundation and U.S. Environmental Protection Agency Grant: "Stated Preference Valuation Using Real Money for Real Forested Wetlands," \$165,081 (with P. Paton).
- 1996-2001 USDA Cooperative State Research Service National Research Initiative Competitive Grants Program Grant: "Public Values for Rural, Forest Ecosystems: Toward Valid Economic Measures of Amenity Values," \$245,000 (with P. Paton, P. August, J. Shogren).
- 1998-2001 USDA Cooperative State Research Service, Fund for Rural America Grant: "Decision Information and Support Structures to Sustain Farm, Forest and Open Space in Rural Communities of Southern New England," \$400,000 (with R.J. Johnston, P. Paton)

- 2001-2002 National Science Foundation and U.S. Environmental Protection Agency Grant:
“Designing Incentives that Strengthen Local Capacity for Land Development with Open Space and Healthy Ecosystems: Environmental Impact Fees,” \$103,821.
- 2002-2004 NSF/EPA STAR Grant, “Economics of Conserving Ecosystem Integrity with Residential Development around Vernal Pools,” \$200,000 (with P. Paton)
- 2002-2004 USDA/CSREES/National Research Initiative Competitive Grants Program,
“Ecosystem-Economics of Rural Landscapes and Land Use Change,” \$160,000 (with P. Paton)
- 2003-2005 USDA/CSREES/National Research Initiative Competitive Grants Program, “Do Amenity Values from Farm and Forest Increase with Decreasing Scarcity? Identifying Public Preference Surprises for Policy Assessment,” \$150,000 (with R. Johnston, C. Foster).
- 2005-2008 USDA/CSREES/National Research Initiative Competitive Grants Program,
“Validating Best Forest Management Practices Around Vernal Pools: Amphibian Metapopulations, Harvester Adoption Costs and Public Values,” \$615,000 (with C. Anderson, K. Schnier, P. Paton, K. McGarigal, J. Opaluch).
- 2005-2008 USDA/CCC “Developing a Market for Nesting Bird Habitat on Active Farm Hayfields.” \$595,639 federal + ~\$110,000 outside match (with C. Anderson, R. Pace, P. Gengler)
- 2007-2010 NOAA/NMFS – Sea Grant Marine Resource Economics Graduate Fellowship:
Ecosystem Services - How decision-making changes with incentives, with Elizabeth C. Smith, \$77,000.
- 2007-2009 National Science Foundation, Long-Term Ecological Research (Virginia Coastal Reserve site) Part C: Social Science Supplements: 2007 - *Economics Experiments and Coastal Ecosystem Services* (\$19,998); 2008 - *Low-Income Communities and Preferred Choices for Ecosystem Restoration in the Virginia Coastal Reserve* (\$20,000); 2009 - *Individualized (Lindahl) Pricing for Public Goods: Testing a Framework for Experimental Auctions for Ecosystem Services in LTERs* (\$20,000); 2010 - *Testing Auction Mechanisms for Ecosystem Services: Enhancing Field Experiments for LTER/VCR with Potential for Multi-Site Research* (\$19,998).
- 2008-2010 URI Agricultural Experiment Station, CELS CARES project: “Hayfields and Grassland Birds: Extending Farm Marketing for a New Ecosystem Service Economy.” 108,350.
- 2009-2013 USDA/CSREES/National Research Initiative Competitive Grants Program,
“Developing Ecosystem Services Businesses as new Revenues for Farms in Communities Facing Exurban Development.” \$500,000 (with C. Anderson, K. Dame).

