

CURRICULUM VITAE - MALCOLM L. HUNTER, JR.

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Education

1966 - 1970 Lincoln Academy, Newcastle, Maine
1970 - 1974 B.S. in Wildlife Science, University of Maine, Orono
1974 - 1978 D. Phil. in Zoology, Edward Grey Institute of Field Ornithology, Department of Zoology, Oxford University. Thesis title: "Environmental effects on the singing behaviour of Great Tits." Stipend from Rhodes Scholarship, Research funds from National Geographic Society

Employment

1971 Research Technician, Maine Dept. of Inland Fisheries and Wildlife
1972-74 Self-employed as ecological consultant. Funding from: Center for Natural Areas, Central New Hampshire Planning Office, Maine Bureau of Public Lands, Maine State Planning Office, Massachusetts Audubon Society, Mid-coast Audubon Society, New England Regional Commission, Smithsonian Institution, Time/Life Books.
1976 Research Assistant, U.S. Forest Service and School of Forest Resources, University of Maine
1978 Zoology Instructor, Oxford University
1978 – pr Department of Wildlife Ecology, University of Maine, Current titles: Libra Professor of Conservation Biology and Emeritus Professor of Wildlife Ecology

Scholarships and Academic Honors

1973 Rhodes Scholarship
1974 Graduated from University of Maine with Highest Distinctions
1974 P. F. English Award for outstanding wildlife student in northeastern U.S. and eastern Canada
1974 D. B. Demeritt Award for outstanding student in School of Forest Resources
1975 Senior Scholar, St. Catherine's College, Oxford University
1990 Libra Professor of Conservation Biology
1995 Pew Conservation Fellow
1996 University of Maine 1996 Distinguished Professor
1996 University of Maine Commencement Speaker
2003 Webber Award for Outstanding Forest Resource Research
2005 President Harris Award for contributions to the University of Maine
2007 Distinguished Service Award of the Society for Conservation Biology

Membership in Professional Societies

American Ornithologists Union (Elective member)
Ecological Society of America (Editorial board)
Society for Conservation Biology (President; Board of Governors; Editorial Board)

Membership and roles in other organizations

Doris Duke Charitable Foundation, Chair of Environmental Committee
Endangered Species Coalition, Scientific Advisory Board
Joseph Jones Ecological Research Center, Ichauway, Georgia, Scientific Advisory Comm.
Maine Council on Sustainable Forest Management (Gubernatorial appointment)

Maine Forest Biodiversity Project
Maine Bureau of Public Lands (Silvicultural Advisory Committee)
Maine Dept. Inland Fisheries and Wildlife (Nongame Advisory Council)
Maine Governor's Task Force on Management of Public Land (Gubernatorial appointment)
Maine Natural Areas Program, Advisory Board
Maine Ecological Reserves Scientific Advisory Committee (Gubernatorial appointment)
Maine Ecosystems Working Group
Nature Conservancy, Maine Chapter (Trustee; Chair, Conservation Priorities and International Comms)
Nature Conservancy, International (Science Review Panel; Smith Fellowship Review)
Natural Resources Council of Maine (Board of Directors; Forestry Committee)
Nova Scotia Dept. of Lands and Forestry Advisor
President's Commission on Environmental Quality: Biodiversity Task Force
White House Task Force on Spotted Owls (Consultant)
World Conservation Union (IUCN); Species Survival Commission (Mustelid/Viverrid/Procyonid Specialist Group)

International Experience

Research, education, and conservation work in Australia, Belize, Botswana, Brazil, Canada, Dominica, D.R. Congo, Finland, France, Germany, Great Britain, Greece, India, Iran, Kenya, Mexico, Morocco, Nepal, Norway, Panama, Peru, Poland, Seychelles, South Africa, Spain, Sweden, Switzerland, Tanzania, Uganda, Zambia, Zimbabwe. Travel to over 40 other countries.

Consultant and reviewer for the U.S. Agency for International Development, Smithsonian Institution, World Wildlife Fund, World Conservation Union, United Nations Environment Program, and a member of the IUCN Species Survival Commission.

Graduate advisor to students from Argentina, Canada, Chile, India, Japan, Nepal, United Kingdom, Romania, Taiwan, and Zaire.

International funding from: British Overseas Development Administration, Fauna and Flora Preservation Society, National Geographic Society, Rockefeller Foundation, Royal Geographic Society, Toronto Zoo, U.S. Agency for International Development, U.S. Fish and Wildlife Service, Van Tienhoven Foundation, Volkart Foundation, Wildlife Conservation Society, World Pheasant Association, World Wildlife Fund (International and U.S.)

Rudimentary knowledge of Farsi, French, German, and Spanish

Books and Monographs

Hunter, M.L. Jr., J.P. Gibbs, and V. Popescu. 2021. Fundamentals of conservation biology, 4th edition. Wiley-Blackwell, Oxford, United Kingdom 654 pp.

Hunter, M.L. D. Lindenmayer, and A. J.K. Calhoun. 2016. Saving the earth as a career: Advice on becoming a conservation professional. 2nd edition. Wiley-Blackwell, Oxford, United Kingdom.

Hunter, M.L. Jr. and F. Schmiegelow. 2011. Wildlife, forests, and forestry: Principles of managing forests for biological diversity. 2nd edition. Prentice-Hall, Upper Saddle River, NJ. 259 pp.

Gibbs, J., M.L. Hunter, Jr. and E. Sterling. 2008. Problem-solving in conservation biology and wildlife management: Exercises for class, field, and laboratory, 2nd edition. Blackwell Publishing, Oxford, United Kingdom. 328 pp.

Hunter, M.L. D. Lindenmayer, and A. J.K. Calhoun. 2007. Saving the earth as a career: Advice on becoming a conservation professional. Blackwell Publishing, Oxford, United Kingdom. 200pp.

Hunter, M.L. Jr. and J.P. Gibbs. 2007. Fundamentals of conservation biology, 3rd edition. Blackwell Publishing, Oxford, United Kingdom, 497pp.

Hunter, M.L. Jr. 2002. Fundamentals of conservation biology, 2nd edition. Blackwell Science, Malden, Massachusetts, 547pp.

- Hunter, M.L. Jr. (editor). 1999. Maintaining biodiversity in forest ecosystems. Cambridge University Press, Cambridge, England. 698pp.
- Hunter, M.L. Jr., A. Calhoun and M. McCollough.(editors). 1999. Maine amphibians and reptiles. University of Maine Press, Orono, Maine. 252pp.
- Gibbs, J., M.L. Hunter, Jr. and E. Sterling. 1998. Problem-solving in conservation biology and wildlife management: Exercises for class, field, and laboratory. Blackwell Science, Malden, Massachusetts. 215pp.
- Hunter, M.L. Jr. 1996. Fundamentals of conservation biology. Blackwell Science, Cambridge, Massachusetts, 482pp.
- Witham, J., E. Moore, M. Hunter, A. Kimball, and A. White. 1993. Long-term study of an oak-pine forest ecosystem: Techniques manual for the Holt Research Forest. Maine Agricultural Experiment Station Technical Bulletin 153. 164 pp.
- Hunter, M.L. Jr., J. Albright and J. Arbuckle 1992. The amphibians and reptiles of Maine. Maine Agricultural Experiment Station Bulletin 838. 188 pp.
- Hunter, M.L. Jr. 1990. Wildlife, forests, and forestry: Principles of managing forests for biological diversity. Prentice-Hall, Englewood Cliffs, NJ. 370pp.
- Gaston, A.J., M.L. Hunter, Jr, and P.J. Garson. 1981. The wildlife of Himachal Pradesh, Western Himalayas. School of Forest Resources Technical Note No. 82, Orono, ME. 159pp.
- Hunter, M.L. Jr. 1976. Maine ecosystems. Center for Natural Areas. Washington, D.C. 224pp.

