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EDUCATION

Ph.D., Univ. California, Santa Barbara (2008)

Major: Biology

M.S., Kansas State University (1999)

Major: Biology

B.S. (Honors), University of Massachusetts (1997)

Major: Wildlife Conservation

ACADEMIC POSITIONS

Department of Forest Engineering, Resources, and Management

Oregon State University Corvallis, Oregon, U.S.A.

2019–2023 Assistant Professor of Wildlife Ecology

Department of Forest Engineering, Resources, and Management

Oregon State University Corvallis, Oregon, U.S.A.

2015–2019 Assistant Professor, Senior Research

Department of Forest Ecosystems and Society

Oregon State University Corvallis, Oregon, U.S.A.

2009–2015 Post-doctoral Research Associate

Department of Forest Ecosystems and Society

Oregon State University Corvallis, Oregon, U.S.A.

PEER-REFEREED JOURNAL PUBLICATIONS

- ^Undergraduate student, *graduate student, *post-doctoral trainee, or *research associate under Rivers' direction or advisement.
 - §Galbraith, S. M., J. J. Valente§, C. J. Dunn, and J. W. Rivers. 2024. Both Landsat- and LiDAR-derived measures predict forest bee response to large-scale wildfire. *Remote Sensing in Ecology and Conservation* 10:xx-xx. https://doi.org/10.1002/rse2.354
 - Rivers, J. W. 2024. Fungal inoculations and mechanical wounding of trees have limited efficacy for snag creation two decades after treatment. *Forest Ecology and Management* 553:e121651. https://doi.org/10.1016/j.foreco.2023.121651
 - Ponisio, L. C., H. Cohen, S. M. Galbraith[§], J. Zorn, R. A. Zitomer[#], and J. W. Rivers. 2024. Host and floral communities shape parasite prevalence and reproduction in intensively managed conifer forests. *Ecosphere* 15(1):e4709. https://doi.org/10.1002/ecs2.4709
 - [#]Zitomer, R. A., S. M. Galbraith[§], M. G. Betts, A. R. Moldenke, R. A. Progar, and J. W. Rivers. 2023. Bee diversity decreases rapidly with time since harvest in intensively managed conifer forests. *Ecological Applications* 33(5):e2855. https://doi.org/10.1002/eap.2855
 - §Valente, J. J., J. W. Rivers, Z. Yang, S. K. Nelson, J. M. Northrup, D. D. Roby, C. Meyer, and M. G. Betts. 2023. Fragmentation effects on an endangered species across a gradient from the interior to edge of its range. *Conservation Biology* 37(5):e14091. https://doi.org/10.1111/cobi.14091
 - Ulyshen, M., K. R. Urban-Mead, J. B. Dorey, and J. W. Rivers. 2023. Forests are critically important to global pollinator diversity and enhance pollination in adjacent crops. *Biological Reviews* 98(4):1118-1141. https://doi.org/10.1111/brv.12947
 - Fountain, E. D., P. J. Kulzer, R. T. Golightly, J. W. Rivers, S. F. Pearson, M. G. Raphael, M. G. Betts, S. K. Nelson, D. D. Roby, N. F. Kryshak, S. Schneider, and M. Z. Peery. 2023. Characterizing the diet of a threatened seabird, the Marbled Murrelet *Brachyramphus marmoratus*, using high-throughput sequencing. *Marine Ornithology* 51(2):145-155.
 - *Kerstens, M. E., and J. W. Rivers. 2023. Is green the new black? Black-backed Woodpecker vital rates do not differ between unburned and burned forests within a pyrodiverse landscape. *Ornithological Applications* 125(2):duad010. https://doi.org/10.1093/ornithapp/duad010
 - Rivers, J. W., J. Bailey Guerrero⁺, R. D. Brodeur, G. K. Krutzikowsky, L. J. Adrean⁺, S. A. Heppell, K. C. Jacobson, K. Milligan, S. K. Nelson, D. D. Roby, W. J. Sydeman, L. G. Torres, and J. A. Barth. 2022. Critical research needs for forage fish within inner-shelf marine ecosystems. *Fisheries* 47(5):213–221. https://doi.org/10.1002/fsh.10725

- Yang, C., B. D. Peer, C. Ursino, J. Yu, and J. W. Rivers. 2022. Editorial: Evolution and function of acoustic and visual signals in avian brood parasitism. *Frontiers in Ecology and Evolution* 10:e892373. https://doi.org/10.3389/fevo.2022.892373
- *Zitomer, R., J. Karr, M. Kerstens*, L. Perry, K. Ruth, L. Adrean*, S. Austin, J. Cornelius, J. Dachenhaus*, J. Dinkins, A. Harrington, H. Kim, T. Owens, C. Revekant, V. Schroeder, C. Sink, J. Valente, E. Woodis*, and J. W. Rivers. 2022. Ten simple rules for getting started with statistics in graduate school. *PLOS Computational Biology* 18(4):e1010033. https://doi.org/10.1371/journal.pcbi.1010033
- Stokely, T. D., U. G. Kormann, J. Verschuyl, A. J. Kroll, D. Frey, S. H. Harris, D. Mainwaring, D. Maguire, J. Hatten. J. W. Rivers, S. Fitzgerald, and M. G. Betts. 2022. Experimental evaluation of herbicide use on biodiversity, ecosystem services, and timber production tradeoffs in forest plantations. *Journal of Applied Ecology* 59(1):52–66. https://doi.org/10.1111/1365-2664.13936
- Welke, C. A., B. Graham, R. R. Conover, J. W. Rivers, and T. M. Burg. 2021. Habitat-linked genetic structure for white-crowned sparrow (*Zonotrichia leucophrys*): local factors shape population genetic structure. *Ecology and Evolution* 11(17):11700–11717. https://doi.org/10.1002/ece3.7887
- *Lajoie, J. L., L. M. Gaino, and J. W. Rivers. 2021. Experimentally induced flight costs do not lead to increased reliance on supplemental food in winter by a small songbird. *Journal of Avian Biology* 52(9):e02782. https://doi.org/10.1111/jav.02782
- Kormann, U. G., T. D. Stokely, J. Verschuyl, A. J. Kroll, S. Harris, D. Maguire, D. Mainwaring, J. W. Rivers, and M. G. Betts. 2021. Reconciling biodiversity with timber production and revenue via an intensive forest management experiment. *Ecological Applications* 31(8):e02441. https://doi.org/10.1002/eap.2441
- Rivers, J. W., and M. G. Betts. 2021. Postharvest bee diversity is high but declines rapidly with stand age in regenerating Douglas-fir forest. *Forest Science* 67(3):275–285. https://doi.org/10.1093/forsci/fxab002
- §Valente, J. J., S. K. Nelson, J. W. Rivers, D. D. Roby, and M. G. Betts. 2021. Experimental evidence that social information affects habitat selection in Marbled Murrelets. *Ornithology* 138(2):ukaa086. https://doi.org/10.1093/ornithology/ukaa086
- §Valente, J. J., C. L. LeGrande-Rolls, J. W. Rivers, A. M. Tucker, R. A. Fisher, and M. G. Betts. 2021. Conspecific attraction for conservation and management of terrestrial breeding birds: current knowledge and future research directions. *Ornithological Applications* 123(2):duab007. https://doi.org/10.1093/ornithapp/duab007

- §Galbraith, S. M., J. H. Cane, and J. W. Rivers. 2021. Wildfire severity influences offspring sex ratio in a native solitary bee. *Oecologia* 195(1):65–75. https://doi.org/10.1007/s00442-020-04809-3
- Rivers, J. W., K. M. Jones[#], and M. G. Betts. 2020. Neither forest herbicides nor ambient temperature exert strong effects on reproductive output of a cavity-nesting songbird. *Avian Conservation & Ecology* 15(1):18. https://doi.org/10.5751/ACE-01578-150118
- Betts, M. G., J. M. Northrup, J. A. Bailey Guerrero, L. J. Adrean⁺, S. K. Nelson, J. L. Fisher, B. D. Gerber. M.-S. Garcia-Heras[§], Z. Yang, D. D. Roby, and J. W. Rivers. 2020. Squeezed by a habitat split: warm ocean conditions and old-forest loss interact to reduce long-term occupancy of a threatened seabird. *Conservation Letters* 13(5):e12745. https://doi.org/10.1111/conl.12745
- Rivers, J. W., J. Verschuyl, C. J. Schwarz, A. J. Kroll, and M. G. Betts. 2019. No evidence of a demographic response to experimental herbicide treatments by an early successional forest bird. *Condor* 121(2):duz004. https://doi.org/10.1093/condor/duz004
- §Galbraith, S. M., J. H. Cane, A. R. Moldenke, and J. W. Rivers. 2019. Salvage logging reduces wild bee diversity, but not abundance, in severely burned mixed-conifer forest. *Forest Ecology and Management* 453:117622. https://doi.org/10.1016/j.foreco.2019.117622
- §Galbraith, S. M., J. H. Cane, A. R. Moldenke, and J. W. Rivers. 2019. Wild bee diversity increases with local fire severity in a fire-prone landscape. *Ecosphere* 10(4):e02668. https://doi.org/10.1002/ecs2.2668
- *Lajoie, J. M., L. M. Gaino, and J. W. Rivers. 2019. Individual variation and seasonality drive bird feeder use during winter in a Mediterranean climate. *Ecology and Evolution* 9(5):2535–2549. https://doi.org/10.1002/ece3.4902
- §Northrup, J. M., J. W. Rivers, Z. Yang, and M. G. Betts. 2019. Synergistic effects of climate and land-use change influence broad-scale avian population declines. *Global Change Biology* 25(5):1561–1575. https://doi.org/10.1111/gcb.14571
- Rivers, J. W., S. M. Galbraith[§], J. H. Cane, C. B. Schultz, M. D. Ulyshen, and U. G. Kormann. 2018. A review of research needs for pollinators in managed conifer forests. *Journal of Forestry* 116(6):563–572. https://doi.org/10.1093/jofore/fvy052
- Rivers, J. W., C. L. Mathis[^], A. R. Moldenke, and M. G. Betts. 2018. Wild bee diversity is enhanced by experimental removal of timber harvest residue within intensively managed conifer forest. *GCB Bioenergy* 10(10):766–781. https://doi.org/10.1111/gcbb.12531
- [^]Hardt, B. M., D. R. Ardia, M. J. Bashaw, and J. W. Rivers. 2018. Experimental brood enlargement differentially influences corticosterone expression in sympatric, ecologically

- similar songbirds. *Functional Ecology* 32(8):2008–2018. https://doi.org/10.1111/1365-2435.13116
- *Barry, A. M., J. C. Hagar, and J. W. Rivers. 2018. Use of created snags by cavity-nesting birds across 25 years. *Journal of Wildlife Management* 82(7):1376–1384. https://doi.org/10.1002/jwmg.21489
- *Jones, K. M., J. W. Rivers, and M. G. Betts. 2018. Herbicides exert weak and variable effects on microclimate in early-seral forests. *Northwest Science* 92(2):107–118. https://doi.org/10.3955/046.092.0204
- §Northrup, J. M., J. W. Rivers, S. K. Nelson, D. D. Roby, and M. G. Betts. 2018. Assessing the utility of satellite transmitters for identifying nest locations and foraging behavior of the threatened Marbled Murrelet *Brachyramphus marmoratus*. *Marine Ornithology* 46(1):47–55. https://sora.unm.edu/node/143264
- Rivers, J. W., G. N. Newberry, C. J. Schwarz, and D. R. Ardia. 2017. Success despite the stress: violet-green swallows increase glucocorticoids and maintain reproductive output following experimental increases in flight costs. *Functional Ecology* 31(1):235–244. https://doi.org/10.1111/1365-2435.12719
- Rivers, J. W., J. L. Houtz, B. M. Horton, and M. G. Betts. 2017. No evidence for a link between forest herbicides and offspring sex ratio in a migratory songbird using high-throughput molecular sexing. *Conservation Physiology* 5(1):cox054. https://doi.org/10.1093/conphys/cox054
- *Barry, A. M., J. C. Hagar, and J. W. Rivers. 2017. Long-term dynamics and characteristics of snags created for wildlife habitat. *Forest Ecology and Management* 403:145–151. https://doi.org/10.1016/j.foreco.2017.07.049
- Rivers, J. W., and B. D. Peer. 2016. Relatedness constrains virulence in an obligate avian brood parasite. *Ornithological Science* 15(2):191–201. https://doi.org/10.2326/osj.15.191
- Liu, W.-C., J. W. Rivers, and D. J. White. 2016. Vocal matching and intensity of begging calls are associated with a forebrain song circuit in a generalist brood parasite. *Developmental Neurobiology* 76(6):615–625. https://doi.org/10.1002/dneu.22348
- Rivers, J. W., M. Johnson, S. M. Haig, C. J. Schwarz, J. Burnett, J. Brandt, D. George, and J. Grantham. 2014. An analysis of monthly home range size in the critically endangered California Condor. *Bird Conservation International* 24(4):492–504. https://doi.org/10.1017/S0959270913000592