- 2009 USDA/NRCS through Northeast Collaborative Ecosystem Studies Unit - Integrating Economic Principles into NRCS Rapid Watershed Assessment for Farm and Forest Owners and Public Value \$76,000 (with Emi Uchida, Peter August)
- 2010-2013 USDA National Institute for Food and Agriculture, with University of California-Berkeley, “Ecosystem Auctions for Decision Support (EADS) Project.” Subcontract for \$125,000 within \$500,000, with co-P.I. Katherine Suding on “Sustainable solutions to cross thresholds and build ecological resilience: Orange County Invasive Management (OCIM) Project.”
- 2010-2013 EPA STAR Grant and USDA National Institute for Food and Agriculture joint program on Enhancing Ecosystem Services from Agricultural Lands: Management, Quantification, and Developing Decision Support Tools Grant: “Managing multiple ecosystem services from agricultural and forest landscape in rural-fringe in southern New England,” \$499,944 (with E. Uchida, J.J. Opaluch, A.J. Gold, Y.Q. Wang) (funded, awaiting final paperwork).
- 2011-2016 USDA National Institute for Food and Agriculture, Agriculture and Food Research Initiative: Making Markets for Ecosystem Services of Farms on the Rural Fringe: Vermont Grasslands for Hay and Nesting Songbirds,” \$450,499 (with C.M. Anderson, A. Strong, L. Chase)
- 2011-2016 University of Connecticut Agricultural Research Station, Hatch Grant, “Markets for and Values of Ecosystem Services: Experiments and Evaluations of Opportunities for New Farm and Rural Revenues in a Green Economy” \$60,000 (approx.)
- 2011-2013 USDA National Institute for Food and Agriculture, Agriculture and Food Research Initiative: Feasibility of a Local Wood Products Network for Rural Lands in Urbanizing Regions: A Pilot Study in Southern New England. \$149,980 (T. Worthley, PD; J.C. Volin; S. Swallow, J. Berning)
- 2012-2018 NSF Long Term Ecological Research network, Virginia Coastal Reserve: “LTER: Drivers, dynamics and consequences of non-linear change in coastal barrier systems,” 11/1/2012 - 10/31/2018, \$5,880,000 (NSF grant **DEB-1237733**). Lead P.I. Karen McGlathery, University of Virginia; co-P.I. Stephen Swallow, with others: Subcontract to University of Connecticut, P.I. Stephen Swallow, \$150,000.
- 2014-2015 USDA National Institute for Food and Agriculture, Agriculture and Food Research Initiative: Credit Stacking in Environmental Markets: Farmers’ Participation Incentives, Social Efficiency and Potential Environmental Consequences. P.I. Stephen Swallow. With Pengfei Liu, Chris Elphick and Robin Chazdon. \$289,250.
- 2015-2017 USDA / NIFA /AFRI: Community-level Incentives to Support Farm, Forest, and Open Space Land Conservation in the Rural-Urban Fringe, Corey Lang (PI) , S.K. Swallow (co-PI) and Shanna Pearson (co-PI), through U of RI, \$190,000 sub. to UConn of \$467,000.

2015-2017 USDA / NIFA / AFRI: Water Supply Capacity Credits within a Hydrologic Basin: Sustaining Ecosystem Services and Revenues from Undeveloped Forests and Farms, SK Swallow (PI), with F. Shah, G. Robbins, G. Warner (co-PIs), \$500,000.

2015-2016 UConn's Zwick Center for Food and Resource Policy: *Initiating a Partnership with EPRI in the Ohio River Water Quality Trading Auction: A Pilot Test of Experimental Methods for Integrating Environmental Valuation and Market Decision*. SK Swallow, \$5000.

UNIVERSITY, COMMUNITY, AND PROFESSIONAL SERVICE

UNIVERSITY OF RHODE ISLAND

College of Resource Development Computer Committee, 1992-1994.

Department of Resource Economics Graduate Admissions Committee, 1990-1997.

Department of Resource Economics Undergraduate Curriculum Committee, 1990-present.

Advisor, Undergraduate majors in Environmental Economics and Management, 1996-present, and Liason to Department of Natural Resources Sciences for this joint major.

Graduate School, elected to Graduate Council, 1996-1999.

Scholarship Committee 1997-99 (Chair 1998)

Minority Fellowships Committee 1999

Procedures Committee 1999

Advisory Committee, RI Agricultural Experiment Station, 1996

URI Partnership for the Coastal Environment, Steering Committee Member, 1996-present.

Senior Fellow, Coastal Institute, University of Rhode Island, 2000-present

College of the Environment and Life Sciences ad hoc committee creating the Master's of Environmental Science and Management as a terminal professional degree, 2001-2002, chair of faculty committee for the MESM economics and policy concentration, 2002-present.