Refereed Journals

- Hunter, M., S.R. Boone, A.M. Brehm, A. Mortelliti. In press. Modulation of ecosystem services by animal personalities. *Frontiers in Ecology and the Environment*.
- Angelstam, P. et 27 coauthors. In press. Frontiers of protected areas versus forest exploitation: assessing habitat network functionality in 16 case study regions globally. *Ambio*
- Eakin, C., A.J.K. Calhoun, and M. Hunter, Jr. 2019. Indicators of wood frog *Lithobates sylvaticus* condition in an urbanizing landscape. *Ecosphere* 10. 10.1002/ecs2.2789.
- Eakin, C., A.J.K. Calhoun, and M. Hunter, Jr. 2019. Effects of suburbanizing landscapes on vernal pool-breeding amphibian reproductive effort. *Herpetological Conservation and Biology* 14:515–532.
- Schrodt, F. et 28 coauthors. 2019. To advance sustainable stewardship, we must document not only biodiversity but geodiversity. *Proceedings of the National Academy of Science* 116:16155-16158.
- Eakin, C., M. Hunter, Jr., and A.J.K. Calhoun. 2019. The influence of land cover and within-pool characteristics on larval, froglet, and adult wood frogs along a rural to suburban gradient. *Urban Ecosystems* 22:493-505.
- Lindemann, S.B., D.E. Putnam, M.L. Hunter, Jr., and T.B. Persons. 2019. Spotless burnsi pattern in Northern Leopard Frog (*Lithobates pipiens*) in Maine. *Canadian Field-Naturalist* 133(3): 193–195.
- Hoffmann, K., M. Hunter, Jr., A.J.K. Calhoun, and J. Bogart. 2018. Post-breeding migration and habitat of unisexual salamanders in Maine, USA. *Journal of Herpetology* 52:273-281.
- Eakin, C., M. Hunter, Jr., and A.J.K. Calhoun. 2018. Bird and mammal use of vernal pools along an urban development gradient. *Urban Ecosystems* 21:1029-1041.
- Hunter, M. 2017. Conserving small natural features with large ecological roles: an introduction and definition. *Biological Conservation* 211 (Special Issue):1-2.

- Hunter, M., et 13 coauthors. 2017. Conserving small natural features with large ecological roles: a synthetic overview. *Biological Conservation* 211 (Special Issue):88-95.
- Acuña, V., M.L. Hunter, A. Ruhí. 2017. Managing temporary streams and rivers as unique rather than second-class ecosystems. *Biological Conservation* 211 (Special Issue):12-19.
- Ogawa, R. A. Mortelliti, J. W. Witham, and M. L. Hunter, Jr. 2017. Demographic mechanisms linking tree seeds and rodent population fluctuations: insights from a 33-year study. *Journal of Mammalogy* 98:419-427
- Feuka, A.B., K. E. Hoffmann, M. L. Hunter, Jr., and A.J.K. Calhoun. 2017. Effects of light pollution on habitat selection in post-metamorphic wood frogs (*Rana sylvaticus*) and unisexual blue-spotted salamanders (*Ambystoma laterale x jeffersonianum*). *Herpetological Conservation and Biology* 12:470-476.
- Call, E. and M. Hunter. 2017. Evaluating the framework of a new river-bird survey method. *River Research and Applications* 33: 495-504
- Cline, B.B. and M. L. Hunter, Jr. 2016. Initial movements of a dispersing amphibian in response to partial harvesting in the Acadian forest of Maine, USA. *Forest Science* 62:333-342.
- Hoffmann, K., A. Calhoun, and M. Hunter. 2016. A deep-water funnel trap for salamanders. *Herpetological Review* 47:205-206.
- Cline, B.B. and M.L. Hunter, Jr. 2016. Movement in the matrix: Substrates and distance-to-forest edge affect the post-metamorphic movements of a forest amphibian. *Ecosphere* 7(2):e01202. 10.1002/ecs2.1202
- Wood, C.M., J.W. Witham, and M.L. Hunter Jr. 2016. Climate-driven range shifts are stochastic processes at a local level: two flying squirrel species in Maine. *Ecosphere* 7(2):e01240. 10.1002/ecs2.1240
- Hunter, M., et 18 coauthors. 2016. Two roles for ecological surrogacy: indicator surrogates and management surrogates. *Ecological Indicators* 63:121-125.
- Lindenmayer, D. et 18 coauthors, 2015. A new framework for selecting environmental surrogates. *Science for the Total Environment* 538:1029-1038.
- Beier, P., M.L. Hunter, and M. Anderson. 2015. Conserving nature's stage. *Conservation Biology* 29:613-617.
- Comer, P.J., R. L. Pressey, M. L. Hunter, Jr, C. Schloss, S. Buttrick, N. Heller, J. Tirpak, D. P. Faith, M. Cross, and M. Shaffer. 2015. Incorporating geodiversity into conservation decisions. *Conservation Biology* 29:692-701.
- Gill, J. L., J. Blois, B. Benito, S. Dobrowski, M. L. Hunter, Jr., and J. McGuire. 2015. A 2.5-million-year perspective on coarse-filter strategies for conserving nature's stage. *Conservation Biology* 29:640-648.
- Hjort, J., J. Gordon, M. Gray, M. L. Hunter, Jr. 2015. Why geodiversity matters in valuing nature's stage. *Conservation Biology* 29:630-639.
- Capps, K.A., R. Rancatti, N. Tomczyk, T. Parr, A. Calhoun, and M.L. Hunter, Jr. 2014. Biogeochemical hotspots in forested landscapes: The role of vernal pools in denitrification and organic matter processing. *Ecosystems* 17:1455-1468.
- Hunter, M.L. Jr., K.H. Redford, and D.B. Lindenmayer. 2014. The complementary niches of anthropocentric and biocentric conservationists. *Conservation Biology* 28:641-645.
- Cline, B.B. and M.L. Hunter, Jr. 2014. Juvenile amphibians discriminate among open-canopy habitats: An experimental investigation of habitat permeability. *Journal of Applied Ecology* 51:319-329.
- Colgan, C. M. L. Hunter, B. McGill, and A. Weiskittel. 2014. Managing the middle ground: Forests in the transition zone between cities and remote areas. *Landscape Ecology* 29:1133-1143

- Calhoun, A., J. Jansuwicz, K. Bell. And M. Hunter. 2014. Improving management of small natural features on private lands by negotiating the science-policy boundary of Maine vernal pools. *Proceedings of the National Academy of Science* 111:11002–11006.
- Calhoun, A.J.K., J. Arrigoni, R.P. Brooks, M.L. Hunter, S.C. Richter. 2014. Creating successful vernal pools: a literature review and advice for practitioners. *Wetlands* 34:1027-1038.
- Politi, N., L. Rivera, L. Lizárraga, M. Hunter, Jr., and G.E. DeFosse. 2014. The dichotomy between protection and logging of an endangered and valuable timber species –conservation of *Amburana cearensis* in northwestern Argentina. *Oryx* 49:111-117.
- Wang, G., N.T. Hobbs, N. A. Slade, J. F. Merritt, L. L. Getz, M. L. Hunter, Jr., S. H. Vessey, J. W. Witham and A. Guillaumet. 2013. Comparative population dynamics of large and small mammals in the Northern Hemisphere: Deterministic and stochastic forces. *Ecography* 36:439-446.
- Politi, N., M.L. Hunter, Jr., and L. Rivera. 2012. Assessing the effects of selective logging on birds in Neotropical piedmont and cloud montane forest. *Biodiversity and Conservation* 21:3131–3155.
- Campbell, S.P., J.W. Witham, and M.L. Hunter Jr. 2012. Long-term changes in spatial distribution of birds responding to a group-selection timber harvest. *Wildlife Society Bulletin* 36:313-327.
- Popescu, V.D., B.S. Brodie, M.L. Hunter, and J. Zydlewski. 2012. Use of olfactory cues by newly metamorphosed wood frogs (*Lithobates sylvaticus*) during emigration. *Copeia* 2012(3): 424–431
- Popescu, V.D., D.A. Patrick, M.L. Hunter, and A.J.K. Calhoun. 2012. The role of forest harvesting and subsequent vegetative regrowth in determining patterns of amphibian habitat use. *Forest Ecology and Management* 270:163-174
- Popescu, V.D. and M.L. Hunter. 2011. Clearcutting affects habitat connectivity for a forest amphibian by decreasing permeability to juvenile movements. *Ecological Applications* 21:1283-1295.
- Lindenmayer, D.B. and M.L. Hunter, Jr. 2010. Some guiding concepts for conservation biology. *Conservation Biology* 24:1459-1468.
- Politi, N., M.L. Hunter, Jr., and L. Rivera. 2010. Availability of cavities for avian cavity nesters in selectively logged subtropical montane forests of the Andes. *Forest Ecology and Management* 260:893-906.
- Hunter, M.L., Jr, E. Dinerstein, J. Hoekstra, and D. Lindenmayer. 2010. Conserving biodiversity in the face of climate change: A call to action. *Conservation Biology* 24:1169-1171.
- Campbell, S.P., J.W. Witham, and M.L. Hunter Jr. 2010. Stochasticity in avian habitat use: a test of deterministic explanations for habitat selection. *Ecological Monographs* 80:287-302.
- Blomquist, S.M., and M.L. Hunter Jr. 2010. A multi-scale assessment of amphibian habitat selection: wood frog response to timber harvesting. *Ecoscience* 17:251-264.
- Strojny, C. A. and M. L. Hunter, Jr. 2010. Comparing relative abundance of amphibians in forest canopy gaps of natural origin vs. timber harvest origin. *Animal Biodiversity and Conservation* 33:1-13.
- Beaudry, F., P. G. deMaynadier. M. L. Hunter, Jr. 2010. Identifying hot moments in road mortality risk for freshwater turtles. *Journal of Wildlife Management* 74:152-159.
- Strojny, C. A. and M. L. Hunter, Jr. 2010. Log diameter influences detection of eastern red-backed salamanders (*Plethodon cinereus*) in harvest gaps, but not in closed-canopy forest conditions. *Herpetological Conservation and Biology* 5:80-85.
- Beaudry, F., P. G. deMaynadier. M. L. Hunter, Jr. 2010. Nesting movements and nest site characteristics of spotted turtles (*Clemmys guttata*) and Blanding's turtles (*Emydoidea blandingii*): Implications for the use of artificial nest sites. *Herpetological Conservation and Biology* 5:1-8.