- Rivers, J. W., M. A Blundell[^], and S. I. Rothstein. 2014. Mismatched begging displays between foreign and host offspring reduce brood parasite fitness. *Behavioral Ecology* 25(4):785–793. https://doi.org/10.1093/beheco/aru055
- Rivers, J. W., J. M. Johnson, S. M. Haig, C. J., Schwarz, J. W. Glendening, J. W., L. J. Burnett, D. George, and J. Grantham. 2014. Resource selection in the California Condor (*Gymnogyps californianus*) relative to terrestrial-based habitats and meteorological conditions. *PLOS ONE* 9(2):e88430. https://doi.org/10.1371/journal.pone.0088430
- Rivers, J. W., A. L. Liebl, L. B. Martin, and M. G. Betts. 2014. Corticosterone in territorial male Swainson's Thrushes varies relative to forest age but not vegetative cover. *Journal of Ornithology* 155(2):539–548. https://doi.org/10.1007/s10336-013-1037-1
- Kelly, T. R., J. Grantham, D, George, A. Welch, J. Brandt, J. L. Burnett, S. K. Sorenson, M. Johnson, R. Poppenga, D. Moen, J. Rasico, J. W. Rivers, C. Battistone, and C. K. Johnson. 2014. Spatiotemporal patterns and risk factors for lead exposure in endangered California Condors during 15 years of reintroduction. *Conservation Biology* 28(6):1721–1730. https://doi.org/10.1111/cobi.12342
- [^]Garlick, N. W., G. N. Newberry[^], and J. W. Rivers. 2014. An assessment of nestling diet composition in the Violet-green Swallow (*Tachycineta thalassina*). *Northwest Science* 88(1):49–54. https://doi.org/10.3955/046.088.0109
- Haig, S. M., J. D' Elia, J., C. Eagles-Smith, J. Fair, J. Gervais, G. Herring, J. W. Rivers, and J. H. Schulz. 2014. The persistent problem of lead poisoning in birds from ammunition and fishing tackle. *Condor* 116(3):408–428. https://doi.org/10.1650/CONDOR-14-36.1
- Rivers, J. W., M. A. Blundell[^], T. M. Loughin, B. D. Peer, and S. I. Rothstein. 2013. The exaggerated begging behavior of an obligate avian brood parasite is shared with a nonparasitic close relative. *Animal Behaviour* 86(3):529–536. https://doi.org/10.1016/j.anbehav.2013.06.004
- Peer, B. D., J. W. Rivers, and S. I. Rothstein. 2013. The Brown-headed Cowbird: North America's avian brood parasite. *Chinese Birds* 4(1):93–98. doi 10.5122/cbirds.2013.0006
- Peer, B. D., J. W. Rivers, and S. I. Rothstein. 2013. Cowbirds, conservation, and coevolution: potential misconceptions and directions for future research. *Chinese Birds* 4(1):15–30. doi 10.5122/cbirds.2013.0009
- Rivers, J. W., A. L. Liebl, J. C. Owen, L. B. Martin, and M. G. Betts. 2012. Baseline corticosterone is positively related to juvenile survival in a migrant passerine bird. Functional Ecology 26(5):1127–1134. https://doi.org/10.1111/j.1365-2435.2012.02025.x

- Rivers, J. W., S. Young, E. G. Gonzalez, B. Horton, J. Lock, and R. C. Fleischer. 2012. High levels of relatedness between Brown-headed Cowbird (*Molothrus ater*) nestmates in a heavily-parasitized host community. *Auk* 129(4):623–631. https://doi.org/10.1525/auk.2012.11236
- Jaeckle, W. B., M. Kiefer, B. Childs, R. G. Harper, J. W. Rivers, and B. D. Peer. 2012. Comparison of eggshell porosity and estimated gas flux between the brown-headed cowbird and two common hosts. *Journal of Avian Biology* 43(6):486–490. https://doi.org/10.1111/j.1600-048X.2012.05705.x
- Rivers, J. W., L. B. Martin, A. L. Liebl, and M. G. Betts. 2011. Parental alarm calls of the White-crowned Sparrow fail to stimulate corticosterone production of their nest-bound offspring. *Ethology* 117(5):374–384. https://doi.org/10.1111/j.1439-0310.2011.01883.x
- Rivers, J. W., and D. A. Rintoul. 2011. Fatty acid composition of depot fat of shorebirds collected at mid-continental stopover sites during spring migration. *Journal of Field Ornithology* 82(2):225–231. https://doi.org/10.1111/j.1557-9263.2011.00325.x
- Lupold, S., J. Wistuba, O. S. Damm, J. W. Rivers, and T. R. Birkhead. 2011. Sperm competition leads to functional adaptations in avian testes to maximize sperm quantity and quality. *Reproduction* 141(5):595–605. https://doi.org/10.1530/REP-10-0501
- Mora, M. A., B. Brattin, C. Baxter, and J. W. Rivers. 2011. Regional and interspecific variation in Sr, Ca, and Sr/Ca ratios in avian eggshells from the USA. *Ecotoxicology* 20(6):1467–1475. https://doi.org/10.1007/s10646-011-0703-4
- Rivers, J. W., J. V. Briskie, and S. I. Rothstein. 2010. Have brood parasitic cowbird nestlings caused the evolution of more intense begging by host nestlings? *Animal Behaviour* 80(3):e1–e5. https://doi.org/10.1016/j.anbehav.2010.02.016
- Rivers, J. W., W. E. Jensen, K. L. Kosciuch, and S. I. Rothstein. 2010. Community-level patterns of host use by the Brown-headed Cowbird, a generalist brood parasite. *Auk* 127(2):263–273. https://doi.org/10.1525/auk.2009.09053
- Rivers, J. W., P. S. Gipson, D. P. Althoff, and J. S. Pontius. 2010. Long-term community dynamics of small landbirds with and without exposure to extensive disturbance from military training activities. *Environmental Management* 45(2):203–216. https://doi.org/10.1007/s00267-009-9421-6
- Rivers, J. W., T. M. Loughin, and S. I. Rothstein. 2010. Brown-headed cowbird nestlings influence nestmate begging, but not parental feeding, in hosts of three distinct sizes. Animal Behaviour 79(1):107–116. https://doi.org/10.1016/j.anbehav.2009.10.009

- Betts, M. G., J. C. Hagar, J. W. Rivers, J. D. Alexander, K. McGarigal, and B. C. McComb. 2010. Thresholds in forest bird occurrence as a function of the amount of early seral broadleaf forest at landscape scales. *Ecological Applications* 20(8):2116–2130. https://doi.org/10.1890/09-1305.1
- Rivers, J. W. 2009. Parent-absent begging in the Brown-headed Cowbird (*Molothrus ater*): the role of short-term need and nestmate size. *Behavioral Ecology and Sociobiology* 63(5):707–717. https://doi.org/10.1007/s00265-008-0704-3
- Lupold, S., G. M. Linz, J. W. Rivers, D. F. Westneat, and T. R. Birkhead. 2009. Sperm competition selects beyond relative testes size in birds. *Evolution* 63(2):391–402. https://doi.org/10.1111/j.1558-5646.2008.00571.x
- Kosciuch, K. L., J. W. Rivers, and B. K. Sandercock. 2008. Stable isotopes identify the natal origins of a generalist brood parasite, the Brown-headed Cowbird *Molothrus ater*. *Journal of Avian Biology* 39(3):364–367. https://doi.org/10.1111/j.0908-8857.2008.04170.x
- Rivers, J. W. 2007. Nest mate size, but not short-term need, influences the begging behavior of a generalist brood parasite. *Behavioral Ecology* 18(1):222–230. https://doi.org/10.1093/beheco/arl068
- Rivers, J. W., and M. J. Kuehn. 2006. Predation of eared grebe by Great Blue Heron. *Wilson Journal of Ornithology* 118(1):112–113. https://doi.org/10.1676/05-002.1
- Althoff, D. P., J. W. Rivers, J. S. Pontius, P. S. Gipson and P. B. Woodford. 2005. A comprehensive approach to identifying monitoring priorities of small landbirds on military installations. *Environmental Management* 34(6):887–902. https://doi.org/10.1007/s00267-004-0023-z
- Peer, B. D, S. I. Rothstein, and J. W. Rivers. 2005. First record of Bronzed Cowbird parasitism on the Great-tailed Grackle. *Wilson Bulletin* 117(2):194–196. https://doi.org/10.1676/04-077
- Rivers, J. W., and B. K. Sandercock. 2004. Predation by Gray Catbird on Brown Thrasher eggs. *The Southwestern Naturalist* 49(1):101–103. <u>https://www.jstor.org/stable/3672276</u>
- Rivers, J. W., and J. V. Briskie. 2003. Lack of sperm production and sperm storage by arcticnesting shorebirds during spring migration. *Ibis* 145(1):61–66. https://doi.org/10.1046/j.1474-919X.2003.00121.x
- Rivers, J. W., D. P. Althoff, P. S. Gipson, and J. S. Pontius. 2003. Evaluation of a reproductive index to estimate Dickcissel reproductive success. *Journal of Wildlife Management* 67(1):136–144. https://doi.org/10.2307/3803069

- Rivers, J. W., and T. T. Cable. 2003. Evaluation of farmed playa wetlands as avian habitat using survey data and two rapid assessment techniques. *Transactions of the Kansas Academy of Science* 106(3/4):155–165. https://doi.org/10.1660/0022-8443(2003)106[0155:EOFPWA]2.0.CO;2
- Rivers, J. W., T. T. Cable, and J. S. Pontius. 2003. Influence of nest concealment and distance to habitat edge on depredation rates of simulated bird nests in southeast Kansas. *Transactions of the Kansas Academy of Science* 106(1/2):40–47. https://www.jstor.org/stable/3628378
- Rivers, J. W. 2000. Northern Harrier predation of White-faced Ibis. *Wilson Bulletin* 112(3):416–417. https://doi.org/10.1676/0043-5643(2000)112[0416:NHPOWF]2.0.CO;2
- Rivers, J. W., and D. E. Kroodsma. 2000. Singing behavior of the Hermit Thrush. *Journal of Field Ornithology* 71(3):467–471. https://doi.org/10.1648/0273-8570-71.3.467

MANUSCRIPTS IN REVIEW

- ^Parvin, L. K., I. A. Padgett^, N. P. Anderson, O. Ostroverkhova, and J. W. Rivers. Floral-devoid perennial grass seed fields harbor a diversity of native bees. *Journal of the Kansas Entomological Society*.
- §Garcia-Heras, M.S., C. Wolf, J. Bailey Guerrero⁺, L. J. Adrean⁺, S. K. Nelson, D. D. Roby, M. G. Betts, and J. W. Rivers. Marine habitat use and movement in response to ocean warming by a threatened forest-nesting seabird. *Global Ecology and Conservation*.
- Perry, L. R., R. K. Kelble, V. N. Brewer, C. E. Christensen, M. E. Kerstens*, T. M. Owens, M. A. Sampognaro*, D. L. Zahor, R. A. Zitomer*, S. H. Austin, J. M. Cornelius, J. B. Dinkins, S. J. K. Frey, C. E. Frisinger*, S. M. LeQuier, C. G. Lundblad, J. Oskowski, H. R. Perlman^, W. J. Price, R. Rich, K. A. Ruth, V. M. Schroeder, S. B. Szabo, and J. W. Rivers. Ten simple rules for implementing a wildly successful field season. *PLOS Computational Biology*.

PEER-REFEREED BOOK CHAPTERS

Peer, B. D., J. W. Rivers, L. Merrill, S. K. Robinson, and S. I. Rothstein. 2018. The Brownheaded Cowbird: a model species for testing novel research questions in animal ecology, evolution and behavior. Pp. 161–187 in *Avian brood parasitism: behavior, ecology, evolution, and coevolution* (M. Soler, editor). Springer.

TECHNICAL AND NON-REFEREED PUBLICATIONS

Best, L. R., J. B. Dunlap, A. S. Jackson, and J. W. Rivers. 2023. Bees of the Pacific Northwest: key to genera (Hymenoptera: Anthophila). Version 1, October 2023. Fish and Wildlife

- Habitat in Managed Forests Research Program, Oregon State University, Corvallis, Oregon. https://doi.org/10.5399/osu/1166.
- Best, L. R., J. B. Dunlap, A. S. Jackson, J. W. Rivers, and P. H. Williams. 2023. Bees of the Pacific Northwest: Key to bumble bee species for females (Hymenoptera: Apidae: *Bombus*). Version 1, October 2023. Fish and Wildlife Habitat in Managed Forests Research Program, Oregon State University, Corvallis, Oregon. https://doi.org/10.5399/osu/1164.
- Best, L. R., A. S. Jackson, J. W. Rivers, and P. H. Williams. 2023. Bees of the Pacific Northwest: key to bumble bee species for males (Hymenoptera: Apidae: *Bombus*). Version 1, October 2023. Fish and Wildlife Habitat in Managed Forests Research Program, Oregon State University, Corvallis, Oregon. https://doi.org/10.5399/osu/1165.
- Rivers, J. W. 2002. Book review of *The Red-cockaded Woodpecker: surviving in a fire-dominated ecosystem*. Wildlife Society Bulletin 30(2):653–654.
- Rivers, J. W., and C. D. Lee. 2001. Biological attributes and economic costs of farmed wetlands in Kansas. Kansas State University Agricultural Experiment Station and Cooperative Extension Service.
- Rivers, J. W., T. T. Cable, and C. D. Lee. 2001. Seasonal avian use of farmed Kansas wetlands. Kansas State University Agricultural Experiment Station and Cooperative Extension Service, Report No. 863.
- Cable, T. T., J. A. Fox, and J. W. Rivers. 1999. Attitudes of Kansas agricultural producers about riparian areas, wildlife conservation, and endangered species. Kansas State University Agriculture Experiment Station and Cooperative Extension Service, Report No. 830.
- Rivers, J. W. 1998. Unusually high rate of barn owl roadkills in Kansas. *Kansas Ornithological Society Bulletin* 49:43–44.
- Goheen, J. R., J. W. Rivers, and J. Brunson. 1998. The Conservation and Reinvestment Act and natural resource professionals: an example of the starving man syndrome. *Wildlife Society Bulletin* 26:649–650.
- Rivers, J. W. 1997. Options for undergraduates. Wildlife Society Bulletin 25:202–203.

COMPETITIVE RESEARCH GRANTS

Rivers, J. W., and J. Dinkins. 2024-2026. Assessing the impact of invasive annual grasses and wildfire on native pollinators within the sagebrush steppe biome. *Cross-Regional Science Acquisition Framework and Process for the Sagebrush Biome, U.S. Fish and Wildlife Service*. Amount: \$312,817.