Member, Assistant Professor Search Committee, ENRE, 1997, 1999

Chair, Assistant Professor Search Committee, ENRE, 2002

Chair, Research Assistant Professor Search Committee, ENRE, 2005-06
Member, Performance Based Budgeting and Planning committee, ad hoc, for URI Joint Strategic Planning Committee, Spring 2008
Senator, URI Faculty Senate, representing College of the Environment and Life Sciences, May 2008-April 2011 (resigned December 2010)
URI Faculty Senate Executive Committee, URI, May 2008-December-2010.
Chairperson of URI Faculty Senate, elected May 2009, re-elected May 2010 (resigned December 2010 to move to University of Connecticut)

UNIVERSITY OF CONNECTICUT

Provost's Environment Committee, January 2011-June 2012
Vice President for Research, Research Compliance Advisory Committee, March-June 2014
College of Agriculture and Natural Resources
Dean's Committee on Mentorship 2011-12
Co-Chair, Environmental Studies Steering Committee, 2012-13
Member, Environmental Studies Steering Committee, 2013-present
Dept. Agricultural and Resource Economics
Member, Search Committee for Agricultural Extension 2011-12
Chair, Search Committee for Environmental Economist 2012-13
Member, Search Committee for Environmental Economist 2013-14
Center for Environmental Sciences and Engineering
Ad Hoc Committee on NSF Coastal SEES and related, 2012-present

STATE AND LOCAL COMMUNITY

Member, St. Augustine's Self-Study Committee to choose church Rector and URI Episcopal Chaplain, 1989-90.

External Reviewer, Narragansett Bay Project., 1991.

Contact, Governors Advisor on public education, 1991 (provided relevant research reports discovered at a regional professional conference).

Advisory Board, Rhode Island Natural History Survey, Consortium of State Biological Surveys, 1993-present.

Advisor to Richmond Open Space Preservation Committee, Richmond, RI, 1995-1996.

Member, Richmond Open Space Preservation Committee, Richmond, RI, 1997

Steering Committee Member, Rhode Island Rural Lands Coalition, 1997-1999

Commissioner, Rhode Island Agricultural Land Preservation Commission, Oct. 1997 to Jan. 1998.

Member (trustee) 1998-2004 (Chair 1998-1999), Richmond Rural Preservation Land Trust, a municipal land trust

Member, Farm, Forest and Open Space Land Valuation Subcommittee, Rhode Island State Conservation Committee, 2001-2010

PROFESSIONAL SOCIETY MEMBERSHIPS AND OFFICES HELD

Memberships

Association of Environmental and Resource Economists, 1988-present
Agricultural and Applied Economics Association (formerly American Agricultural Economics Association), 1987-present
American Economics Association, 1987-2010
European Association of Environmental and Resource Economists, 1991-2012
Human Dimensions of Wildlife Study Group, 1992-1995
International Society for Ecological Economics, 1997-2008
Northeastern Agricultural and Resource Economics Association, 1990-present
Rhode Island Natural History Survey, 1994-2010
Society for Conservation Biology, 1993-2010
Soil and Water Conservation Society, 2009-2010
Southern Economic Association, 1998-2010
Western Association of Agricultural Economists, 1990-present
The Wildlife Society, 1980-2007

Service to Professional Associations or Agencies

1991 - Selected papers reviewer, American Agricultural Economics Association
1991-1992 - Selected Papers Committee, Northeastern Agricultural and Resource Economics Association
1991-1993 - Associate Editor, Wildlife Society Bulletin, The Wildlife Society
1992 - Coordinator for Selected Papers on Natural Resources, American Agricultural Economics Association
1992 - Moderator of Selected Papers Session, American Agricultural Economics Association Annual Meeting
1992-1993 - Editorial Council, Journal of Environmental Economics and Management, Association of Resource and Environmental Economists
1993 - Chair, Selected Papers Committee, Northeastern Agricultural and Resource Economics Association
1993 - Discussant of "Reliability and Validity of CV Methods," Association of Environmental and Resource Economists, summer meetings
1994-1996 - Associate Editor, Journal of Environmental Economics and Management, Association of Resource and Environmental Economists