- Politi, N., M.L. Hunter, Jr., and L. Rivera. 2009. Nest selection by cavity-nesting birds in subtropical montane forests of the Andes: some implications for sustainable forest management. *Biotropica* 41:354-360.
- Lindenmayer, D.B., M.L. Hunter, Jr., P.J. Burton, and P. Gibbons. 2009. Effects of logging on fire regimes in moist forests. *Conservation Letters* 2:271-277.
- Blomquist, S.M. and M.L. Hunter, Jr. 2009. A multi-scale assessment of habitat selection and movement patterns by Northern Leopard Frogs (*Lithobates [Rana] pipiens*) in a managed forest. *Herpetological Conservation and Biology* 4:142-160.
- Beaudry, F., P. G. deMaynadier, M. L. Hunter, Jr. 2009. Seasonally-dynamic habitat use by Spotted (*Clemmys guttata*) and Blanding's Turtles (*Emydoidea blandingii*) in Maine. *Journal of Herpetology* 43:636-645.
- Semlitsch, R.D., S.M. Blomquist, A.J.K. Calhoun, J. W. Gibbons, J.P. Gibbs, G. Graeter, E.B. Harper, D. Hocking, M. Hunter, Jr., D.A. Patrick, T.A.G Rittenhouse, B.B. Rothermel, and B.D. Todd. 2009. Effects of timber management on amphibian populations: understanding mechanisms from forest experiments. *Bioscience* 59:853-862
- Hunter, M.L. Jr., M.J. Bean, D. B. Lindenmayer, and D. S. Wilcove. 2009. Thresholds and the mismatch between environmental laws and ecosystems. *Conservation Biology* 23:1053-1055.
- Wang, G., J. O. Wolff, S. H. Vessey, N. A. Slade, J. W. Witham, J. F. Merritt, M. L. Hunter, Jr., and S.P. Elias. 2009. Comparative population dynamics of *Peromyscus leucopus* in North America: influences of climate, food, and density dependence. *Population Ecology* 51:133-142.
- Sutherland, W.J. et al. 2009. An assessment of the 100 questions of greatest importance to the conservation of global biological diversity. *Conservation Biology* 23:557-567.
- Beaudry, F., P. G. deMaynadier, M.L. Hunter Jr. 2008. Identifying road mortality threat at multiple spatial scales for semi-aquatic turtles. *Biological Conservation* 141:2550-2563.
- Schwartz, M.W., M. L. Hunter, Jr., P. D. Boersma. 2008. Scientific societies in the 21st century: a membership crisis? *Conservation Biology* 22:1087-1089.
- Patrick, D.A., E.B. Harper, M.L. Hunter Jr, and A.J.K. Calhoun. 2008. Terrestrial habitat selection and strong density-dependent mortality in recently metamorphosed amphibians. *Ecology* 89:2563-2574.
- Patrick, D.A., A.J.K. Calhoun and M.L. Hunter Jr. 2008. The importance of understanding spatial population structure when evaluating the effects of silviculture on spotted salamanders (*Ambystoma maculatum*). *Biological Conservation* 141:807-814
- Blomquist, S.M., J.D. Zydlewski and M.L. Hunter Jr. 2008. Efficacy of PIT tags for tracking the terrestrial anurans *Rana pipiens* and *Rana sylvatica*. *Herpetological Review* 39:174-179.
- Lindenmayer, D. et al. 2008. A checklist for ecological management of landscapes for conservation. *Ecology Letters* 11:78-91.
- Cornelius, C., K. Cockle, N. Politi, I. Berkunsky, L. Sandoval, V. Ojeda, L. Rivera, M.L. Hunter, Jr., and K. Martin. 2008. Cavity-nesting birds in Neotropical forests: cavities as a potentially limiting resource. *Ornitologia Neotropical* 19:253-268.
- Hunter, M.L. 2007. Climate change and moving species: Furthering the debate on assisted colonization. *Conservation Biology* 21:1356-1358.
- Campbell, S.P., J.W. Witham, and M.L. Hunter Jr. 2007. A long-term study on the effects of a selection timber harvest on a forest bird community in Maine. *Conservation Biology* 21:1218-1229.
- Blomquist, S.B. and M. L. Hunter Jr. 2007. Externally attached radio-transmitters have limited effects on the antipredator behavior and vagility of *Rana pipiens* and *R. sylvatica*. *Journal of Herpetology* 41:430-438.

- Patrick, D. A. Calhoun, and M.L. Hunter, Jr. 2007. The orientation of juvenile wood frogs, *Rana sylvatica*, leaving experimental ponds. *Journal of Herpetology* 41:158-163.
- Anderson, M.W. et al. 2007. Attitude changes of undergraduate university students in general education courses. *Journal of General Education* 56: 149-168.
- Elias, S.P., J. W. Witham, and M. L. Hunter, Jr. 2006. Impact of a group-selection timber harvest on a 22-year population fluctuation pattern in *Clethrionomys gapperi*. *Journal of Mammalogy* 87:440-445.
- Perkins, D. W. and M. L. Hunter. 2006. Use of amphibians to define riparian zones along headwater streams in Maine. *Canadian Journal of Forest Research* 36:2124-2130.
- Patrick, D.A., M.L. L. Hunter Jr., and A. J. K. Calhoun. 2006. Effects of experimental forestry treatments on a Maine amphibian community. *Forest Ecology and Management* 234:323-332.
- Perkins, D. W. and M.L. Hunter, Jr. 2006. Effects of riparian timber management on amphibian communities in Maine. *Journal of Wildlife Management* 70:657-670.
- Schulte, Lisa A., R. J. Mitchell, M. L. Hunter, Jr., J. F. Franklin, R. K. McIntyre, and B. J. Palik. 2006. Evaluating the conceptual tools for forest biodiversity conservation and their implementation in the United States. *Forest Ecology and Management* 232:1-11.
- Hunter, M.L. Jr. 2005. A mesofilter complement to coarse and fine filters. *Conservation Biology* 19:1025-1029.
- Elias, S.P., J. W. Witham, and M. L. Hunter, Jr. 2004. Maine *Peromyscus leucopus* abundance and acorn mast: Population fluctuation patterns over 20 years. *Journal of Mammalogy* 85:743-747
- Lindenmayer, D.B., D.R. Foster, J.F. Franklin, M.L. Hunter, R.F. Noss, D. Perry, and F.A. Schmiegelow. 2004. Salvage harvesting policies after natural disturbances. *Science* 303:1303.
- Belovsky, G.E., D. B. Botkin, T. Crowl , K. Cummins, J. Franklin, M.L. Hunter, A. Joern, D. B. Lindenmayer, J. MacMahon, C. Margules, M. Scott. 2004. Ten suggestions to strengthen the science of ecology. *BioScience*. 54:345-351.
- Hunter, M.L. Jr., A. Calhoun, and D. S. Wilcove. 2004. Goliath Heron fishing with an artificial bait? *Waterbirds* 27:312-313.
- Guerry, A. and M.L. Hunter, Jr. 2002. Amphibian distributions in a landscape of forests and agriculture: An examination of landscape composition and configuration. *Conservation Biology* 16:745-754 .
- Hunter, M.L. Jr. and S. L. Webb. 2002. Enlisting taxonomists to survey poorly known taxa for biodiversity conservation: A lichen case study. *Conservation Biology* 16:660-665.
- DiMauro, D. and M.L. Hunter, Jr. 2002. Reproduction of amphibians in natural and anthropogenic temporary pools in managed forests. *Forest Science* 48:397-406.
- Mitchell, R.J., B.J. Palik, M.L. Hunter, Jr. 2002. Natural disturbance as a guide to silviculture. *Forest Ecology and Management* 155:315-317.
- Perkins, D. W. and M.L. Hunter, Jr. 2002. Effects of placing sticks in pitfall traps on amphibian and small mammal capture rates. *Herpetological Review* 33:282-284.
- Joyal, R., M. McCollough and M.L. Hunter, Jr. 2001. Wetland conservation at a landscape scale: A case study of spotted and Blanding's turtles in southern Maine. *Conservation Biology* 15:1755-1762.
- Noss, R. and M.L. Hunter. 2001. From assemblage to community. *Conservation Biology* 15:1201-1202.
- Plucinksi, K.E. and M.L. Hunter, Jr. 2001. Spatial and temporal patterns of seed predation on three tree species in an oak-pine forest. *Ecography* 24:309-317.