- Ponisio, L., J. W. Rivers, L. Grand, and K. Moriarty. 2023-2028. Examining the potential of floral enhancements in harvested forests to promote bee populations. *National Institute of Food and Agriculture, Agriculture and Food Research Initiative, U.S. Department of Agriculture*. Amount: \$749,998.
- Rivers, J. W., and J. Johnston. 2023-2026. Evaluating insect pollinator response to dry forest fuel-reduction treatments. *Fish and Wildlife Habitat in Managed Forests Research Program, College of Forestry, Oregon State University*. Amount: \$183,162.
- Krawchuk, M., M. Betts, M. Swanson, J. W. Rivers, and J. Verschuyl. 2023-2024. Synthesis and application of research on the biodiversity of early seral forests. *Fish and Wildlife Habitat in Managed Forests Research Program, College of Forestry, Oregon State University*. Amount: \$137,164.
- Rivers, J. W., K. Moriarty, and J. Verschuyl. 2022-2025. Evaluating the response of native pollinators to fuel-reduction treatments in managed conifer forests. *California Board of Forestry and Fire Protection*. Amount: \$448,510.
- Rivers, J. W. 2021-2023. An experimental evaluation of simulated climate change on population vital rates of a managed pollinator. *Agricultural Research Foundation, Oregon State University*. Amount: \$15,000.
- Rivers, J. W. 2019-2020. Assessing the ecological value of snags created intentionally as wildlife habitat. *USDI Bureau of Land Management*. Amount: \$100,000.
- Rivers, J. W. 2019-2022. Development of native bee identification keys for the Pacific Northwest. Fish and Wildlife Habitat in Managed Forests Research Program, College of Forestry, Oregon State University. Amount: \$125,405.
- Hovland, M., J. Dinkins, J. W. Rivers, and N. Sanchez. 2018-2022. Using applied science to identify best practices in sagebrush ecosystems. *USDI Bureau of Land Management*. Amount: \$98,992.
- Krawchuk, M., M. G. Betts, J. W. Rivers, A.J. Kroll, J. Verschuyl, and M. Swanson. 2018-2021. Biodiversity in natural and managed early seral forests of Southern Oregon. *Fish and Wildlife Habitat in Managed Forests Research Program, College of Forestry, Oregon State University*. Amount: \$148,625.
- Rivers, J. W., M. G. Betts, S. M. Galbraith, U. Kormann, A. R. Moldenke, C. W. Epps, S. Kincaid, and R. Progar. 2018-2020. The role of managed forests in promoting pollinator biodiversity, health, and pollination services to wild plants and agricultural crops. *National Institute of Food and Agriculture, Agriculture and Food Research Initiative, U.S. Department of Agriculture.* Amount: \$1,000,000.

- Rivers, J. W., and J. Verschuyl. 2018-2020. Black-backed Woodpecker vital rates in unburned and burned forest within a fire-prone landscape. *Fish and Wildlife Habitat in Managed Forests Research Program, College of Forestry, Oregon State University*. Amount: \$95,217.
- Rivers, J. W. 2016-2018. Assessing pollinator response to natural and anthropogenic disturbances in mixed-conifer forests. *USDI Bureau of Land Management*. Amount: \$320,000.
- Rivers, J. W., and J. H. Cane. 2016-2018. Assessing pollinator response to natural and anthropogenic disturbances in mixed-conifer forests. Fish and Wildlife Habitat in Managed Forests Research Program, College of Forestry, Oregon State University. Amount: \$99,712.
- Rivers, J. W., and J. C. Hagar. 2015-2017. Revisiting the CFIRP: Assessing long-term ecological value and characteristics of snags created for wildlife. *Fish and Wildlife Habitat in Managed Forests Research Program, College of Forestry, Oregon State University*. Amount: \$57,818.
- Betts, M. G., J. P. Verschuyl, J. W. Rivers, D. Maguire, D. Mainwaring, J. Hatten, P. Phalan, T. Stokely, S. Fitzgerald, G. S. Latta, and M. Needham. 2015-2017. Quantifying trade-offs and synergies between ecosystem services in intensively managed forests. *Institute for Working Forest Landscapes, College of Forestry, Oregon State University*. Amount: \$249,930.
- Betts, M. G., J. A. Hatten, J. W. Rivers, J. P. Verschuyl, C. A. Montgomery, and G. S. Latta. 2015-2017. Quantifying tradeoffs and synergies between ecosystem services and intensive forest management. *Agriculture and Food Research Initiative, U.S. Department of Agriculture*. Amount: \$499,145.
- Betts, M. G., and J. W. Rivers. 2014-2016. Assessing the demographic response of early seral songbird species to intensive forest management. *Fish and Wildlife Habitat in Managed Forests Research Program, College of Forestry, Oregon State University*. Amount: \$76,933.
- Rivers, J. W., and M. G. Betts. 2013. Assessing the consequences of herbicide use on animal pollinators in early seral forests. *College of Forestry, Oregon State University*. Amount: \$25,000.
- Rivers, J. W., and M. G. Betts. 2013. Quantifying the consequences of herbicides on animal pollinators in regenerating forest habitats of western Oregon. *Katherine Bisbee II Conservation Fund, Oregon Community Foundation*. Amount: \$2,442.
- McComb, B. C., J. W. Rivers, and D. R. Ardia. 2011-2012. How costly are coping styles? Using heart rate telemetry to quantify energetic costs mounted in response to environmental

- stressors in wild songbirds. *Oregon State University General Research Fund*. Amount: \$10,000.
- Rivers, J. W. 2011. Measuring the physiological response of cavity-nesting songbirds to environmental stressors using heart-rate telemetry. *North American Bluebird Society*. Amount: \$2,500 (+\$500 additional from *New York State Bluebird Society*).
- Betts, M. G., D. Wilson, J. W. Rivers, S. Fitzgerald, D. Maguire, R. Rose, and J. Johnson. 2009-2011. Quantifying trade-offs between biodiversity conservation and timber production in intensively managed forests. *Agriculture and Food Research Initiative, U.S. Department of Agriculture*. Amount: \$497,677.

NON-COMPETITIVE RESEARCH GRANTS

- Rivers, J. W., and M. E. Kerstens. 2023. Quantifying Black-backed Woodpecker natal dispersal in south-central Oregon. *Klamath Basin Audubon Society*. Amount: \$2,496.
- Rivers, J. W. 2022. Assessing potential food resources of the Black-backed Woodpecker in green forests. *Oregon Department of Forestry*. Amount: \$5,000.
- Rivers, J. W. and M. E. Kerstens 2022. Quantifying food availability of breeding Black-backed Woodpeckers. *East Cascades Audubon Society*. Amount: \$2,500.
- Rivers, J. W., M. G. Betts, S. K. Nelson, and D. D. Roby. 2021-2022. Predictors of space use and reproductive success in the Marbled Murrelet Phase IV funding. Joint Natural Resources Committee on Ways and Means, Oregon State Legislature. Appropriation to Forest Research Laboratory, College of Forestry, Oregon State University. Amount: \$3,048,950.
- Betts, M. G., and J. W. Rivers. 2020-2025. Automatic acoustic classification of Marbled Murrelets and forest songbirds using deep learning. USDA Forest Service, Pacific Northwest Research Station. Amount: \$189,955.
- Rivers, J. W., M. G. Betts, S. K. Nelson, and D. D. Roby. 2019-2020. Predictors of space use and reproductive success in the Marbled Murrelet Phase III funding. Joint Natural Resources Committee on Ways and Means, Oregon State Legislature. Appropriation to Forest Research Laboratory, College of Forestry, Oregon State University. Amount: \$3,048,950.
- Rivers, J. W. 2019. Forest pollinator workshop. USDA Forest Service. Amount: \$1,500.
- Rivers, J. W. 2019. A workshop for developing a standardized sampling protocol for forest pollinators. *Oregon Department of Forestry*. Amount: \$2,520.

- Rivers, J. W. 2018-2023. Black-backed Woodpecker demographic rates in an understudied habitat: unburned conifer forest. *National Council for Air and Stream Improvement*. Amount: \$135,000.
- Rivers, J. W. 2018-2019. Black-backed Woodpecker nest surveys within a fire-prone landscape. *Oregon Department of Forestry*. Amount: \$59,998.
- Rivers, J. W., M. G. Betts, S. K. Nelson, and D. D. Roby. 2017-2018. Predictors of space use and reproductive success in the Marbled Murrelet Phase II funding. Joint Natural Resources Committee on Ways and Means, Oregon State Legislature. Appropriation to Forest Research Laboratory, College of Forestry, Oregon State University. Amount: \$2,890,000.
- Krawchuk, M., M. G. Betts, M. Swanson, and J. W. Rivers. 2017-2018. Biodiversity in natural and managed early seral forests of southern Oregon. *National Council for Air and Stream Improvement*. Amount: \$20,000.
- Rivers, J. W. 2016-2018. Assessing pollinator response to natural and anthropogenic disturbances in mixed-conifer forests. *Mealey/Boise Cascade/Boone and Crockett/Noble Endowment Fund, College of Forestry, Oregon State University*. Amount: \$100,000.
- Betts, M. G., and J. W. Rivers. 2016. Intensive Forest Management Study: early seral bird demography and database management. *National Council for Air and Stream Improvement*. Amount: \$33,630.
- Rivers, J. W., M. G. Betts, S. K. Nelson, and D. D. Roby. 2015-2016. Predictors of space use and reproductive success in the Marbled Murrelet Phase I funding. Joint Natural Resources Committee on Ways and Means, Oregon State Legislature. Appropriation to Forest Research Laboratory, College of Forestry, Oregon State University. Amount: \$2,890,000.
- Rivers, J. W. 2015-2016. Assessing long-term ecological value and characteristics of snags created for wildlife. *College Forests, Oregon State University*. Amount: \$5,000.
- Rivers, J. W. 2015-2016. Wildlife surveys in forest ecosystems. *U.S. Geological Survey Cooperative Project Award*. Amount: \$18,994.
- Rivers, J. W., and M. G. Betts. 2014. Assessing the impact of intensively management practices on songbird demography in the Pacific Northwest. *National Council for Air and Stream Improvement*. Amount: \$68,040.
- Betts, M. G., and J. W. Rivers. 2014. Quantifying intensive management impacts on songbird demography in the Pacific Northwest. *National Council for Air and Stream Improvement*. Amount: \$35,000.

Betts, M. G., and J. W. Rivers. 2013. Assessing the impact of intensively managed plantations on bird demography and in the Pacific Northwest. *National Council for Air and Stream Improvement*. Amount: \$30,000.

INVITED ORAL PRESENTATIONS AT SCIENTIFIC CONFERENCES

- ^Undergraduate student, *graduate student, *post-doctoral trainee, or *research associate under Rivers' direction or advisement.
 - Rivers, J. W., S. Galbraith[§], and J. Cane. Wildfire severity influences offspring sex ratio in a solitary bee. Presentation at the 10th International Fire Ecology and Fire Management Congress, Monterey, CA. December 6, 2023.
 - *Kerstens, M. E., and J. W. Rivers. Importance of green unburned forest for fire-associated birds in the megafire era. Presentation at the annual meeting of the American Ornithological Society, London, Ontario, Canada. August 11, 2023.
 - Rivers, J. W., L. J. Adrean⁺, J. A. Bailey Guerrero⁺, J. Dachenhaus⁺, J. L. Fisher, C. Frisinger[#], M.-S. Garcia Heras[§], B. D. Gerber, C. B. Meyer, S. K. Nelson, J. M. Northrup, D. D. Roby, J. Valente[§], C. Wolf, E. Woodis[#], Z. Yang, and M. G. Betts. Influence of a warming ocean on the breeding activity of a most unusual and threatened forest-nesting bird. Presentation at the annual meeting of the American Ornithological Society, London, Ontario, Canada. August 11, 2023.
 - §Valente, J. J., J. W. Rivers, Z. Yang, S. K. Nelson, J. M. Northrup, D. D. Roby, C. B. Meyer, and M. G. Betts. Ongoing forest fragmentation negatively affects the distribution of an endangered forest-breeding bird. Presentation at the annual meeting of the American Ornithological Society, London, Ontario, Canada. August 11, 2023.
 - Rivers, J. W., R. A. Zitomer*, S. M. Galbraith§, M. G. Betts, A. R. Moldenke, and R. A. Progar. Intensively managed timber plantations provide ephemeral habitat for native bees. Presentation at the annual Western Forest Insect Work Conference, Seattle, WA. April 25, 2023.
 - Rivers, J. W., S. Galbraith[§], and J. Cane. Demographic response of native bees to wildfire. Presentation at the annual meeting of the Oregon chapter of The Wildlife Society, Bend, OR. February 23, 2023.
 - Dinkins, J., M. Hovland, J. W. Rivers, and F. Brummer. Insects, forbs, and cover for Greater Sage-grouse across an annual grass invasion gradient. Presentation at the annual meeting of the Oregon chapter of The Wildlife Society, Bend, OR. February 23, 2023.
 - Hovland, M., J. Dinkins, K. Yates, and J. W. Rivers. Pollinator pertinent protocols: the importance of AIM data in predicting pollinator community structure. Presentation at the

- annual meeting of the Oregon chapter of The Wildlife Society, Bend, OR. February 23, 2023.
- *Zitomer, R., S. M. Galbraith[§], M. G. Betts, A. R. Moldenke, R. A. Progar, and J. W. Rivers. Pollinator dynamics within intensively managed early seral conifer forests: bee community diversity is driven by time since harvest in Douglas-fire. Presentation at the joint meeting of the Entomological Society of America, Entomological Society of Canada, and the Entomological Society of British Columbia. Vancouver, British Columbia, Canada. November 13, 2022.
- Ponisio, L., H. Cohen, S. M. Galbraith[§], J. Zorn, and J. W. Rivers. Bee community response to forest management mediates bee health outcomes. Presentation at the joint meeting of the Entomological Society of America, Entomological Society of Canada, and the Entomological Society of British Columbia. Vancouver, British Columbia, Canada. November 13, 2022.
- Rivers, J. W., S. M. Galbraith[§], and J. H. Cane. Blue orchard bee response to wildfire. Presentation at the annual meeting of the Orchard Bee Association <virtual>. September 30, 2022.
- *Kerstens, M. E., and J. W. Rivers. Is green the new black? No difference in Black-backed Woodpecker (*Picoides arcticus*) vital rates between unburned and burned forests in a pyrodiverse landscape. Presentation at the annual West Coast Regional Meeting of The National Council for Air and Stream Improvement, Inc., Vancouver, WA. September 28, 2022.
- *Zitomer, R., S. Galbraith[§], and J. W. Rivers. Forest age and floral resource availability drive native bee abundance and diversity in intensively managed forests of the Oregon Coast Range. Presentation at the annual meeting of the Northwest Scientific Association <virtual>. March 16, 2022.
- Ponisio, L., H. Cohen, S. M. Galbraith[§], and J. W. Rivers. 2021. *Osmia lignaria* parasitism and reproduction in clearcuts. Presentation at the annual meeting of the Orchard Bee Association, Corvallis, OR. December 10, 2021.
- *Zitomer, R., and J. W. Rivers. Space use of critical native pollinators: do intensively managed forest provide habitat connectivity? Presentation at the National Council for Air and Stream Improvement Pollinator Summit <virtual>. January 19, 2021.
- Rivers, J. W. Evaluating the suitability of managed forest landscapes for pollinators.