- 1994 - Discussant of "Competition from Aquacultural Sector: An Optimal Control Model for the Efficiency of Fishery," Association of Environmental and Resource Economists, summer meetings
- 1994 - Invited discussant for Principal Papers Session on "Value Elicitation in Laboratory Markets," American Agricultural Economics Association, annual meeting
- 1995 - Discussant of "Alternative Policies and Willingness to Pay for Public Goods," Association of Environmental and Resource Economists, winter meetings in conjunction with American Economic Association.
- 1996 - Invited keynote speaker, Biennial Meeting of the Scandinavian Forest Economics Society, Mekrijärvi, Finland.
- 1996 - Invited presenter, Annual Meeting of the Northeastern Association of Agricultural and Resource Economists, Atlantic City, NJ.
- 1997-99 Member, Committee on Awards Revisions, Northeast Agricultural and Resource Economics Association
- 2001-02 Editorial Council, *Journal of Environmental Economics and Management*
- 2001-2004 President-Elect, President, Immediate Past President, Northeastern Agricultural and Resource Economics Association
- 2002 Land Use Policy Workshop Committee (NAREA) with funding by Northeast Regional Center for Rural Development
- 2003 Planning committee, Linkages between Agriculture and Conservation Policy Workshop, Northeastern Agricultural and Resource Economics Association
- 2003 Invited participant, "What the Public Values about Farm and Ranch Land," Workshop presented by the Farm Foundation, U.S.D.A. ERS, U.S.D.A. NRCS and U.S.D.A. CSREES, November 12-14
- 2004-06 National Science Foundation, LTER (Long-Term Ecological Research) Network Research and Synthesis Planning Grant: Meeting of 100, Nov. 2004; Subcommittee on Biotic Structure, Feb. and June 2005; Conference Committee, Aug. 2005 -present.
- 2005 National Science Foundation, Site Review Team, Coweeta LTER (Long-Term Ecological Research) Site, June 2005.
- 2007 U.S. Forest Service R&D Wildland Fire External Peer Review panel, June 18-21, Bend, Oregon.
- 2007 Coalition for National Science Funding, Congressional Visits Day, representative from Council for Food, Agricultural and Resource Economics, September.
- 2008 National Science Foundation, LTER Network – Representative to Science Council as social scientist representing both the Virginia Coastal Reserve (VCR) and Sevilleta (SEV, New Mexico)
- 2008 Interdisciplinary panel on Fire Science, representing Council for Food, Agricultural and Resource Economics, June: "Fire Briefing: An Economists' Summary," presentation to U.S. House of Representatives and U.S. Senate staff.
- 2008 National Science Foundation, LTER Network – Representative for Virginia Coastal Reserve to Working Group Meeting on Design Challenges and Solutions for Establishing a Network of Socio-Ecological Research Sites, San Juan, Puerto Rico December 16 - 18, 2008

- 2009-2012 National Ecosystem Services Partnership, with U.S. EPA, U.S.D.A, and numerous other federal agencies, dozens of national and international NGOs, foundations, major corporations. Co-Chair of Working Group 2 on “Partnership Activity Needs Assessment and Scoping” (with Jessica Fox of Electric Power Research Institute), member of Working Group 1 on “Design of Partnership Function and Structure,” Member of Steering Committee.
- 2011-2012 Association of Environmental and Resource Economists, Program Committee for Inaugural (2011) Summer Conference and Summer Conference (2012)
- 2011 Agricultural and Applied Economics Association, Selected Papers Committee (non-market valuation section)
- 2013-16 Member, U.S. EPA Science Advisory Board’s Environmental Economics Advisory Committee
- Advisory Board Member, for University of Maine NSF funded “CNH: Of Pools and People: Small Natural Features with Large Ecosystem Functions in Urbanizing Landscapes,” Pls Aram J Cahoun, KP Bell, ML Hunter, MT Kinnison, C Loftin, DM Bauer (2014-2016)
 - External Advisory Committee member, for “North East Water Resources (NEWRnet) Consortium”, NSF funded Vermont EPSCoR (2013-2016)