- Hunter, M.L. Jr. 2000. Refining normative concepts in conservation. *Conservation Biology* 14:573-574.
- deMaynadier, P.G. and M.L. Hunter, Jr. 2000. Forest roads and amphibian movements in Maine. *Natural Areas Journal* 20:56-65.
- Joyal, L.A., M. McCollough, and M.L. Hunter, Jr. 2000. Population structure and reproductive ecology of Blanding's turtle (*Emydoidea blandingii*) in Maine near the northeastern edge of its range. *Chelonian Conservation and Biology* 3:580-588.
- Monti, L., M.L. Hunter, Jr. and J. Witham. 2000. An evaluation of the artificial cover object (ACO) method for monitoring populations of the redback salamander (*Plethodon cinereus*). *Journal of Herpetology* 34:624-629.
- McCracken, K., M.L. Hunter, Jr. and J. Witham. 1999. Relationships between seed fall of three tree species and *Peromyscus leucopus* and *Clethrionomys gapperi* during ten years in an oak-pine forest. *Journal of Mammalogy* 80:1288-1296.
- White, A., J. Witham, M.L. Hunter, Jr. and A.J. Kimball. 1999. The relationship between plant species richness and biomass in a coastal Maine *Quercus-Pinus* forest. *Journal of Vegetation Science* 10:755-762.
- deMaynadier, P.G. and M.L. Hunter, Jr. 1999. Forest canopy closure and juvenile emigration by pool-breeding amphibians in Maine. *Journal of Wildlife Management* 63:441-450.
- Dibble, A., J.C. Brissette, and Hunter, M.L. Jr. 1999. Putting community data to work: Some understory plants indicate red spruce habitat. *Forest Ecology and Management* 114: 275-291.
- Vickery, P.D., M.L. Hunter, Jr., and J.V. Wells. 1999. Effects of fire and herbicide treatment on habitat selection of grassland birds in southern Maine. *Studies in Avian Biology* 19:149-159.
- deMaynadier, P.G. and M.L. Hunter, Jr. 1998. Effects of silvicultural edges on the distribution and abundance of amphibians in Maine. *Conservation Biology* 12:340-352.
- Hartley, M. and M.L. Hunter, Jr. 1998. A meta-analysis of forest cover, edge effects, and predation rates of artificial nests. *Conservation Biology* 12:465-469.
- Whitman, A.A., M.L. Hunter, Jr. and J. W. Witham 1998. Age distribution of ramets of a forest herb, Wild Sarsaparilla, *Aralia nudicaulis*, (Araliaceae). *Canadian Field-Naturalist* 112:37-44.
- Hunter, M.L. Jr. and A. White. 1997. Ecological thresholds and the definition of old-growth forests. *Natural Areas Journal* 17:292-296.
- Hunter, M.L. Jr. and J. Jaros-Su. 1997. Insects, entomologists, and the conservation of biodiversity. *Northeast Naturalist* 4:153-158.
- Hunter, M.L. Jr. 1996. Benchmarks for managing ecosystems: Are human activities natural? *Conservation Biology* 10:695-697.
- Hunter, M.L. Jr. 1996. "A desktop reference for conservationists." Book review of R. Paelkhe's "Conservation and environmentalism: An encyclopedia." *Conservation Biology* 10:1477-1478.
- Boone, R., and M.L. Hunter, Jr. 1996. Using diffusion models to simulate the effects of grizzly bear dispersal in the Rocky Mountains. *Landscape Ecology* 11:51-64.
- deMaynadier, P.G. and M.L. Hunter, Jr. 1995. The relationship between forest management and amphibian ecology: a review of the North American literature. *Environmental Reviews* 3:230-261.
- Mugangu, T., M.L. Hunter, Jr., and J. Gilbert. 1995. Food, water, and predation: a model of habitat selection by buffalo in Virunga National Park, Zaire. *Mammalia* 59:349-362.
- Kimball, A., J. Witham, J. Rudnicky, A. White, and M.L. Hunter, Jr. 1995. Harvest-created and natural canopy gaps in an oak-pine forest in Maine. *Bulletin of the Torrey Botanical Society* 122:115-123.

- Vickery, P. and M.L. Hunter, Jr. 1995. Testing the song perch limitation hypothesis: Do artificial perches affect bird use. *American Midland Naturalist* 133:164-169.
- Vickery, P., M.L. Hunter, Jr. and S. Melvin. 1994. Effects of habitat area on the distribution of grassland birds. *Conservation Biology* 8:1087-1097. Reprinted in P. Vickery and P. Dunwiddie. 1997. *Grasslands of Northeastern North America*, Massachusetts Audubon Society, Lincoln, MA.
- Hunter, M.L. Jr. and A. Hutchinson. 1994. The virtues and shortcomings of parochialism: Conserving species that are locally rare, but globally common. *Conservation Biology* 8:1163-1165.
- Markowsky, J., M.L. Hunter, Jr. and W. Glanz. 1994. Why do brown tremblers tremble? *Journal of Field Ornithology* 65:247-249.
- Rudnick, T. and M.L. Hunter, Jr. 1993. Reversing the fragmentation perspective: Effects of clearcut size on bird species richness in Maine. *Ecological Applications* 3:357-366.
- Rudnick, T. and M.L. Hunter, Jr. 1993. Avian nest predation in clearcuts, forests, and edges in a forested landscape. *Journal of Wildlife Management* 57:358-364.
- Gibbs, J., M.L. Hunter, Jr. and S. Melvin. 1993. Snag availability and communities of cavity nesting birds in tropical versus temperate forests. *Biotropica* 25: 236-241.
- Hunter, M.L. Jr. and P. Yonzon. 1993. Altitudinal distribution of birds, mammals, people, parks, and forests in Nepal. *Conservation Biology* 7:420-423.
- Hunter, M.L. Jr. 1993. Natural disturbance regimes as spatial models for managing boreal forests. *Biological Conservation* 65:115-120.
- Hunter, M.L. Jr. 1993. "Biodiversity goes public." Book review of E. O. Wilson's "The diversity of life." *Conservation Biology* 7:208-209.
- Hunter, M.L. Jr. 1993. Of puffins and parochialism: Is it important to conserve species that are locally rare but globally common? *Maine Naturalist* 1: 39-42.
- Vickery, P., M.L. Hunter, Jr. and J. Wells. 1992. Is density an indicator of breeding success? *Auk* 109:706-710.
- Vickery, P., M.L. Hunter, Jr. and J. Wells. 1992. Use of a new reproductive index to test the relationship between habitat quality and breeding success. *Auk* 109:697-705.
- Mugangu, E. and M.L. Hunter, Jr. 1992. Aquatic foraging by hippopotamus in Zaire: response to a food shortage? *Mammalia* 56:345-349.
- Vickery, P., M.L. Hunter, Jr. and J. Wells. 1992. Predation of grassland birds in southern Maine: is it directed or incidental? *Oikos* 63:281-288.
- Yonzon, P. and M.L. Hunter, Jr. 1991. Conservation of the red panda *Ailurus fulgens*. *Biological Conservation* 57:1-11.
- Yonzon, P. and M.L. Hunter, Jr. 1991. Cheese, tourists, and red pandas in the Nepal Himalayas. *Conservation Biology* 5:196-202. (Reprinted in D. Ehrenfeld. 1995. *Readings from Conservation Biology*. Blackwell, Boston.)
- Hunter, M.L. Jr. 1991. Conservation strategies for the giant and red pandas. *Trends in Ecology and Evolution* 6:378-379.
- Jennings, D.T., H.S. Crawford and M.L. Hunter, Jr. 1991. Predation by amphibians and small mammals on the spruce budworm (Lepidoptera: Tortricidae). *Great Lakes Entomologist* 24:69-74.