 Presentation at the National Council for Air and Stream Improvement Pollinator Summit <virtual>. January 19, 2021.

- Rivers, J. W. Evaluating pollinator health in intensively managed conifer forests. Presentation at the annual meeting of the Oregon Forest Health Conference, Corvallis, OR. February 26, 2020.
- Rivers, J. W., S. M. Galbraith[§], R. Progar, A. R. Moldenke, and M. G. Betts. Assessing the value of intensively managed conifer forests for supporting pollinator populations. Presentation at the annual meeting of the Oregon chapter of The Wildlife Society, Eugene, OR. February 6, 2020.
- §Galbraith, S. M., M. G. Betts, R. Progar, A. R. Moldenke, and J. W. Rivers. The influence of forest management on pollinator communities in the Oregon Coast Range. Presentation at the annual meeting of the Entomological Society of America, St. Louis, MO. November 19, 2019.
- Rivers, J. W. An overview and introduction to the forage fish workshop. Presentation at the Forage Fish Workshop: Connecting the Land and Sea, Newport, OR. October 10, 2019.
- Rivers, J. W. A review of pollinator research needs in managed forests of the Pacific Northwest. Presentation at the Forest Pollinator Sampling Workshop, High Desert Museum, Bend, OR. September 26, 2019
- Rivers, J. W. An overview and introduction to the forest pollinator sampling workshop. Presentation at the Forest Pollinator Sampling Workshop, High Desert Museum, Bend, OR. September 26, 2019.
- §Garcia-Heras, M.-S., L. J. Adrean⁺, S. K. Nelson, D. D. Roby, M. G. Betts, and J. W. Rivers. Breeding season movements and marine habitat use by the Marbled Murrelet (*Brachyramphus marmoratus*) in Oregon. Presentation at the annual meeting of the American Ornithological Society, Anchorage, Alaska. June 28, 2019.
- Rivers, J. W., L. J. Adrean⁺, S. K. Nelson, M.-S. Garcia-Heras[§], D. D. Roby, and M. G. Betts. Factors associated with Marbled Murrelet (*Brachyramphus marmoratus*) nesting success in western Oregon. Presentation at the annual meeting of the American Ornithological Society, Anchorage, Alaska. June 28, 2019.
- Rivers, J. W. Seeing the (early seral) forest for the bees: research needs for pollinators in managed forests of the Pacific Northwest. Presentation at Early Seral Biodiversity Science & Management Workshop, Oregon State University, Corvallis, OR. June 10, 2019.
- Rivers, J. W. Can trees be the bee's knees? Opportunities for pollinator research in managed forests of the Pacific Northwest. Presentation at Pacific Northwest Pollinator Summit and Conference, Oregon State University, Corvallis, OR. February 14, 2019.

- Rivers, J. W., C. L. Mathis[^], A. R. Moldenke, and M. G. Betts. Experimental removal of timber harvest residue enhances wild bee diversity within managed conifer forests. Presentation at the joint meeting of the Entomological Society of America, Entomological Society of Canada, and the Entomological Society of British Columbia. Vancouver, British Columbia, Canada. November 13, 2018.
- Buhl, C., J. W. Rivers, S. M. Galbraith[§], J. H. Cane, C. B. Schultz, M. D. Ulyshen, and U. G. Kormann. Research needs and habitat enhancement measures for pollinators in managed conifer forests. Presentation at the joint meeting of the Entomological Society of America, Entomological Society of Canada, and the Entomological Society of British Columbia. Vancouver, British Columbia, Canada. November 13, 2018.
- §Galbraith, S. M., J. H. Cane, and J. W. Rivers. Wild bee reproductive output and sex ratio is influenced by wildfire severity in mixed conifer forest. Presentation at the joint meeting of the Entomological Society of America, Entomological Society of Canada, and the Entomological Society of British Columbia. Vancouver, British Columbia, Canada. November 13, 2018.
- Rivers, J. W. Seeing the forest for the bees: pollinator health research in managed conifer forests of the Pacific Northwest. Presentation at the annual National Convention for the Society of American Foresters, Portland, OR. October 4, 2018.
- Harris, S., U. Kormann, T. Stokely, A. Kroll, J. Verschuyl, D. Mainwaring, J. W. Rivers, and M. Betts. Stand-level tradeoffs between timber production, biodiversity, and pollination services. Presentation at the annual National Convention for the Society of American Foresters, Portland, OR. October 4, 2018.
- Rivers, J. W. Can trees be the bee's knees? The emergence of pollinator research in managed conifer forests. Presentation at the annual meeting of the Oregon Forest Health Conference, Corvallis, OR. February 28, 2018.
- §Galbraith, S. M., J. H. Cane, A. R. Moldenke, and J. W. Rivers. Bee diversity is linked to wildfire severity in Oregon mixed conifer forest. Presentation at the annual meeting of the Oregon Forest Health Conference, Corvallis, OR. February 28, 2018.
- Rivers, J. W., J. Verschuyl, C. J. Schwarz, A. J. Kroll, and M. G. Betts. Dynamic demographic response to experimental forest herbicide treatments by an early successional songbird. Presentation at the annual meeting of the Oregon Chapter of The Wildlife Society, Portland, OR. February 14, 2018.
- Kormann, U., T. Stokely, A. J. Kroll, J. Verschuyl, S. Harris, D. Mainwaring, J. W. Rivers, and M. G. Betts. Stand-level tradeoffs between timber production, biodiversity, and ecosystem functions in the Oregon Coast Range. Presentation at the annual meeting of the Oregon Chapter of The Wildlife Society, Portland, OR. February 14, 2018.

- *Barry, A. M., J. C. Hagar, and J. W. Rivers. If you build it, who will come? Assessing use of created snags by cavity-nesting birds across 25 years. Presentation at the annual meeting of the American Ornithological Society, East Lansing, MI. August 4, 2017.
- §Galbraith, S. M., J. H. Cane, and J. W. Rivers. The influence of wildfire burn severity and postfire management on bee community composition in mixed-conifer forest. Presentation at the annual meeting of the Pacific Branch of the Entomological Society of America, Portland, OR. April 3, 2017.
- Rivers, J. W., C. L. Mathis[^], A. R. Moldenke, and M. G. Betts. Assessing the effects of post-harvest biomass removal on early-successional forest bee communities. Presentation at Pollinators in Managed Forest Landscapes Workshop, Oregon State University, Corvallis, OR. March 30, 2017.
- §Galbraith, S. M., J. H. Cane, and J. W. Rivers. The influence of wildfire severity and post-fire management on pollinator communities in mixed-conifer forest. Presentation at Pollinators in Managed Forest Landscapes Workshop, Oregon State University, Corvallis, OR. March 30, 2017.
- Kormann, U., J. W. Rivers, M. Scherr, and M. G. Betts. Pollinator community response to stand-level herbicide treatment. Presentation at Pollinators in Managed Forest Landscapes Workshop, Oregon State University, Corvallis, OR. March 30, 2017.
- Rivers, J. W. Evaluating the effects of intensive forest management on songbird productivity. Presentation and panel discussion at the annual meeting of the Oregon Forest and Industries Council, Sun River, OR. October 10, 2016.
- Rivers, J. W. Testing the impact of experimental herbicide treatments on breeding productivity of early-successional forest songbirds. Presentation at the annual meeting of the Pacific Northwest Reforestation Council, Vancouver, WA. October 4, 2016.
- Rivers, J. W., M. G. Betts, S. K. Nelson, and D. D. Roby. Predictors of space use and reproductive success in the Marbled Murrelet. Presentation at the annual West Coast Regional Meeting of The National Council for Air and Stream Improvement, Inc., Vancouver, WA. September 26, 2016.
- *Barry, A. M., J. C. Hagar, and J. W. Rivers. Created snag dynamics and impacts on cavitynesting bird communities over 25 years in western Oregon. Presentation at the annual West Coast Regional Meeting of The National Council for Air and Stream Improvement, Inc., Vancouver, WA. September 26, 2016.
- Rivers, J. W., J. Verschuyl, A. J. Kroll, and M. G. Betts. The influence of intensive forest management practices on breeding success of the White-crowned Sparrow, an early-seral

- songbird. Presentation at annual meeting of the Oregon Chapter of The Wildlife Society, Eugene, OR. April 30, 2015.
- Rivers, J. W., J. Verschuyl, A. J. Kroll, and M. G. Betts. Quantifying tradeoffs between biodiversity and timber production in western Oregon: an overview of the Intensive Forest Management (IFM) study. Presentation at the annual meeting of the Washington Chapter of The Wildlife Society, Grand Mound, WA. April 16, 2015.
- Rivers, J. W., J. Verschuyl, A. J. Kroll, and M. G. Betts. The influence of intensive forest management on breeding success of an early-seral songbird. Presentation at the annual meeting of the Washington Chapter of The Wildlife Society, Grand Mound, WA. April 16, 2015.
- Rivers, J. W., J. Verschuyl, A. J. Kroll, C. J. Schwarz, and M. G. Betts. 2014. Presentation at Wildlife in Managed Forests: Songbirds and Early Seral Habitats Workshop, Oregon Forests Research Institute, Albany, OR. November 18, 2014.
- Verschuyl, J., M. G. Betts, J. W. Rivers, J. Giovanini, and A. J. Kroll. Presentation at Wildlife in Managed Forests: Songbirds and Early Seral Habitats Workshop, Oregon Forests Research Institute, Albany, OR. November 18, 2014.
- Rivers, J. W., J Verschuyl, A. J. Kroll, and M. G. Betts. Quantifying the demographic consequences of intensive management practices on breeding birds in early seral plantation forests. Presentation at the annual meeting of the Oregon Chapter of The Wildlife Society, Bend, OR. February 6, 2014.
- Rivers, J. W., J Verschuyl, A. J. Kroll, and M. G. Betts. Avian demography across a gradient of management intensity in early seral plantation forests. Presentation at the annual West Coast Regional Meeting of The National Council for Air and Stream Improvement, Inc., Vancouver, WA. October 2, 2013.
- Rivers, J. W., M. A. Blundell[^], and S. I. Rothstein. Begging displays of Brown-headed Cowbird nestlings are insufficient to maximize food provisioning by a small host. Presentation at the annual meeting of the American Ornithologists' Union, Chicago, IL. August 16, 2013.
- Rothstein, S. I., B. D. Peer, J. W. Rivers, and R. C. Fleischer. New and old directions in the study of brood parasitism: from Herbert Friedman to modern phylogenetics. Presentation at the annual meeting of the American Ornithologists' Union, Chicago, IL. August 16, 2013.
- Peer, B. D., J. W. Rivers, and S. I. Rothstein. Cowbirds, conservation, and coevolution: potential misconceptions and directions for future research. Presentation at the International Symposium on Avian Brood Parasitism, Hainan, China. November 17, 2012.

- Rivers, J. W., M. Johnson, C. J. Schwarz, J. Brandt, J. Burnett, D. George, and S. M. Haig. An assessment of home range size in the California Condor across the annual cycle. Presentation at the California Condor Partner's Meeting, Portland, OR. July 2, 2012.
- Rivers, J. W., W. E Jensen, K. L. Kosciuch, and S. I. Rothstein. Community-level patterns of host use by the Brown-headed Cowbird, a generalist brood parasite. Presentation at the Australasian Ornithological Conference, Perth, Australia. December 5, 2007.
- Peer, B. D., R. G. Harper, J. W. Rivers, J. W. Frick, M. D. Benson, M. Anderson, B. Blackwell, T. Eshedagho, J. Raabe, B. Wall, and E. Wear. Implications of organochlorine contamination on brood parasite-host coevolution. Presentation at the Australasian Ornithological Conference, Perth, Australia. December 5, 2007.
- Rivers, J. W. The influence of nestmate size on begging behavior in Brown-headed Cowbirds. Presentation at the annual meeting of the American Ornithologists' Union, Quebec City, Quebec, Canada. August 20, 2004.

CONTRIBUTED ORAL PRESENTATIONS AT SCIENTIFIC CONFERENCES

- ^Undergraduate student, *graduate student, *post-doctoral trainee, or *research associate under Rivers' direction or advisement.
 - Frank, G., L. Best, J. W. Rivers, and M. Krawchuk. Assessing the extent to which industrial timber harvest emulates wildfire in supporting wild bee populations. Presentation at the annual meeting of the Ecological Society of America, Portland, Oregon. August 10, 2023.
 - *Zitomer, R., S. M. Galbraith[§], M. G. Betts, A. R. Moldenke, R. A. Progar, and J. W. Rivers. Wild bee diversity declines rapidly with time since harvest in intensively managed Douglas-fir plantations. Presentation at the 2023 Science of the Service Conference of the U.S. Fish and Wildlife Service <virtual>. May 3, 2023.
 - *Kerstens, M. E., and J. W. Rivers. Is lodgepole pine a goldilocks tree? Landscape scale drivers of Black-backed Woodpecker habitat use in green forest. Presentation at the annual meeting of the Western Forestry Graduate Research Symposium, Corvallis, OR. April 14, 2023.
 - *Woodis, E. W., M. G. Betts, and J. W. Rivers. Nest habitat assessment of Marbled Murrelets (*Brachyramphus marmoratus*). Presentation at the annual meeting of the Western Forestry Graduate Research Symposium, Corvallis, OR. April 14, 2023.
 - Frank, G., M. Betts, A. J. Kroll, J. W. Rivers, M. Swanson, J. Verschuyl, and M. Krawchuk. Does complexity matter for biodiversity of early seral forests? Responses of bird and carabid beetle communities to fire- and harvest-generated stands in southwest Oregon.