Reviewer

Addison-Wesley Publisher, book reviews, 1998

Agricultural and Resource Economics Review (formerly *Northeastern Journal of Agricultural and Resource Economics*), 1991-1992, 1994-2003, 2013

American Journal of Agricultural Economics, 1991-1998, 2000-2003, 2012, 2014

Ambio: A Journal of the Human Environment, 2001

Applied Mathematics and Computation, 1996

Applied Economic Perspectives and Policy, 2012

Canadian Journal of Agricultural Economics, 2000

Canadian Journal of Forest Research, 1996, 2002

Contemporary Economic Policy, 2001

Ecological Economics, 2011-2013, 2015

Economic Inquiry, 2001

Environment and Development Economics, 2000-2001

Environmental and Resource Economics, 2004-05, 2012, 2013

European Review of Agricultural Economics, 1996

Forest Science, 1994-1996, 2000-2002

Frontiers of Ecology and the Environment, 2012, 2013, 2014

Human Dimensions of Fish and Wildlife Management, 1994

International Journal of Wildland Fire, 1999

International Economic Review, 1994

International Review of Economics and Finance, 1998

Journal of Agricultural and Applied Economics, 2003

Journal of Agricultural and Resource Economics, 1996-1997

Journal of Economic Dynamics and Control, 2000

Journal of Environmental Management, 2001-02

Journal of Environmental Economics and Management, 1987-1993, 1997-2002, 2009

Journal of Policy Analysis and Management, 2011
Land Economics, 1992-1994, 1996-2003, 2011, 2014
Marine Resource Economics, 1988-1989
 Maryland Agricultural Experiment Station, 2001
 Massachusetts Agricultural Experiment Station, 2002
 MBG Press, Missouri Botanical Gardens, 1998
 National Academy of Sciences proposals, 1993; Office of Internat'l Affairs, 2000
 National Science Foundation, Panel I, Decision-Making and Valuation for Environmental Policy, EPA-NSF Partnership, April 15-16, 1999; Integrated Research Challenges in Environmental Biology Special Competition, proposal review April, 2002'
 Water Sustainability and Climate Review Panel, Division of Chemical, Bioengineering, Environmental and Transport Systems, March 2012
 National Science Foundation proposal reviewer 2008
 National Sea Grant College Program research proposals, 1990-1991
North American Journal of Fisheries Management, 1995
Oxford Economic Papers, 1996
Proceedings of the National Academy of Sciences, 2014
Regional Science and Urban Economics, 2003
Resource and Energy Economics (formerly *Resources and Energy*), 1992
 Resources for the Future, book evaluation, 2001
Silva Fennica, 1997
 Social Sciences and Humanities Research Council of Canada, proposals, 1998-1999
Southern Economic Journal 2009
 Tenure or promotion, external reviewer, Clark University (2001, 2005), Clemson University (2005), Bowdoin College (2006), Duke University (2006), Rutgers University (1996), University of Georgia (1997), University of Massachusetts – Amherst (1998, 2005), Michigan State University (2008, 2011), University of Minnesota (2008), Minnesota State University-Mankato (2008), Simon Frasier University (2002), Pennsylvania State University (2003, 2005), University of Alberta (2004, 2005), University of Illinois (2004), Ohio State University (2004), Oregon State University (2005, 2012), University of Washington (2013), Washington State University (2013)
Transactions of the American Fisheries Society, 1990
 USDA National Research Initiative Grant proposals, 1996-1997, 2000-2001
 USDA National Institute for Food and Agriculture, Review Panel for Climate Change, 2013
 USDA/CSREES Small Business Innovation Research proposals, 2003
 University of British Columbia Hampton Research Fund, proposals, 1998, 2002
 University of Hawaii, Sea Grant proposal review, 2002
Water, Air, and Soil Pollution, 1995
Water and Resource Economics, 2014
Water Resources Research, 1987
 Water Resources Center, University of Delaware, research proposals, 1991
The Wildlife Society Bulletin, 1988-1994, 1998-1999
Wildlife Biology in Practice, 2012