- Hunter, M.L. Jr., R. Hitchcock and B. Wyckoff-Baird. 1990. Women and wildlife in southern Africa. *Conservation Biology* 4:448-451. (Reprinted in D. Ehrenfeld. 1995. *Readings from Conservation Biology*. Blackwell, Boston.)
- Hunter, M.L. Jr. 1990. "When I am hungry ..." Book review of Western and Pearl (1989), "Conservation for the twenty-first century." *Ecology* 71:2398.
- Hunter, M.L. Jr. 1989. What constitutes an old growth stand? *Journal of Forestry* 87:33-35.
- Small, M. and M.L. Hunter, Jr. 1989. Response of passerines to abrupt forest-river and forest-powerline edges in Maine. *Wilson Bulletin* 101:77-83.
- Stockwell, S.S. and M.L. Hunter, Jr. 1989. Distribution and abundance of herpetofauna in eight types of Maine peatlands vegetation. *Journal of Herpetology* 23:409-414.
- Hunter, M.L. Jr. 1989. Himalayan birds face uphill while singing. *Auk* 106:728-729.
- Hunter, M.L. Jr. 1989. Aardvarks and Arcadia: Two principles of wildlife research. *Wildlife Society Bulletin* 17:350-351.
- Hunter, M.L. Jr., G. Jacobson and T. Webb 1988. Paleoecology and the coarse-filter approach to maintaining biological diversity. *Conservation Biology* 2:375-385. (Reprinted in D. Ehrenfeld. 1995. *Readings from Conservation Biology*. Blackwell, Boston.)
- Small, M. and M.L. Hunter, Jr. 1988. Forest fragmentation and avian nest predation in forested landscapes. *Oecologia* 76:62-64.
- Gibbs, J.P., S. Woodard, M.L. Hunter, Jr. and A.W. Hutchinson. 1988. Comparison of techniques for censusing great blue heron nests. *Journal of Field Ornithology* 59:130-134.
- Gibbs, J.P., S. Woodard, M.L. Hunter, Jr. and A.E. Hutchinson. 1987. Determinants of great blue heron colony distribution in coastal Maine. *Auk* 104:38-47.
- Hunter, M.L. Jr., J. J. Jones, J. W. Witham and T. M. Mingo. 1986. Biomass and species richness of aquatic macrophytes in four Maine, U.S.A. lakes of different acidity. *Aquatic Botany* 24:91-95.
- Hunter, M.L. Jr., A. Kacelnik, J. Robert and M. Vuilleumoz. 1986. Directionality of avian vocalizations: a laboratory study. *Condor* 88:371-375.
- Hunter, M.L. Jr., J. Jones, K.E. Gibbs and J.R. Moring. 1986. Duckling responses to lake acidification: do black ducks and fish compete? *Oikos* 47:27-32.
- Hunter, M.L. Jr. and J. Witham. 1985. Effects of a carbaryl-induced depression of arthropod abundance on the foraging behavior of Parulinae warblers. *Canadian Journal of Zoology* 63:2612-2616.
- Hunter, M.L. Jr., J. Witham and H. B. Dow. 1984. Effects of a carbaryl-induced depression in invertebrate abundance on the growth and behavior of American black duck and mallard ducklings. *Canadian Journal of Zoology* 62:452-456.
- Kacelnik, A., A. Moreno, J. Roberts and M.L. Hunter, Jr. 1983. Physical considerations in the frequency limits of bird song. *Acoustic Letters* 6:100-105.
- Gaston, A.J., P.J. Garson and M.L. Hunter, Jr. 1983. The status and conservation of forest wildlife in Himachal Pradesh, Western Himalayas. *Biological Conservation* 27:291-314.
- Roberts, J., A. Kacelnik and M.L. Hunter, Jr. 1981. The ground effect and acoustic communication. *Animal Behaviour* 29:633-634.
- Gaston, A.J., P.J. Garson and M.L. Hunter, Jr. 1981. Present distribution and status of pheasants in Himachal Pradesh, West Himalayas. *Journal of the World Pheasant Association* 6:10-30.

- Hunter, M.L. Jr. 1980. Microhabitat selection for singing and other behaviour in great tits *Parus major*: Some visual and acoustical considerations. *Animal Behaviour* 28:468-475.
- Hunter, M.L. Jr. 1980. Vocalization during inhalation in a nightjar. *Condor* 82:101-103.
- Roberts, J., A. Kacelnik and M.L. Hunter, Jr. 1980. Some consequences of sound interference patterns for bird song. *Acoustic Letters* 3:141-146.
- Hunter, M.L. Jr. and J.R. Krebs. 1979. Geographical variation in the songs of the great tit (*Parus major*) in relation to ecological factors. *Journal of Animal Ecology* 48:759-785.
- Hunter, M.L. Jr. and P.J. Garson. 1979. The effects of temperature and time of year on the singing behaviour of Wrens (*Troglodytes troglodytes*) and Great Tits (*Parus major*). *Ibis* 121:481-487.
- Roberts, J., A. Kacelnik and M.L. Hunter, Jr. 1979. A model of sound interference in relation to acoustic communication. *Animal Behaviour* 27:1271-1273.
- Hunter, M.L. Jr. 1975. Least tern breeding range extension in Maine. *Auk* 92:143-145.
- Franzoi Dri, G., M.L. Hunter, Jr., J. Witham, A. Mortelliti. In review. Pulsed resources and the resource-prediction strategy: a field-test using a 36-year study of small mammals. *Ecology*
- Call, E.M. and M.L. Hunter. Marine nutrient inputs in the diets of nestling bald eagle, osprey, belted kingfisher, and tree swallow in an impounded river. *Waterbirds*.
- Politi, N., M.L. Hunter, Jr., and J. Witham. In review. Effect of logging on tree cavity resources in an oak-pine forest of Maine. *Northern Journal of Applied Forestry*
- Blomquist, S.M., and M.L. Hunter Jr. In review. Environmental stochasticity induces species and life-stage-specific changes in fitness correlates of two anuran species. *Oikos*.
- Foss, C.R., B.R. Sturtevant, T.P. Skaling and M.L. Hunter, Jr. A comparison of three methods to assess reproductive success of forest birds. To be submitted to *Journal of Ornithology*.
- Foss, C.R., and M.L. Hunter, Jr. Evaluating biological integrity along an urban to forest gradient using bird community metrics. To be submitted to *Ecological Applications*
- Foss, C.R., and M.L. Hunter, Jr. Avian density and nesting success: relationships in a managed Acadian spruce-fir forest. To be submitted to *Auk*
- Foss, C.R., and M.L. Hunter, Jr. Effects of partial cutting on breeding birds in an Acadian spruce-fir forest. To be submitted to *Forest Ecology and Management*
- Hartley, M.A. and M. L. Hunter, Jr. Effects of 10% and 20% timber removals on bird community composition: an experimental approach. To be submitted to *Journal of Wildlife Management*.
- Hartley, M.A. and M. L. Hunter, Jr. Effects of experimental habitat disturbances on breeding site-fidelity of adult hermit thrushes (*Catharus guttatus*) and ovenbirds (*Seiurus aurocapillus*). To be submitted to *Auk*.
- Hartley, M.A. Effects of red squirrel (*Tamiasciurus hudsonicus*) population fluctuations on bird populations. To be submitted to *Oikos*.
- Kolozsvary, M. B., A. J. K. Calhoun, and M. L. Hunter, Jr. An evaluation of sampling techniques for larval amphibians in wetlands. In revision for *Herpetological Reviews*.
- Kolozsvary, M. B., A. J. K. Calhoun, and M. L. Hunter, Jr. Constraints of flood duration of wetlands on reproduction in wood frogs and spotted salamanders. Submitted to *Ecology*

Kolozsvary, M. B., A. J. K. Calhoun, and M. L. Hunter, Jr. Hydrological characteristics and landscape setting of breeding pools for wood frogs and spotted salamanders. To be submitted to *Wetlands*.