 Presentation at the joint meeting of the Northwest Scientific Association, Pacific Division

- of the American Associations for the Advancement of Science, and Northwest Lichenologists, Bellingham, WA. March 22, 2023.
- *Kerstens, M. and J. W. Rivers. Breeding in an unexpected place: drivers of Black-backed Woodpecker green forest habitat use. Presentation at the annual meeting of the Oregon chapter of The Wildlife Society, Bend, OR. February 23, 2023.
- *Zitomer, R., S. M. Galbraith[§], M. G. Betts, A. R. Moldenke, R. A. Progar, and J. W. Rivers. Intensively managed conifer forest provides ephemeral habitat for wild bee communities. Presentation at the annual meeting of the Oregon chapter of The Wildlife Society, Bend, OR. February 23, 2023.
- Ponisio, L., H. Cohen, S. Galbraith[§], J. Zorn, R. Zitomer[#], and J. W. Rivers. Beyond timber: forest management can support healthy bee populations. Presentation at the annual meeting of the Oregon chapter of The Wildlife Society, Bend, OR. February 23, 2023.
- §Valente, J. J., J. W. Rivers, Z. Yang, S. K. Nelson, J. M. Northrup, D. D. Roby, C. B. Meyer, and J. G. Betts. Negative effects of ongoing habitat fragmentation on Marbled Murrelets are amplified near its range edge. Presentation at the annual meeting of the Pacific Seabirds Group, San Diego, CA. February 17, 2023.
- *Kerstens, M. and J. W. Rivers. 2022. Black-backed Woodpecker vital rates do not differ between unburned and burned forests within a pyrodiverse landscape. Presentation at the annual meeting of The Wildlife Society, Spokane, WA. November 10, 2022.
- Michlanski, M. J. Sanders, J. W. Rivers, K. Yates, and B. Beechler. 2022. Consequences of parasitism in a threatened population of marbled murrelets on the Oregon Coast. Presentation at the annual Boehringer Ingelheim National Veterinary Scholars Symposium, St. Paul, MN. August 5, 2022.
- [§]Valente, J. J., S. K. Nelson, J. Dachenhaus⁺, E. Woodis⁺, J. A. Bailey Guerrero⁺, D. D. Roby, M. G. Betts, and J. W. Rivers. Estimating the detectability of breeding behaviors at known Marbled Murrelet (*Brachyramphus marmoratus*) nest sites. Presentation at the annual meeting of the Pacific Seabirds Group <virtual>. February 25, 2022.
- *Woodis, E. W., J. J. Valente[§], S. K. Nelson, D. D. Roby, M. G. Betts, J. C. Dachenhaus⁺, J. A. Bailey Guerrero⁺, and J. W. Rivers. 2022. An assessment of factors that influence nest success of the Marbled Murrelet (*Brachyramphus marmoratus*). Presentation at the annual meeting of the Pacific Seabird Group <virtual>. February 24, 2022.
- *Dachenhaus, J. C., S. K. Nelson, D. D. Roby, M. G. Betts, E. W. Woodis, J. A. Bailey Guerrero*, J. J. Valente§, L. J. Adrean*, and J. W. Rivers. 2022. Chick provisioning rates and nesting success of the Marbled Murrelet (*Brachyramphus marmoratus*). Presentation at the annual meeting of the Pacific Seabird Group <virtual>. February 24, 2022.

- *Kerstens, M., and J. W. Rivers. Moving between green and black: natal dispersal and survival of juvenile Black-backed Woodpeckers (*Picoides arcticus*). Presentation at the annual meeting of the Oregon chapter of The Wildlife Society, Eugene, OR. February 24, 2022.
- §Valente, J. J., C. L. LeGrande-Rolls, J. W. Rivers, A. M. Tucker, R. A. Fischer, and M. G. Betts. Conspecific attraction for conservation and management of terrestrial breeding birds: current knowledge and future research directions. Presentation at the annual meeting of the American Ornithologists Society <virtual>. August 13, 2021.
- *Zitomer, R., S. M. Galbraith[§], and J. W. Rivers. Forest age and floral resource availability drive native bee abundance and diversity in intensively managed forests of the Oregon Coast Range Presentation at the annual meeting of the Western Forestry Graduate Research Symposium <virtual>. April 16, 2021.
- Smith, D. J., K. M. Silber, E. J. Williams, S. K. Winnicki, P. E. Klug, K. L. Kosciuch, W. E. Jensen, J. W. Rivers, B. F. Sousa, B. K. Sandercock, and W. A. Boyle. Local grassland bird declines were not explained by long-term changes in reproductive output. Presentation at the annual meeting of the American Ornithologists Society <virtual>. August 13, 2021.
- §Valente, J. J., S. K. Nelson, J. W. Rivers, D. D. Roby, and M. G. Betts. Experimental evidence that social information affects habitat selection in Marbled Murrelets. Presentation at the annual meeting of the Pacific Seabird Group <virtual>. February 26, 2021.
- ⁺Adrean, L. J., J. J. Valente[§], J. B. Guerrero⁺, S. K. Nelson, D. D. Roby, E. W. Woodis⁺, M. G. Betts, and J. W. Rivers. Evaluating the influence of fluctuating ocean conditions on foraging ecology and breeding activity of a threatened seabird. Presentation at the annual meeting of the Pacific Seabird Group <virtual>. February 25, 2021.
- Betts, M. G., J. M. Northrup, J. A. Bailey Guerrero, L. J. Adrean⁺, S. K. Nelson, J. L. Fisher, B. D. Gerber, M.-S. Garcia-Heras[§], Z. Yang, D. D. Roby, and J. W. Rivers. Squeezed by a habitat split: warm ocean conditions and old-forest loss interact to reduce long-term occupancy of the threatened Marbled Murrelet. Presentation at the annual meeting of the Pacific Seabird Group, Portland, OR. February 14, 2020.
- Fountain, E. D., R. T. Golightly, J. W. Rivers, S. K. Nelson, M. G. Betts, D. D. Roby, and M. Z. Peery. Harnessing the power of next-generation sequencing to characterize the diet of Marbled Murrelets (*Brachyramphus marmoratus*). Presentation at the annual meeting of the Pacific Seabird Group, Portland, OR. February 14, 2020.
- §Garcia-Heras, M.-S., L. Adrean⁺, J. A. Bailey Guerrero, S. K. Nelson, D. D. Roby, M. G. Betts, J. C. Dachenhaus⁺, E. W. Woodis⁺, and J. W. Rivers. Spatio-temporal variation in marine space use of the endangered Marbled Murrelet (*Brachyramphus marmoratus*) in Oregon.

- Presentation at the annual meeting of the Pacific Seabird Group, Portland, OR. February 14, 2020.
- §Garcia-Heras, M.-S., L. Adrean⁺, J. A. Bailey Guerrero, S. K. Nelson, D. D. Roby, M. G. Betts, J. Dachenhaus⁺, E. Woodis⁺, and J. W. Rivers. Spatial and temporal variation in marine space use of Marbled Murrelet (*Brachyramphus marmoratus*) along the Oregon coast. Presentation at the annual meeting of the Oregon chapter of The Wildlife Society, Eugene, OR. February 5, 2020.
- §Garcia-Heras, M.-S., L. J. Adrean⁺, S. K. Nelson, D. D. Roby, M. G. Betts, and J. W. Rivers. Breeding season movements and marine habitat use by the Marbled Murrelet (*Brachyramphus marmoratus*) in Oregon. Presentation at the annual meeting of the Pacific Seabird Group, Kauai, HI. March 2, 2019.
- ⁺Adrean, L. J., S. K. Nelson, M.-S. Garcia-Heras[§], D. D. Roby, M. G. Betts, and J. W. Rivers. Factors associated with Marbled Murrelet (*Brachyramphus marmoratus*) nesting success in western Oregon. Presentation at the annual meeting of the Pacific Seabird Group, Kauai, HI. March 1, 2019
- ^DelToro, K., S. Galbraith[§], and J. W. Rivers. Demographic response of a native bee to a natural mosaic of forest wildfire severity. Presentation at the annual meeting of the Pacific Northwest Louis Stokes Alliance Minority Program, Seattle, WA. March 1, 2019.
- Kormann, U., T. Stokely, A. J. Kroll, J. Verschuyl, S. Harris, J. W. Rivers, D. Mainwaring, D. Maguire, and M. G. Betts. Forest biodiversity trades off against timber production but not revenue in the Oregon Coast Range. Presentation at the annual meeting of the Ecological Society of Germany, Austria and Switzerland, Vienna, Austria. September 12, 2018.
- §Northrup, J. M., J. W. Rivers, Z. Yang, and M. G. Betts. Synergistic effects of climate and landuse change on animal population dynamics. Presentation at the annual meeting of the North American Congress for Conservation Biology, Toronto, Ontario, Canada. July 25, 2018.
- ^Hardt, B. M., D. R. Ardia, M. J. Bashaw, and J. W. Rivers. Brood size differentially affects the nestling stress response in sympatric swallows, but does not impact growth or survival. Presentation at the annual meeting of the American Ornithological Society, Tucson, AZ. April 12, 2018.
- [†]Adrean, L. J., S. K. Nelson, C. A. Horton[†], D. D. Roby, M. G. Betts, and J. W. Rivers. Radiotagging reveals unprecedented breeding season movements of Marbled Murrelets. Presentation at the annual meeting of the Pacific Seabird Group, La Paz, Mexico. February 24, 2018.

- Strong, C. S., R. T. Golightly, S. K. Nelson, C. A. Horton⁺, L. J. Adrean⁺, and J. W. Rivers. Bailing on the California Current: Marbled Murrelet and other seabird response to unusual conditions in Oregon and Northern California. Presentation at the annual meeting of the Pacific Seabird Group, La Paz, Mexico. February 22, 2018.
- Rivers, J. W., S. K. Nelson, L. J. Adrean⁺, C. A. Horton⁺, D. D. Roby, and M. G. Betts. An update on the Oregon Marbled Murrelet Project: unexpected results characterize the 2017 breeding season. Presentation at the annual meeting of the Oregon Chapter of The Wildlife Society, Portland, OR. February 15, 2018.
- §Galbraith, S. M., J. H. Cane, and J. W. Rivers. Reproductive response of a native solitary bee across a gradient of forest wildfire severity. Presentation at the annual meeting of the Oregon Chapter of The Wildlife Society, Portland, OR. February 15, 2018.
- §Galbraith, S. M., J. H. Cane, A. R. Moldenke, and J. W. Rivers. Bee diversity is linked to wildfire severity and salvage logging in Oregon mixed-conifer forest. Presentation at the annual meeting of the Ecological Society of America, Portland, OR. August 10, 2017.
- Rivers, J. W., L. Adrean⁺, M. Pickett, B. Taggart, S. K. Nelson, D. D. Roby, and M. G. Betts. Testing whether unmanned aerial vehicles can be used to locate cryptic nests of the Marbled Murrelet. Presentation at the annual meeting of the American Ornithological Society, East Lansing, MI. August 3, 2017.
- Pickett, M. H., B. K. Taggart, J. W. Rivers, L. J. Adrean⁺, and S. K. Nelson. Utilizing UAS to locate nesting seabirds within the canopy of mature forests. Presentation at the annual meeting of the Association for Unmanned Vehicle Systems International, Dallas, TX. May 10, 2017.
- §Northrup, J. M., J. W. Rivers, S. K. Nelson, D. D. Roby, L. J. Adrean⁺, and M. G. Betts. Spatiotemporal patterns of corvid distribution and abundance in areas occupied by Marbled Murrelets. Presentation at the annual meeting of the Pacific Seabird Group, Tacoma, WA. February 25, 2017.
- ⁺Adrean, L. J., M. Pickett, B. Taggart, S. K. Nelson, D. D. Roby, M. G. Betts and J. W. Rivers. Testing whether unmanned aerial vehicles can be used to locate cryptic nests of the Marbled Murrelet. Presentation at the annual meeting of the Pacific Seabird Group, Tacoma, WA. February 23, 2017.
- Rivers, J. W., L. J. Adrean⁺, M. Pickett, B. Taggart, S. K. Nelson, D. D. Roby, and M. G. Betts. Testing whether unmanned aerial vehicles can be used to locate cryptic nests of the Marbled Murrelet. Presentation at the annual meeting of the Oregon Chapter of The Wildlife Society, Pendleton, OR. February 9, 2017.
- §Galbraith, S. M., J. H. Cane, and J. W. Rivers. The influence of wildlife severity and post-fire management on pollinator communities in a mixed-conifer forest. Presentation at the

- annual meeting of the Oregon Chapter of The Wildlife Society, Pendleton, OR. February 9, 2017.
- *Barry, A. M., J. C. Hagar, and J. W. Rivers. Created snag dynamics and influence on cavitynesting bird communities over 25 years in western Oregon. Presentation at the annual meeting of the Oregon Chapter of The Wildlife Society, Pendleton, OR. February 9, 2017.
- §Northrup, J. M., J. W. Rivers, S. K. Nelson, D. D. Roby, L. J. Adrean⁺, and M. G. Betts. Spatiotemporal patterns of corvid distribution and abundance in areas occupied by Marbled Murrelets. Presentation at the annual meeting of the Oregon Chapter of The Wildlife Society, Pendleton, OR. February 8, 2017.
- ⁺Adrean, L. J., S. K. Nelson, J. M. Northrup[§], D. D. Roby, M. G. Betts, and J. W. Rivers. Evaluating space use and reproductive success of the threatened Marbled Murrelet in western Oregon. Presentation at the annual meeting of the Oregon Chapter of The Wildlife Society, Pendleton, OR. February 8, 2017.
- Rivers, J. W., M. G. Betts, A. J. Kroll, C. J. Schwarz, and J. Verschuyl. Songbird demographic response to herbicide application in early-seral forest. Presentation at the annual meeting of the American Ornithologists' Union, Norman, OK. July 30, 2015.
- Rivers, J. W., and M. G. Betts. Intensive forest management practices reduce nest survival and offspring production: evidence from a landscape-scale experiment. Presentation at the annual meeting of the American Ornithologists' Union, Estes Park, CO. September 25, 2014.
- Verschuyl, J., M. G. Betts, K. Jones*, J. W. Rivers, and A. J. Kroll. A manipulative study of the effects of forest herbicide use on nest success of early seral birds. Presentation at the annual meeting of the Washington Chapter of The Wildlife Society, Pasco, WA. February 6, 2014.
- Vesely, D. G., M. G. Betts, D. Smith, and J. W. Rivers. Use of conservation detection dogs to assist in passerine nest searches. Presentation at the Research Advances in Fisheries, Wildlife, and Ecology Symposium, Corvallis, OR. February 10, 2010.
- Rivers, J. W., L. B. Martin, A. L. Liebl, and M. G. Betts. Alarm calls of White-crowned Sparrow parents fail to stimulate corticosterone production in their offspring. Presentation at the annual meeting of the American Ornithologists' Union, Philadelphia, PA. August 14, 2009.
- Lupold, S., J. W. Rivers, G. M. Linz, D. F. Westneat, and T. R. Birkhead. Post-copulatory sexual selection shaping sperm and testes in birds. Presentation at the International Behavioral Ecology Congress, Ithaca, NY. August 12, 2008.