Stockwell, S.S. and M.L. Hunter, Jr. Habitat selection and population density changes in peatland birds: A test of the Fretwell-Lucas hypothesis. In prep.

Book chapters

Vickery, B.S. and M.L. Hunter, Jr. 2020. The distribution of birds in Maine. Pages 7-29 in P.D. Vickery. *The Birds of Maine*, Princeton University Press.

Saura, S, E. Martin-Queller, and M.L. Hunter, Jr. 2014. Forest landscape change and biodiversity conservation. Pages 167-198 in J.C. Azevedo, A.H. Perera, and M.A. Pinto (eds). *Forest Landscapes and Global Change*. Springer-Verlag

Popescu, V.D. and M.L. Hunter. 2012. Assisted colonization of wildlife species at risk from climate change. Pages 347-368 in: J. Brodie and E. Post (eds.) *Conserving wildlife populations in a changing climate*. University of Chicago Press.

Hunter, M.L., Jr. 2010. Of fir and fen: Exploring ecological patterns. Pages 4-6 in S.C. Gawler, and A.R. Cutko. *Natural landscapes of Maine*. Maine Natural Areas Program, Maine Dept of Conservation, Augusta Maine.

Hunter, M.L., C. Burns, P. deMaynadier, L. Incze, W. Krohn, P. Vaux, and B. Vickery. 2009. Biodiversity . Pages 30-36 in Jacobson, G.L., I.J. Fernandez, P.A. Mayewski, and C.V. Schmitt (editors). 2009. *Maine's Climate Future*. University of Maine. Orono, ME.

Politi, N., L. Rivera, and M.L. Hunter, Jr. 2009. "Los bosques no son sólo árboles y los árboles no son sólo madera: la necesidad de un manejo forestal que incluya la biodiversidad." *Ecología, historia natural y conservación de la Selva Pedemontana de las Yungas Australes*. Pages 255-257 in Brown A. D., Blending P. G., Lomáscolo T. y P. García Bes (eds.). *Ediciones del Subtrópico, Tucumán*.

Hunter, M.L. Jr. 2008. Valuing and conserving vernal pools as small-scale ecosystems. Pages 1-8 in A.J.K. Calhoun and P. deMaynadier, editors. *Science and conservation of vernal pools in northeastern North America*. CRC Press, Boca Raton, Florida. 363 pp.

Hunter, M.L. Jr. 2007. Core principles for using natural disturbance regimes to inform landscape management. Pages 408-422 In Hobbs, R. and D. Lindenmayer (editors). *Managing and designing landscapes for conservation*. Blackwell Science, Oxford, United Kingdom.

Hunter, M.L. 2003. Foreword. Pages xi-xiii in C. Groves. *Drafting a conservation blueprint*. Island Press, Washington, D.C. 456pp.

Calhoun, A. and M.L. Hunter, Jr. 2003. Managing ecosystems for amphibian conservation. Pages 228-241 in R. Semlitsch, ed., *Amphibian conservation*. Smithsonian Institution Press, Washington DC.

Hixon, M.A., P. D. Boersma, M. L. Hunter, Jr., F. Micheli, E. A. Norse, H.P. Possingham, P. V. R. Snelgrove. 2001. Oceans at risk: Research priorities in marine conservation biology. Pages 125-154 in M. E. Soulé and G. H. Orians. eds. *Conservation biology: Research priorities for the next decade*. Island Press, Washington, D.C.

Engstrom, R.T., S. Gilbert, M.L. Hunter, Jr., D. Merriwether, G. J. Nowacki, and P. Spencer. 1999. Practical applications of disturbance ecology to natural resources management. Pages 313-330 in: Johnson, N.C., A.J. Malk, W.T. Sexton, and R. Szaro (eds.), *Ecological Stewardship: A Common Reference for Ecosystem Management*. Volume 2. Elsevier Science Ltd., Oxford.

Hunter, M.L. Jr. 1999. Biological diversity. Pages 3-21 in Hunter, M.L. (ed.). *Maintaining biodiversity in forest ecosystems*. Cambridge University Press, Cambridge, England. 698pp.

Seymour, R. and M.L. Hunter, Jr. 1999. Principles of ecological forestry. Pages 22-61 in Hunter, M.L. (ed.). *Maintaining biodiversity in forest ecosystems*. Cambridge University Press, Cambridge, England. 698pp.

deMaynadier, P.G., and M.L. Hunter, Jr. 1997. The role of keystone ecosystems in landscapes. Pages 68-76 in A. Haney and M. Boyce. *Ecosystem management*. Yale University Press, New Haven, Connecticut. 361pp.

Hunter, M.L. Jr. 1997. The biological landscape. Pages 57-67 in: K. Kohm and J. Franklin. *Creating a forestry for the 21st century*. Island Press, Washington D.C. 475 pp.

Hunter, M.L. Jr. and A. Calhoun. 1996. A triad approach to land-use allocation. Pages 477-491 in R. Szaro and D. Johnston. (Editors). *Biodiversity in managed landscapes*. Oxford University Press, New York. 778 pp.

Kitsos, A., M.L. Hunter, Jr., J.H. Sabnis, and A. Mehta. 1995. A guide to the identification of some Indian mammal hairs. Pages 123-130 in S. H. Berwick and V.B. Saharia (eds.) *The development of international principles and practices of wildlife research and management: Asian and American approaches*. Oxford University Press, Delhi.

Witham, J.W. and M.L. Hunter, Jr. 1992. Population trends of neotropical landbird migrants in northern coastal New England. Pages 85-95 in J. Hagan and D. Johnston (eds.). *Ecology and Conservation of Neotropical Migrant Landbirds*. Smithsonian Institution Press, Washington D.C. 608 pp.

Hunter, M.L. Jr. 1992. Paleoecology, landscape ecology, and the conservation of neotropical migrant passerines in boreal forests. Pages 511-523 in J. Hagan and D. Johnston (eds.). *Ecology and Conservation of Neotropical Migrant Landbirds*. Smithsonian Institution Press, Washington, D.C. 608 pp.

Hunter, M.L. Jr. 1991. Coping with ignorance: the coarse-filter strategy for maintaining biological diversity. Pages 266-281 in K. Kohm (ed.) *Balancing on the brink of extinction*. Island Press, Washington, D.C. 316pp.

Yonzon, P.B. and M.L. Hunter, M.L. Jr. 1989. Ecological study of the red panda in the Nepal-Himalayas. Pages 1-7 in A.R. Glatston (ed.). *Red panda biology*. SPB Academic Publ., The Hague, Netherlands. 178pp.

Symposia proceedings

Hunter, M.L. Jr. 1993. Some ideas about New Forestry in New England. Pages 6-15 in: Briggs, R.D. and W.B. Krohn. *Nurturing the northeastern forest*. Maine Agricultural and Forestry Experiment Station Misc. Report 382.

Hunter, M.L. Jr. 1993. An overview of biodiversity in forest ecosystems. Pages 7-13 in D. Kuhnke, ed., *Birds in the Boreal Forest*. Forestry Canada, Edmonton, Alberta.