- Rivers, J. W., B. D. Peer, and S. I. Rothstein. Begging behavior of the Brown-headed Cowbird: notable as a nest parasite, or boring like a blackbird? Presentation at the annual meeting of the American Ornithologists' Union, Portland, OR. August 6, 2008.
- [^]Blundell, M. A., J. W. Rivers, and S. I. Rothstein. Brown-headed Cowbird begging and feeding by host parents: does exaggerated begging lead to exaggerated provisioning?

 Presentation at the annual meeting of the American Ornithologists' Union, Portland, OR. August 6, 2008.
- Peer, B. D., R. G. Harper, J. W. Rivers, J. W. Frick, M. D. Benson, M. Anderson, B. Blackwell, T. Eshedagho, J. Raabe, B. Wall, and E. Wear. Dickcissels, DDT, and cowbirds: an evolutionary equilibrium? Presentation at the annual meeting of the American Ornithologists' Union, Laramie, WY. August 9, 2007.
- Rivers, J. W. and S. I. Rothstein. Exaggerated begging is not an adaptation for brood parasitism in the Brown-headed Cowbird. Presentation at the annual meeting of The Wilson Ornithological Society, Boston, MA. March 23, 2007.
- Rivers, J. W. and S. I. Rothstein. Assessing whether the exaggerated begging of a generalist brood parasite is an adaptation for brood parasitism. Presentation at the North American Ornithological Conference, Veracruz, Mexico. October 5, 2006.
- Rivers, J. W., and S. I. Rothstein. Comparative evidence indicates exaggerated begging behavior by nestling Brown-headed Cowbirds is not a unique adaptation for brood parasitism. Presentation at the annual meeting of the Animal Behavior Society, Snowbird, UT. August 15, 2006.
- Rivers, J. W. An investigation of the proximate factors that influence begging behavior in nestling Brown-headed Cowbirds. Presentation at the annual meeting of the American Ornithologists' Union, Urbana-Champaign, IL. August 9, 2003.
- Rivers, J. W., D. P. Althoff, P. S. Gipson, and J. S. Pontius. Evaluation of a reproductive index to estimate Dickcissel reproductive success. Presentation at the North American Ornithological Conference, New Orleans, LA. September 27, 2002.
- Rivers, J. W., D. P. Althoff, P. S. Gipson, J. S. Pontius, and A. Abuzeineh. Evaluation of an index method to measure Dickcissel breeding success in northeastern Kansas. Presentation at the annual meeting of the Midwest Fish and Wildlife Conference, Des Moines, IA. December 11, 2001.
- Althoff, D. P., J. W. Rivers, P. S. Gipson, P. B. Woodford, and J. S. Pontius. Monitoring and evaluating long-term population trends of small landbirds on Fort Riley Military Installation, Kansas, 1991-2000. Presentation at the Integrated Training Area Management Conference Nashville, TN. September 19, 2001.

- Althoff, D. P., J. W. Rivers, P. S. Gipson, P. B. Woodford, and J. S. Pontius. Evaluation of long-term population trends of small landbirds on Fort Riley Military Installation, Kansas.

 Presentation at the annual meeting of The Wildlife Society, Reno/Tahoe, NV. September 11, 2001.
- Rivers, J. W. and J. V. Briskie. Lack of sperm production and sperm storage by arctic-nesting shorebirds during spring migration. Presentation at the annual meeting of The Wilson Ornithological Society, Fayetteville, AR. May 5, 2001.
- Rivers, J. W., T. T. Cable, and J. S. Pontius. House Sparrow eggs in artificial nests overestimate Dickcissel nest predation rates. Presentation at the annual meeting of The Wildlife Society, Nashville, TN. September 13, 2000.
- Rivers, J. W., M. R. Rouges, and T. G. Smith. A survey of avian ectoparasites from El Rey National Park, Argentina. Presentation at the Reunión Argentina de Ecología, San Miguel de Tucumán, Argentina. April 22, 1999.

CONTRIBUTED POSTER PRESENTATIONS AT SCIENTIFIC CONFERENCES

- ^Undergraduate student, *graduate student, *post-doctoral trainee, or *research associate under Rivers' direction or advisement.
 - Michlanski, M. K., J. L. Sanders, J. W. Rivers, K. L. Yates, and B. R. Beechler. Consequences of parasitism in an endangered population of Marbled Murrelets on the Oregon coast. Presentation at the annual meeting of the American Association of Zoo Veterinarians, Nashville, TN. September 18, 2023.
 - *Sampognaro, M., K. Moriarty, J. Verschuyl, and J. W. Rivers. Evaluating native bee community response to fuel-reduction treatments in private industrial dry forests. Presentation at the annual meeting of the Western Forestry Graduate Research Symposium, Corvallis, OR. April 14, 2023.
 - [#]Frisinger, C., J. C. Dachenhaus, D. D. Roby, S. K. Nelson, M. G. Betts, and J. W. Rivers. Chick provisioning of a threatened seabird under divergent ocean conditions. Presentation at the annual meeting of the Western Forestry Graduate Research Symposium, Corvallis, OR. April 14, 2023.
 - ^Padgett, I., R. Zitomer*, and J. W. Rivers. An evaluation of bee body size across a gradient of managed early seral conifer forests. Presentation at the annual meeting of the Oregon chapter of The Wildlife Society, Lincoln City, OR. February 24, 2022.
 - ⁺Dachenhaus, J. C., L. J. Adrean⁺, S. K. Nelson, D. D. Roby, M. G. Betts, E. Woodis⁺, J. A. Bailey Guerrero, and J. W. Rivers. Use of video cameras to quantify chick provisioning rates in

- the Marbled Murrelet (*Brachyramphus marmoratus*). Presentation at the annual meeting of the Pacific Seabird Group, Portland, OR. February 13, 2020.
- *Woodis, E. W., M. E. Hunsicker, Y. Gong, S. K. Nelson, D. D. Roby, M. G. Betts, J. C. Dachenhaus*, L. J. Adrean*, J. A. Bailey Guerrero, and J. W. Rivers. Using stable isotope analysis to document the effects of warming oceans on diet of the Marbled Murrelet (*Brachyramphus marmoratus*). Presentation at the annual meeting of the Pacific Seabird Group, Portland, OR. February 13, 2020.
- §Garcia-Heras, M.-S., L. J. Adrean⁺, M. J. Stuber, J. Dachenhaus⁺, and J. W. Rivers. Bald Eagles and seabirds: new evidence reveals predation events on an endangered alcid, the Marbled Murrelet (*Brachyramphus marmoratus*), and other species along the central Oregon Coast. Presentation at the annual meeting of the Pacific Seabird Group, Portland, OR. February 13, 2020.
- *Dachenhaus, J. C., L. J. Adrean*, S. K. Nelson, D. D. Roby, M. G. Betts, E. Woodis*, J. A. Bailey Guerrero, and J. W. Rivers. Use of video cameras to quantify chick provisioning rates in the Marbled Murrelet (*Brachyramphus marmoratus*). Presentation at the annual meeting of the Oregon chapter of The Wildlife Society, Eugene, OR. February 5, 2020.
- *Woodis, E. W., M. E. Hunsicker, Y. Gong, S. K. Nelson, D. D. Roby, M. G. Betts, J. C. Dachenhaus*, L. J. Adrean*, J. A. Bailey Guerrero, and J. W. Rivers. Using stable isotope analysis to document the effects of warming oceans on diet of the Marbled Murrelet (*Brachyramphus marmoratus*). Presentation at the annual meeting of the Oregon chapter of The Wildlife Society, Eugene, OR. February 5, 2020.
- §Garcia-Heras, M.-S., L. J. Adrean⁺, M. J. Stuber, J. Dachenhaus⁺, and J. W. Rivers. Bald Eagles and seabirds: new evidence reveals predation events on an endangered alcid, the Marbled Murrelet (*Brachyramphus marmoratus*), and other species along the central Oregon Coast. Presentation at the annual meeting of the Raptor Research Foundation, Ft. Collins, CO. November 7, 2019.
- *Zitomer, R. A., S. M. Galbraith[§], and J. W. Rivers. Where (and when) are bumble bees in intensively managed conifer forests? Presentation at BOMBUSS 2.0: Building our methods by using sound science, next steps in North American bumble bee monitoring and conservation, Toronto, Canada. October 17, 2019.
- Tishendorf, R., M. Brawner, D. Taylor, J. W. Rivers, and R. Terry. Investigating resource partitioning between two species of swallows using stable isotope analysis. Presentation at the OSU Undergraduate Research Symposium, Corvallis, OR. September 19, 2019.
- [^]Zarifah, N., G. Wood[^], S. Galbraith[§], and J. W. Rivers. The effect of stand age on emergence rate and cocoon mass of *Osmia lignaria* in managed conifer forests. Presentation at the OSU Undergraduate Research Symposium, Corvallis, OR. September 19, 2019.

- §Galbraith, S. M., M. G. Betts, R. Progar, A. R. Moldenke, and J. W. Rivers. The influence of conifer forest management on pollinator communities in the Pacific Northwestern U.S. Presentation at the International Pollinator Conference, Davis, CA. August 19, 2019.
- ^Wood, G., N. Zarifah^, S. Galbraith[§], and J. W. Rivers. The effect of time since harvest on body size of *Osmia lignaria* in managed conifer forests. Presentation at the OSU Celebrating Undergraduate Excellence Conference, Corvallis, OR. May 14, 2019.
- ^DelToro, K., S. M. Galbraith[§], and J. W. Rivers. Demographic response of a native bee to a natural mosaic of forest wildfire severity. Presentation at the annual meeting of the Society for the Advancement of Chicanos and Native Americans in Science, San Antonio, TX. October 12, 2018.
- ^Bell, N., S. Galbraith[§], A. Moldenke, and J. W. Rivers. Quantifying the influence of wildfire severity on offspring food provisions in a native bee. Presentation at the OSU Undergraduate Research Symposium, Corvallis, OR. September 17, 2018.
- ^DelToro, K., S. M. Galbraith§, and J. W. Rivers. Demographic response of a native bee to a natural mosaic of forest wildfire severity. Presentation at the OSU Undergraduate Research Symposium, Corvallis, OR. September 17, 2018.
- *Horton, C. A., L. J. Adrean*, S. K. Nelson, D. D. Roby, M. G. Betts, and J. W. Rivers. Anomalous ocean conditions coincide with a lack of nesting activity in Marbled Murrelets in Oregon. Presentation at the annual meeting of the American Ornithological Society, Tucson, Arizona. April 12, 2018
- *Horton, C. A., L. J. Adrean*, S. K. Nelson, D. D. Roby, M. G. Betts, and J. W. Rivers. Anomalous ocean conditions coincide with a lack of nesting activity in Marbled Murrelets in Oregon. Presentation at the annual meeting of the Pacific Seabird Group, La Paz, Mexico. February 22, 2018.
- Nelson, S. K., J. M. Northrup§, J. W. Rivers, D. D. Roby, and M. G. Betts. Effects of climate, habitat, and predators on Marbled Murrelet distribution in Oregon. Presentation at the annual meeting of the Pacific Seabird Group, La Paz, Mexico. February 22, 2018.
- Nelson, S. K., J. M. Northrup[§], D. D. Roby, M. G. Betts, L. J. Adrean⁺, and J. W. Rivers. Evaluating space use and reproductive success of the threatened Marbled Murrelet in western Oregon. Presentation at the annual meeting of the Pacific Seabird Group, Tacoma, WA. February 23, 2017.
- Houtz, J. L., J. W. Rivers, J. W., B. M. Horton, and M. G. Betts. Evaluating the influence of forest herbicides on offspring sex ratio in an early-successional forest songbird.

 Presentation at the annual Pennsylvania State System of Higher Education Undergraduate

- Research Conference in Science, Technology, Engineering, and Mathematics, Millersville, PA. November 5, 2016.
- Rivers, J. W., J. M. Northrup§, M. G. Betts, S. K. Nelson, and D. D. Roby. Evaluating space use and reproductive success of the threatened Marbled Murrelet in western Oregon.