Hunter, M.L. Jr. 1993. Managing biodiversity in forests at large spatial and temporal scales. Pages 102-112 in D. Kuhnke, ed., *Birds in the Boreal Forest*. Forestry Canada, Edmonton, Alberta.

Hunter, M.L. Jr. 1991. Seeing the world from a bird's eye view: bird conservation at a landscape scale. *Acta Congressus Internationalis Ornithologici* 20:2283-2285.

Hunter, M.L. Jr. and R.S. Seymour. 1989. A combined voluntary-mandatory approach to fostering diverse, productive forests in Maine. Pp. 88-92 in R. Briggs, W. Krohn, J. Trial, W. Ostrofsky, and D. Field (eds.). *Forest and wildlife management in New England*. Maine Agric. Expt. Stn. Misc. Rep. 336. 262pp.

Hunter, M.L. Jr. 1987. Managing forests for spatial heterogeneity to maintain biological diversity. *Trans. North American Wildlife Natural Resources Conference* 52:60-69.

DesGranges, J.L. and M.L. Hunter, Jr. 1987. Duckling response to lake acidification. *Trans. North American Wildlife Natural Resource Conference* 52:636-644.

Goodell, S.B., M.L. Hunter, Jr. and A. Kimball. 1986. Application of wood science to the creation and maintenance of snags for wildlife. Pp. 135 to 139 in J. A. Bissonette (ed.). "Is Good Forestry Good Wildlife Management?" *Maine Agric. Expt. Stn. Misc. Publ. No. 689*. 377pp.

Hunter, M.L. Jr. 1986. The diversity of New England forest ecosystems. Pp. 35 to 47 in J. A. Bissonette (ed.) "Is Good Forestry Good Wildlife Management?" *Maine Agric. Expt. Stn. Misc. Publ. No. 689*. 377pp.

Hunter, M.L. Jr. and P.W. Brown. 1985. Potential effects of insecticides on the survival of dabbling duck broods. *Journal of the Minnesota Academy of Science* 50(3):41-45.

Hunter, M.L. Jr. and T.W. Haines. 1981. Waterfowl and their habitat: threatened by acid rain? Proc. IV International Waterfowl Symposium, New Orleans, pp. 177-188.

Hunter, M.L. Jr. and J.R. Krebs. 1981. Structure and function of Great Tit songs. *Acta XVII Congressus Internationalis Ornithologici*, Berlin. pp. 689-693.

Miscellaneous Publications

Hunter, M.L., C. Burns, P. DeMaynadier, L. Incze, W. Krohn, P. Vaux, and B. Vickery. 2009. Biodiversity. Pages 30-33 in Jacobson, G.L., I.J. Fernandez, P.A. Mayewski, and C.V. Schmitt (editors). *Maine's climate future: An initial assessment*. University of Maine, Orono, Maine. 70 pp.

White, Alan S., and Malcolm L. Hunter, Jr. 2007. Defining old growth. *News Quarterly*, New England Society of American Foresters 68 (4):8-9, 11.

Aber, J., N. Christensen, I. Fernandez, J. Franklin, L. Hiding, M. Hunter, J. MacMahon, D. Mladenoff, J. Pastor, D. Perry, R. Slangen, H. Miegrot. 2000. Applying ecological principles to management of the U.S. National Forests. *Issues in Ecology* No. 6, Ecological Society of America, Washington, D.C. 20pp.

Witham, J., M. Hunter, H. Tedford, A. Kimball, A. White, and S. Gerken 1999. A long-term study of an oak-pine forest ecosystem: A brief overview of the Holt Research Forest. *Maine Agricultural and Forest Experiment Station Miscellaneous Publication* 745. 23 pp.

Seymour, R. and M.L. Hunter, Jr. 1992. Principles and applications of New Forestry in spruce-fir forests of eastern North America. *Maine Agricultural Experiment Station Miscellaneous Publication* 716

Hartshorn, G., B. Kattel, M.L. Hunter, Jr., J. Mehta, B. Thapa and R. Shrestha. 1989. Feasibility assessment for creating the Nepal Conservation Training and Research Institute (NECTARI). *World Wildlife Fund*, Washington, D.C. 49pp.

Hunter, M.L. Jr. 1989. Environmental assessment. Annex IV in *Wildlife in Local Development Project Paper*. Africa Bureau, U.S. Agency for International Development, Washington, D.C.

Hunter, M.L. Jr., J.J. Jones, K.E. Gibbs, J.R. Morin and M. Brett. 1985. Interactions among waterfowl, fishes, invertebrates, and macrophytes in four Maine lakes of different acidity. *U.S. Fish Wildl. Serv. FWS/OBS*. 80(40.20) 80pp.

Hunter, M.L. Jr., J.W. Witham and J.J. Jones. 1985. Techniques for using the growth and behavior of imprinted ducklings to evaluate habitat quality. *Maine Agric. Expt. Sta. Techn. Bull.* 117. 18pp.

Hunter, M.L. Jr. 1984. A preliminary guide to finding and identifying the amphibians and reptiles of Maine. *The Nature Conservancy*, Brunswick, Maine. 44pp. (2nd ed. 1985)

Hunter, M.L. Jr. and J.W. Witham. 1982. Further studies on the indirect effects of carbaryl on birds. Pp. 35-66 in *Environmental Monitoring Reports from the 1981 Maine Cooperative Spruce Budworm Suppression Project*. Dept. of Conservation, Augusta, ME. 203pp.

R.W. Hansen, E. Osgood and M.L. Hunter, Jr. 1982. Effects of spraying with Sevin-4-oil on fruit-set and its potential consequences for wildlife in a spruce-fir forest. Pp. 91-122 in *Environmental Monitoring Reports from the 1981 Maine Cooperative Spruce Budworm Suppression Project*. Dept. of Conservation, Augusta, ME. 203pp.

Roberts, J., A. Kacelnik and M.L. Hunter, Jr. 1981. Some ecological and anatomical constraints on animal acoustic communication. *Institute of Environmental Science and Technology*, London. *Tech. Mem.* 77. London. 47pp.

Hunter, M.L. Jr. 1981. The indirect effects of carbaryl on the behavior of birds. Pp. 169-191 in Environmental Monitoring Reports from the 1980 Maine Cooperative Spruce Budworm Suppression Project. Dept. of Conservation, Augusta, ME. 191pp.

Hunter, M.L. Jr. 1980. Methods for describing the effects of catastrophic food supply depression on the behavior of birds. Pp. 40-50 in Environmental Monitoring Reports from the 1979 Maine Cooperative Spruce Budworm Suppression Project. Dept. of Conservation, Augusta, ME. 300pp.

Roberts, J., A. Kacelnik and M.L. Hunter, Jr. 1979. Sound interference patterns in animal acoustic communication. Institute of Environmental Science and Technology, London. Tech. Mem. 66. 28pp.

Hunter, M.L. Jr., S.C. Hacker, D.T. Jennings and F. B. Knight. 1979. Spruce budworms thesaurus. Maine Life Sci. Agric. Exp. Stn. Misc. Rep. 2220. 41pp.

Hunter, M.L. Jr. and K.L. Sage. 1975. Natural resources, pp. 28-86 in Reed, W. R., ed. Merrymeeting Bay: A Guide to the Conservation of a Unique Resource. Maine Bureau of Public Lands, Augusta, Maine. 369pp.

Hunter, M.L. Jr. 1975-78 I published five book reviews in Ibis.

Hunter, M.L. Jr. and K.J. Sage. 1975. Natural resources inventory. Pp. 25-39, and Natural resources analysis. Pp. 70-99 in: Lyman, F. (ed.). The Machias River Watershed Study. Maine Bureau of Public Lands, Augusta, Maine. 196pp.

Hunter, M.L. Jr. 1973. Ecosystems of the Maine Coast: Freshwater and Marine Ecosystems. Reed and D'Andrea, South Gardiner, Maine. 95pp.

Hunter, M.L. Jr. and A. LaBastille. 1973. Rare, endangered, threatened, and peripheral wildlife and fish of the Maine coast. in: Reed, W. C. (ed.). Conservation Priorities Plan of the Coast of Maine. Reed & D'Andrea, South Gardiner, Maine. 240pp.

Hunter, M.L. Jr. and W.C. Reed. 1973. Selection criteria and conservation priorities. Pp. 139-170 in Reed, W. C. (ed.). Conservation Priorities Plan of the Coast of Maine. Reed & D'Andrea, South Gardiner, Maine. 240pp.

Hunter, M.L. Jr. 1972. Soil analysis. In: Reed, W. C. (ed.). River Corridors and Open Space Handbook for the Central New Hampshire Planning Region, Reed & D'Andrea, South Gardiner, Maine. 396pp.

Hunter, M.L. Jr. and A.A. King. 1972. Water resources. In: Reed, W. C. (ed.). River Corridors and Open Space Handbook for the Central New Hampshire Planning Region, Reed & D'Andrea, South Gardiner, Maine. 396pp.

Popular Publications

Hunter, M.L., Jr. 2015. A rich forest. Pages 4-6 in A.W. Hopkins and E. Kaufman, eds. Reflections - Thirty Years, A Million Acres. Forest Society of Maine, Bangor, Maine.

Hunter, M.L., Jr., 2003. A forest reserve system for Maine. Pages 104-106 in P. Austin, D Bennett, and R. Kimber, eds. On wilderness: Voices from Maine. Tilbury House, Gardiner, Maine.

Hunter, M.L. Jr. 1999. Should a land trust cut its forest? Land Trust News 4(1):3-4.

Hunter, M.L. Jr. 1994. What is biodiversity? The Maine Scholar 7:56-74.

Hunter, M.L. Jr. 1989. Nicaragua, Haiti, and the world beyond Orono. Maine Forester, p. 9.

Hunter, M.L. Jr. 1985. Forests, forestry, and wildlife. Habitat. 2(8):30-34.

Hunter, M.L. Jr. 1985. The jumping frog of Kennebec County. Habitat 2(7):42-44.

Hunter, M.L. Jr. 1985. Are there any rattlesnakes in Maine? Habitat 2(6):40-41.

Hunter, M.L. Jr. 1984. Discovering Maine's little known animals. The Nature Conservancy-Maine Chapter News (5):6.

Hunter, M.L. Jr. 1978. Letter from an Oxford birdwatcher. American Oxonian 65:31-36.

Funding (grants over \$10,000)

- 2013- pr "Of Pools and People: Small natural features with large ecosystem functions in urbanizing landscapes" National Science Foundation, \$1,488,951 (with seven co-PIs)
- 2009-pr "Maine's Sustainability Science Initiative", National Science Foundation, \$20,000,000 (with many co-PIs).
- 1983-pr. *A long-term forest ecosystem study. Holt Woodlands Research Foundation. Ca. \$100,000/year (with A. J. Kimball, A. S. White, and J. W. Witham).
- 2003-2010 Land use practices and the persistence of amphibian populations. National Science Foundation Collaborative project with U Missouri, U Georgia, and SUNY-ESF; U.Maine's portion of budget: \$415,000.
- 2000 Role of canopy gaps and down woody material in maintaining biodiversity in the Acadian Forest of Maine. USDA Competitive Grants. \$260,000. (With R. Wagner and S. Woods).
- 2003 Calibration of Conservation Theory and Principles Applied at Various Geographic Scales National Commission on Science for Sustainable Forestry \$99,725 (with Robert Mitchell, Jerry Franklin, Lisa Schulte, Kevin McIntyre, and Brian Palik).
- 2003 "Effects of Roads on Movements and Mortality of Blanding's and Spotted Turtles in Southern Maine" Maine Department of Transportation , U.S. Fish and Wildlife Service, U.S. Environmental Protection Agency, Maine Dept Inland Fisheries and Wildlife, The Nature Conservancy \$189,000. (with Phillip deMaynadier),
- 2001 An inquiry-based learning modules for conservation biology education@ National Science Foundation \$998,000 plus (with Eleanor Sterling and James Gibbs)
- 2002 Use of Natural Disturbances to Guide Restoration Silviculture. National Commission on Science for Sustainable Forestry \$199,438 (with Robert Mitchell, Jerry Franklin, and Brian Palik)
- 1998 Amphibian Populations of Acadia National Park: Patterns and Processes in Relation to Anthropogenic and Natural Changes in Wetland Ecosystems. U.S. Geological Survey. \$210,000. (With A. Calhoun and W. Glanz)
- 1995-98.*Conserving forest biodiversity. Pew Charitable Trusts. \$150,000. (with R. Seymour).
- 1993-96.The ecology of vernal pools. USDA Forest Service, US Fish and Wildlife Service; U.S. E.P.A, \$39,000 (with M. McCollough)
- 1991 *Ecology and conservation of Blanding's and spotted turtles in Maine. Davis Conservation Foundation, Maine Dept. Inland Fisheries and Wildlife, \$16,000. (with M. McCollough)
- 1991 New England biodiversity project. Part 2. Environmental Protection Agency. \$100,000 (with R. O'Connor, R. Owen, and S. Sader).
- 1990 An ecological reserves system for Maine. Maine Research Fund. \$17,915. (with J. McMahon and G. Jacobson).
- 1988 Habitat selection by the African buffalo in Virunga National Park, Zaire. Rockefeller Foundation - \$25,400. (with E. Mugangu and J. R. Gilbert)

- 1985 Nepal-Himalayas red panda project. World Wildlife Fund, Metropolitan Toronto Zoo \$77,000 (with P. Yonzon).
- 1982 *The peatland wildlife of Maine. Maine Dept. Inland Fisheries and Wildlife Service - \$68,782.
- 1982 *Effects of acid precipitation on the aquatic habitat and ecology of waterfowl and fish. U.S. Fish and Wildlife Service - \$132,434. (with K. E. Gibbs and J. G. Stanley).
- 1982 *A long term environmental monitoring program for the spruce budworm suppression project. Maine Forest Service - \$45,998. (with K. E. Gibbs).
- 1971-81*Monitoring the indirect effects of spruce budworm suppression, the effects of catastrophic food supply depression on the behavior of birds. Maine Forest Service. \$103,000

*Senior or sole principal investigator.

Public Speaking

Hundreds of presentations in 15 countries, 27 states, and 8 Canadian provinces, mostly on forest biodiversity issues. Some notable talks in recent years:

Managing highly dynamic forests for biodiversity. Keynote address to IUFRO (International Union of Forestry Research Organizations) conference in Braganca Portugal.

Looking backwards to see forward: SCB, conservation biology, and your career. Keynote address to the International Congress for Conservation Biology, New Zealand

Designing refuges to maintain biodiversity in the face of climate change. National Fish, Wildlife and Plants Climate Adaptation Strategy Team, Washington, D.C. and National Conservation Leadership Forum, West Virginia.

“Reaching beyond the choir” and other career lessons from the history of conservation biology. Keynote address to Student Conference for Conservation Science, New York.

Preparing for Climate Change: Forestry and Assisted Colonization. Invited lecture to National Conference of the Forestry Guild, Vermont

Managing forests for biodiversity. The Carlton Owen Distinguished Lecture, College of Forest Resources, Mississippi State University.

Managing forests for wildlife and people: an historical perspective. International Congress for Conservation Biology, Beijing China

"Biodiversity: buzzword or fundamental concept?" Distinguished Lecturer for Science Day. University of Maine at Presque Isle.

Amphibians and forestry: a 19-year retrospective from Maine. University of Connecticut

Teaching

- 1979-pr University of Maine Graduate School. Advisor for 21 Ph.D. and 16 Masters students in Wildlife Ecology. Served on 50 graduate committees in 8 departments.
- 1979-pr University of Maine, Dept. Wildlife Ecology: Advanced Conservation Biology; Conservation Biology; Conservation planning, Forest Wildlife Management; International Conservation; Landscape Ecology and Conservation; Tropical Ecology field course; Introduction to Wildlife Conservation; Wildlife Management Planning; Behavioral Ecology; Photogrammetry (labs); Senior Seminar.

- 1978-79 University of Maine Honors Program: Sophomore seminar; Freshman seminar. Supervised four honor's theses.
- 1986 Wildlife populations and habitat management workshop for Nepali biologists.
- 1978 Oxford University: Introduction to Ecology.
- 1972-73 Abenaki Experimental College: Maine Ecosystems; Maine Fauna.