 Presentation at the 6th North American Ornithological Conference, Washington, D.C. August 17, 2016.
- Houtz, J. L., J. W. Rivers, J. W., B. M. Horton, and M. G. Betts. Evaluating the influence of forest herbicides on offspring sex ratio in an early-successional forest songbird.
 Presentation at the 6th North American Ornithological Conference, Washington, D.C. August 17, 2016.
- ^Mathis, C. L., J. W. Rivers, and M. G. Betts. Assessing the influence of organic biofuel removal on bee diversity in early-seral production forests. Presentation at the annual meeting of the Oregon Chapter of The Wildlife Society, Eugene, OR. April 29, 2015.
- [^]Hardt, B. M., J. W. Rivers, D. R. Ardia, and M. J. Bashaw. Assessing the role of corticosterone in regulating the stress response in *Tachycineta* swallows. Presentation at the annual meeting of the Oregon Chapter of The Wildlife Society, Eugene, OR. April 29, 2015.
- *Jones, K. N., J. W. Rivers, and M. B. Betts. Effects of intensive forest management on reproductive success in a cavity-nesting songbird. Presentation at the annual meeting of the American Ornithologists' Union, Estes Park, CO. September 24, 2014.
- Rivers, J. W., G. N. Newberry, and D. R. Ardia. Divergent responses to an extreme stressor in two sympatric *Tachycineta* swallows. Presentation at the North American Ornithological Conference, Vancouver, British Columbia. August 15, 2012.
- [^]Newberry, G. N., and J. W. Rivers. Differences in diet composition of coexisting Violet-green and Tree Swallows during offspring provisioning. Presentation at the North American Ornithological Conference, Vancouver, British Columbia. August 15, 2012.
- Rivers, J. W., M. G. Betts, A. L. Liebl, J. C. Owen, and L. B. Martin. Assessing whether the corticosterone stress response predicts post-fledging survival in a temperate passerine. Presentation at the annual meeting of the American Ornithologists' Union, San Diego, CA. February 9, 2010.
- Mora, M. A., B. Brattin, C. Baxter, and J. W. Rivers. Ecotoxicological implications of Sr accumulation in eggshells of birds from North America. Presentation at the meeting of the Society of Environmental Toxicology and Chemistry, Göteborg, Sweden. June 2, 2009.
- [^]Blundell, M. A., J. W. Rivers, and S. I. Rothstein. Begging behavior of Brown-headed Cowbird chicks: does exaggerated begging lead to exaggerated provisioning? Presentation at the

- Society for the Advancement of Chicanos and Native Americans in Science Conference, Salt Lake City, UT. October 10, 2008.
- Rivers, J. W., B. D. Peer, and S. I. Rothstein. Assessing whether exaggerated begging behavior in the Brown-headed Cowbird is an adaptation for brood parasitism. Presentation at the International Behavioral Ecology Congress, Ithaca, NY. August 11, 2008.
- Peer, B. D., R. G. Harper, J. W. Rivers, and J. Frick. Acceptance of cowbird parasitism by Dickcissels: is pesticide thinning of eggshells to blame? Presentation at the International Behavioral Ecology Congress, Ithaca, NY. August 11, 2008.
- Rivers, J. W., W. E Jensen, K. L. Kosciuch, and S. I. Rothstein. Community-level patterns of host use by the Brown-headed Cowbird, a generalist brood parasite. Presentation at the annual meeting of the American Ornithologists' Union, Portland, OR. August 7, 2008.
- Rivers, J. W., W. E Jensen, K. L. Kosciuch, and S. I. Rothstein. Community-level patterns of host use by a generalist brood parasite. Presentation at the annual meeting of the American Ornithologists' Union, Laramie, WY. August 10, 2007.
- Kosciuch, K. L., J. W. Rivers, and B. K. Sandercock. Stable isotopes identify the natal origins of a generalist brood parasite. Presentation at the annual meeting of the American Ornithologists' Union, Laramie, WY. August 10, 2007.
- Kosciuch, K. L., J. W. Rivers, and B. K. Sandercock. Stable isotopes identify the natal origins of a generalist brood parasite. Presentation at the annual meeting of The Wilson Ornithological Society, Boston, MA. March 22, 2007.
- Peer, B. D., R. G. Harper, J. W. Rivers, J. W. Frick, J. Raabe, B. Blackwell, M. Anderson, and E. Wear. Does organochlorine contamination in Dickcissel eggs force them to accept cowbird parasitism? Presentation at the North American Ornithological Conference, Veracruz, Mexico. October 4, 2006.
- Rivers, J. W., and S. I. Rothstein. The influence of hunger on begging behavior in the Brownheaded Cowbird. Presentation at the annual meeting of the American Ornithologists' Union, Santa Barbara, CA. August 24, 2005.
- Rivers, J. W., S. Young, E. Gonzalez, and R. C. Fleischer. Evidence for sibling relatedness in nests multiply-parasitized by Brown-headed Cowbirds. Contributed poster presentation at the annual Southern California Animal Behavior Symposium, Riverside, CA. February 12, 2005.
- Rivers, J. W., S. Young, E. Gonzalez, and R. C. Fleischer. Evidence for sibling relatedness in nests multiply-parasitized by Brown-headed Cowbirds. Presentation at the annual

meeting of the American Ornithologists' Union, Quebec City, Quebec, Canada. August 19, 2004.

Rivers, J. W., D. P. Althoff, P. S. Gipson, P. B. Woodford, and J. S. Pontius. Long-term population trends of grassland birds on Ft. Riley, Kansas. Presentation at the annual meeting of the Cooper Ornithological Society, Albuquerque, NM. April 19, 2001.

Rivers, J. W., T. T. Cable, and P. S. Gipson. Avian use of farmed wetlands in Kansas.

Presentation at the International Symposium on Society and Resource Management,
Bellingham, WA. June 14, 2000.

INVITED ACADEMIC SEMINARS

The Wild World of Bees Lecture Series Webinar, Oregon Bee Project (June 11, 2020)

Stay at Home Lecture Series Webinar, Oregon State University (April 16, 2020)

Hatfield Marine Science Center, Oregon State University (November 7, 2019)

Eugene Garden Club, Eugene, Oregon (June 12, 2019)

Portland Audubon Society, Portland, Oregon (June 6, 2019)

Department of Forest Engineering, Resources, and Management, Corvallis, OR (January 7, 2019)

Oregon State University, Department of Fisheries and Wildlife (November 1, 2018)

Corvallis Science Pub, Corvallis, Oregon (March 12, 2018)

Drone Week, Oregon State University (June 29, 2017)

Oregon Audubon Society Council, Corvallis, Oregon (November 12, 2016)

Annual meeting of the Wild Bird Feeding Industry, Naples, Florida (November 14, 2014)

Department of Biology, Portland State University (March 13, 2014)

OSU Bird Nerds, Oregon State University (December 4, 2013)

Oregon State University, Department of Fisheries and Wildlife (March 14, 2013)

OSU Bird Nerds, Oregon State University (February 6, 2013)

Corvallis Audubon Society, Corvallis, Oregon (September 15, 2011)

Oregon State University, Department of Forest Ecosystems and Society (June 10, 2009)

Oregon State University, Department of Fisheries and Wildlife (January 10, 2008)

Cornell University, Department of Ecology and Evolution (October 23, 2007)

Tufts University, Department of Biology (October 19, 2007)

University of British Columbia, Department of Forest Sciences (October 4, 2007)

University of Utah, Department of Biology (August 21, 2006)

Kansas State University, Division of Biology (May 5, 2005)

Northern Flint Hills Audubon Society, Manhattan, Kansas (October 12, 1999)

Kansas State University, Dept. Horticulture, Forestry, and Recreational Resources (September 21, 1999)

INVITED PRESENTATIONS TO EXTERNAL STAKEHOLDERS

Society for American Foresters, Mary's Peak Chapter, Corvallis, Oregon (April 17, 2023)

National Council for Air and Stream Improvement Forestry Program <virtual> (September 16, 2021)

Institute for Working Forest Landscapes, OSU College of Forestry, Corvallis, OR (October 2, 2021)

Bureau of Land Management < virtual > (March 9, 2021)

Oregon Board of Forestry, Salem, Oregon (March 4, 2020)

Oregon Division of State Lands Stakeholder group, Corvallis, OR (November 21, 2019)

National Council for Air and Stream Improvement Forestry Program <virtual> (October 15, 2019)

Interagency Pollinator Working Group <virtual> (September 23, 2019)

National Council for Air and Stream Improvement Science Updates, Tillamook, OR (July 26, 2019)

Institute for Working Forest Landscapes, OSU College of Forestry, Corvallis, OR (May 3, 2019) Oregon Board of Forestry, Salem, OR (March 6, 2019)

Olympic Resources Annual Meeting, Grande Ronde, OR (March 19, 2019)

National Council for Air and Stream Improvement, Vancouver, WA (November 6, 2018)

Oregon Forest Industries and Council, Salem, OR (August 30, 2018)

Oregon Small Woodland Owners Association Annual Meeting, Springfield, OR (June 29, 2018)

Society for American Foresters, Mary's Peak Chapter, Corvallis, Oregon (March 16, 2018)

Oregon Small Woodland Owners Association, Benton County chapter, Corvallis, Oregon (March 7, 2018)

Oregon Department of Fish and Wildlife Commission, Portland, OR (February 9, 2018)

Oregon Clover Commission, McMinnville, OR (December 13, 2017)

NOAA, NW Fisheries Science Center, Newport, OR (October 4, 2017)

Oregon Forest Industries and Council, Salem, OR (September 20, 2017)

Oregon Forest Industries and Council, Salem, OR (March 14, 2017)

Western Forestry and Conservation Association, Vancouver, WA (October 4, 2016)

Bureau of Land Management, Roseburg, OR (July 28, 2016)

Institute for Working Forest Landscapes, OSU College of Forestry, Corvallis, OR (May 31, 2016)

Institute for Working Forest Landscapes, OSU College of Forestry, Corvallis, OR (December 15, 2015)

AWARDS, HONORS, AND DISTINCTIONS

Marion Jenkinson Service Award, American Ornithological Society (2023). This award is given to an early- or mid-career ornithologist who has performed continued extensive service to the American Ornithological Society AOS, including holding elected offices but emphasizing volunteer contributions and committee participation.

Research Award, Oregon State Society of American Foresters (2020). This award is presented in recognition of outstanding achievement in any branch of science leading to advancement in either the science or practice of forestry in Oregon.

Vice Provost's Outreach and Engagement Awards of Excellence, Honorable Mention; Division of University Outreach and Engagement, Oregon State University (2016).

Fellow, American Ornithological Society (2015). This recognizes exceptional and sustained contributions to ornithology and/or service to the American Ornithological Society (formerly the American Ornithologists' Union).

Dean's Award for Outstanding Achievement, College of Forestry, Oregon State University (2015). This award given in recognition for outstanding efforts in research, teaching, and mentoring in wildlife-forestry research as a faculty research assistant.

Ned K. Johnson Young Investigator Award, American Ornithological Society (2012). This award recognizes researchers who have made outstanding and promising ornithological contributions early in their career and show a distinct promise for leadership in the field of ornithology.

Certified Wildlife Biologist, The Wildlife Society (2010).

Elective Member, American Ornithological Society (2007).

Student Presentation Award, Honorable Mention. 4th North American Ornithological Conference, Veracruz, Mexico (in top 5% of ~470 student presentations; 2006).

GSA Excellence in Teaching Award, Honorable Mention, Graduate Student Association, University of California, Santa Barbara (2005).

Associate Wildlife Biologist, The Wildlife Society (2001).

Elective Member, Sigma Xi (1998).

Elective Member, Xi Sigma Pi Honor Society (1997).

Commonwealth Scholar, Honors Program, University of Massachusetts (1996).

Student Leadership Award, Rocky Mountain Elk Foundation (1996).

UNIVERSITY INSTRUCTION

Terrestrial Vertebrate Identification and Natural History, FOR 210 – Spring 2022–present, 3 credits. This course reviews principles used for locating, observing, and identifying terrestrial vertebrates, with an emphasis on using morphological characteristics in concert with behaviors and natural history. It places emphasis on taxonomic relationships and traits used for identifying species within each terrestrial vertebrate group (i.e., birds, mammals, reptiles, and amphibians). A major component of this course is for students to

- gain experience in species identification under field conditions and explores the relationship between animals and their environments. An Ecampus version of this course is also taught in spring and fall terms starting spring 2023.
- Forest Ecology, FES 341 Winter 2020–present, 3 credits. This course provides an overview of the fundamentals of forest ecosystems, including factors that influence forest composition, structure, and functioning over space and time. It covers principles of social-ecological forest systems, species traits, species interactions, forest disturbance-succession, community ecology and biodiversity, landscape ecology, and forest sustainability. The topics are presented in the context of understanding forest ecosystems and considering issues in their management from multiple perspectives.
- Biodiversity Conservation in Managed Forests, FES/FW 452 Spring 2020–present, 3 credits. This course introduces the concepts of, and approaches to, managing forest stands, landscapes, and regions to achieve desired habitat conditions for indicator species and conservation of biological diversity. It covers three broad content areas that address life history characteristics and habitat selection by forest-associated wildlife, stand scale characteristics and successional stages, and landscape characteristics that allow long-term persistence by wildlife in managed forests.
- Research in Avian Ecology, FOR 599 Fall, Winter 2020–present, 1 credit. Co-instructed 1-unit graduate course to discuss topics related to undertaking empirical research on basic biology and conservation of wild birds.
- **Bee Ecology and Evolution, FOR 505** Winter 2021, 1 credit. Co-instructed 1-unit graduate course to discuss topics related to undertaking empirical research on the basic ecology and evolution of wild bees.
- **Solitary Bee Ecology, FOR 505** Fall 2020, 1 credit. Co-instructed 1-unit graduate course to explore the biology, evolution, and conservation of solitary bees including phylogeny, life cycles, mating, foraging behavior, and bee-plant relationships.
- Responsible Conduct of Research, GRAD 520 Spring 2015, Winter 2015, Fall 2014, 1 credit. Instructed graduate level course to teach responsible conduct of research for OSU graduate students who conduct scholarly activity during the course of their graduate work. Topics include ethical decision making; human subjects; animal welfare; data acquisition, sharing, and ownership; research misconduct; conflicts of interest; authorship; peer review; mentor/trainee responsibilities; and collaborative science.
- Species Distributions, FES 599 Fall 2013, 2 credits. Co-instructed graduate course designed to provide graduate students with a broad overview of key topics in species distributions, with a focus on fundamental drivers of distributions (e.g., abiotic and biotic environmental features, competition, facilitation) and an introduction to modeling approaches used to predict species distributions in space and time.

- Principles of Fish and Wildlife Conservation, FW 251 Winter 2012, 3 credits. Co-instructed sophomore level undergraduate course to understand basic principles underlying the conservation and management of fish and wildlife; examine the social, cultural, and political institutions that affect conservation and management issues; and understand how scientific knowledge and research are used in the conservation and management of our natural resources.
- Mammalogy, FW 317 Winter 2012, Fall 2011, 3 credits. Instructed upper level undergraduate distance education course to survey the origins, evolution, diversity, and adaptations of mammals to diverse environments. Topics include taxonomy, reproduction, sensory perception, physiology, life history, and behavior.
- Animal Personality and Coping Styles, FW 499/599 Winter 2011, 2 credits. Instructed upper level undergraduate and graduate student course on the study of animal personality and coping style, with an emphasis on how organisms vary in individual behaviors how variation in behaviors may be adaptive in light of various environmental stressors.
- **Ecophysiology of Birds, FW 599** Winter 2011, 1 credit. Co-instructed graduate seminar course focusing on understanding adaptive variation in ecological physiology of birds, with a focus on how this variation suits divergent lifestyles.
- **Wildlife Ecology, FW 481/581** Fall 2011, Fall 2010, 4 credits. Instructed upper level undergraduate and graduate student course on the study of basic ecological principles and patterns as they relate to the conservation and management of biodiversity, especially factors that influence the distribution and abundance of wildlife.

GUEST LECTURER FOR UNIVERSITY COURSES

- Oregon State University, NR 201 Managing Natural Resources for the Future Fall 2023. "Ecology and conservation of native bees in managed forest landscapes" Instructor: Ms. Lydia Gorel.
- **Washington State University, SOE 306** Plants in the Environment Spring 2023. "Ecology and conservation of native bees in managed forest landscapes" Instructor: Dr. Mark Swanson.
- Oregon State University, NR 201 Managing Natural Resources for the Future Fall 2022. "Ecology and conservation of native bees in managed forest landscapes" Instructor: Dr. Sharon Shen.
- **University of Georgia, FORS 8080** Forest Health Seminar Spring 2022. "Evaluating the suitability of managed forest landscapes for pollinators" Instructor: Dr. Kamal Ghandi.

- Oregon State University, NR 201 Managing Natural Resources for the Future Winter 2022. "Ecology and conservation of native pollinators in managed conifer forests" Instructor: Dr. Sharon Shen.
- **Oregon State University, BRR 100** Great Experiments in Bioresource Sciences Fall 2021. "Ecology and conservation of native pollinators in managed forests" Instructor: Dr. Wanda Crannell.
- **Oregon State University, FE 469** Forest Management Planning and Design II Spring 2021. "Biodiversity considerations when planning even-aged harvest in Douglas-fir production forests" Instructor: Dr. Kevin Lyons.
- **Oregon State University, NR 201** Managing Natural Resources for the Future Winter 2021. "Conservation of native pollinators in the context of managed forests" Instructor: Dr. Sharon Shen.
- **Oregon State University, FW 331** Ecology of Marine and Estuarine Birds summer 2020. "Uncovering the hidden world of a secretive seabird" Instructor: Dr. Bruce Dugger.
- **Oregon State University, FES 520** Posing Research Questions Fall 2018. "A Cognitive Science Approach to Improving Scientific Presentations" Instructor: Dr. Lisa Gaino.
- Oregon State University, NR 201 Managing Natural Resources for the Future Spring 2018. "Uncovering the hidden world of a secretive seabird, the endangered Marbled Murrelet" Instructor: Dr. Reem Hajjar.
- **Oregon State University, FES 520** Posing Research Questions Fall 2017. "A Cognitive Science Approach to Improving Scientific Presentations" Instructor: Dr. Lisa Gaino.
- **Oregon State University, FES 520** Posing Research Questions Fall 2016. ""Some Modest Advice for Improving Presentations" Instructor: Dr. Lisa Gaino.
- **Oregon State University, FES 520** Posing Research Questions Fall 2015. "Some Modest Advice for Scientific Presentations" Instructor: Dr. Lisa Gaino.
- **Oregon State University, FES 520** Posing Research Questions Fall 2014. "A Primer on Funding Opportunities for Graduate Student Research" Instructor: Dr. Lisa Gaino.
- **Oregon State University, FES 520** Posing Research Questions Fall 2014. "A Brief Overview of Scientific Writing and Peer Review" Instructor: Dr. Lisa Gaino.

- **Kansas State University, BIOL 543** Ornithology Spring 2014. "Causes and consequences of offspring begging displays in the Brown-headed Cowbird, an obligate brood parasite." Instructor: Dr. Alice Boyle.
- Oregon State University, FW 451 Avian Conservation and Management Fall 2013. "Ecology and conservation ecology of the obligate vertebrate scavengers." Instructor: Dr. Douglas Robinson.
- Oregon State University, GRAD 511 Designing a Path for Success: An Orientation for New Graduate Students Summer 2014. "A Primer on Research Funding Opportunities for Graduate Students." Instructor: Dr. Anita Azarenko.
- Oregon State University, FW 451 Avian Conservation and Management Fall 2013. "Ecology and conservation ecology of the obligate vertebrate scavengers." Instructor: Dr. Douglas Robinson.
- **University of California, Santa Barbara, EEMB 139**, Sensory Ecology Winter 2006. "The ecology of offspring begging behaviors." Instructor: Dr. John Endler.

NON-CREDIT COURSES AND WORKSHOPS

- **Guest Speaker**, "Improving Scientific Communication", Western Forestry Graduate Research Symposium, Oregon State University. 2019–present.
- **Guest Speaker**, "Improving Scientific Communication", Willamette Valley Bird Symposium, Oregon State University. 2020–2022.
- **Field Trip Co-Leader**, "Biodiversity-Tradeoffs in Early Seral Conifer Forests", Early Seral Biodiversity Science & Management Workshop, Oregon State University. 2019.
- **Guest Speaker**, "Wildlife Biology Tools of the Trade", Louis Stokes Alliance for Minority Participation Bridge Program, Oregon State University. 2016–2018, 2021.
- **Guest Speaker**, "Undergraduate Research Opportunities", STEM Leaders Program, Oregon State University. 2017.
- Guest Speaker, "Explore Your Forests", College of Forestry, Oregon State University. 2016.
- **Guest Speaker**, "Financing Your Graduate Research", Graduate School, Oregon State University. 2014–2016.
- **Guest Speaker**, "Wildlife Biology Tools of the Trade", STEM Academy, College of Forestry, Oregon State University. 2013.

Field Trip Co-Leader, "Biodiversity and Timber Production Tradeoffs in Managed Conifer Forests", Oregon State University and Oregon Forest Resources Institute. 2013.

MENTORING AND ADVISING

Post-doctoral Trainees

Jonathon Valente, OSU, 2020–2022.

Marie-Sophie Garcia-Heras (co-advised with M. Betts), OSU, 2018–2020.

Sara Galbraith, OSU, 2016-2020.

Joseph Northrup (co-advised with M. Betts), OSU, 2016–2017.

Graduate Students

Mark Kerstens, OSU, Ph.D. student, 2020–present.

Cecelia Frisinger, OSU, M.S. student, 2022-present.

Megan Sampognaro, OSU, M.S. student, 2022–present.

Rachel Zitomer, OSU, Ph.D. student, 2018–2023.

Ethan Woodis, OSU, M.S. student (co-advised with M. Betts), 2022–present.

Janell Lajoie, OSU, M.S. student (co-advised with L. Gaino), 2015–2018.

Amy Comstock, OSU, M.S. student (co-advised with J. Hagar), 2014–2017.

Kristin Jones, OSU, M.S. student (co-advised with M. Betts), 2013–2015.

University Honors College Students

Hallie Perlman, OSU, 2022-present.

Lucas Parvin, OSU, 2020–2022.

Nicole Bell, OSU, 2018-2020.

Braelei Hardt, OSU, 2013-2017.

Undergraduate Research Assistants

Makena Westermeyer, OSU, Mentored Employment Program, 2024.

Christoph Anderson, OSU, STEM Leaders Program, 2024.

Sophia Gutierrez, OSU, STEM Leaders Program, 2024.

Bayly Kahle, OSU, URSA Engage Program, 2024.

Maria Alvarez-Barroso, OSU, URSA Engage Program, 2024.

Melissa Waltier, OSU, URSA Engage Program, 2024.

Steven Cleasby-Mayeda, OSU, URSA Engage Program, 2023.

Emelia Ferguson, OSU, URSA Engage Program, 2023.

Katherine Hassett, OSU, URSA Engage Program, 2022–2023.

Mallory Mead, OSU, URSA Engage Program, 2020–2021.

Mina Everingham, OSU, URSA Engage Program, 2020–2021.

Nuha Zarifah, OSU, URSA Engage Program, 2019.

Giulia Wood, OSU, URSA Engage Program, 2019.

Kendra DelToro, OSU, URSA Engage Program, 2018.

Isabella Padgett, OSU, SURE Science Program, 2021–2022.

Rhea Sellitto, OSU, SURE Science Program, 2020–2021.

Bryna Hymas, OSU, STEM Leaders Program, 2020. Jonah Powell, OSU, 2014–2015. Codey Mathis, OSU, 2013–2015. Gretchen Newberry, OSU, 2010–2012. Niels Garlick, OSU, 2012–2013.

Faculty Research Assistants

Jennifer Bailey Guerrero, Oregon Marbled Murrelet Project, 2017 – 2022. Jonathan Dachenhaus, Oregon Marbled Murrelet Project, 2019–2022. Ethan Woodis, Oregon Marbled Murrelet Project, 2019–2022. Lindsay Adrean, Oregon Marbled Murrelet Project, 2017–2021. Cheryl Horton, Oregon Marbled Murrelet Project, 2017–2018.

UNIVERSITY SERVICE

Departmental

Program Director; Undergraduate Student Exchange Program, Department of Forest Engineering, Resources, and Management, Oregon State University and Department of Biological & Environmental Sciences, Alabama A&M University. 2021–present.

Program Lead; Silviculture, Fire, Forest Health, and Biodiversity Area of Concentration, Department of Forest Engineering, Resources, and Management, Oregon State University. 2021–present.

Member and Chair; Promotion and Tenure Committee, Department of Forest Engineering, Resources, and Management, Oregon State University. 2021—present.

Member; Search Committee for Starker Chair and Assistant Professor of Family Forestry, Department of Forest Engineering, Resources, and Management, Oregon State University. 2021–2023.

College

Member; Forestry Executive Committee, College of Forestry, Oregon State University. 2023-present.

Member; TRIAD Experimental Design and Adaptive Management Strategy Science Technical Group, Elliott State Research Forest Management Planning Committee, College of Forestry, Oregon State University. 2022-present.

Member; Marbled Murrelet Strategy and Experimental Design Science Technical Group, Elliott State Research Forest Management Planning Committee, College of Forestry, Oregon State University. 2022-present.

Guest Presenter; Graduate Student Orientation, College of Forestry, Oregon State University. 2020-present.

Member; Peavy Arboretum Planning Committee, College of Forestry, Oregon State University. 2021-2023.

Member; Research Forests Advisory Committee, College of Forestry, Oregon State University. 2020–2021.

Executive Committee; Forest Biodiversity Research Network, College of Forestry, Oregon State University. 2016–2019.

Member; College Forests Recreation Planning Committee, College of Forestry, Oregon State University. 2014–2015.

University

Member; Faculty Senate, Oregon State University. 2023–present.

Member; Internal Advisory Committee, STEM Leaders Program, Oregon State University. 2022-present.

Member; Laurels Block Grant Program Review Committee, Graduate School, Oregon State University. 2021–2022

Dossier Reviewer; Department of Animal and Rangeland Sciences, Oregon State University. 2021.

Presenter; Faculty Research Showcase, University Honors College, Oregon State University. 2021.

Panel Member; University Honors College, Oregon State University. 2021.

Graduate Council Representative; M.S. thesis of Katherine Arstingstall (FW, OSU). 2020.

Panel Member; University Honors College, Oregon State University. 2017.

Member; Search Committee for Associate Dean for Graduate School, Oregon State University. 2014.

Organizer and Moderator; Student Success Workshop Series, Oregon State University Postdoctoral Association. 2013–2014.

Board Member; Oregon State University Postdoctoral Association. 2013–2014.

Panel Member; Graduate School, Oregon State University. 2013.

SERVICE TO THE PROFESSION

Editorial Boards

Associate Editor, *Ornithology*, 2014–present.

Guest Associate Editor, Frontiers in Ecology and Evolution, 2020–2022.

Guest Subject Matter Editor, Ecological Applications, 2020.

Committees/Working Groups

Member; Meeting Coordinating Committee, Annual Meeting of the American Ornithological Society. 2023–present.

Member; Steering Committee, Wildlife in Managed Forests Program, Oregon Forest Resources Institute. 2022–present.

Invited Participant; Pollinator State of the Science Workshop, U.S. Department of Agriculture/Environmental Protection Agency. 2020–2022.

Member; Pacific Northwest Forest Pollinator Technical Working Group. 2018–present.

Member; Oregon Bee Project Advisory Committee. 2017–present.

Member; Marbled Murrelet Technical Committee, Marine Subcommittee, Pacific Seabird Group. 2017–present.

Mentor; Student Mentor Program, American Ornithological Society. 2022-2023.

Student Presentation Judge; Western Forestry Graduate Research Symposium, Oregon State University. 2021, 2023.

Panel Member; Conference Considerations Workshop, Student Affairs Committee, American Ornithological Society. 2021.

Student Presentation Judge; Research Advances in Fisheries, Wildlife, and Ecology Symposium, Oregon State University. 2020.

Member; Search Committee for Editor-in-Chief for Condor. 2018.

Mentor; Diversity and Inclusion Travel Award Recipient Program, American Ornithological Society. 2017–2018.

Member; Scientific Program Committee, Annual Meeting of the American Ornithological Society. 2016–2017.

Member; Workshops and Training Opportunities Committee, North American Ornithological Conference. 2015–2016.

Elective Councilor; American Ornithological Society. 2014–2017.

Mentor; Capstone Design Project, School of Mechanical, Industrial, and Manufacturing Engineering, Oregon State University. 2013.

Chair; Special Affairs: Historical Committee, American Ornithological Society. 2012–2014.

Member; Student Presentation Awards Committee, North American Ornithological Conference. 2012.

Member; Publications Task Force, American Ornithological Society. 2008–2009.

Member; Early Professionals Committee, American Ornithological Society. 2008–2009.

Co-Chair; Student Affairs Committee, North American Ornithological Conference. 2005–2006.

Member, Chair; Student Affairs Committee, American Ornithological Society. 2004–2007.

Member; Publications Committee, American Ornithological Society. 2004–2011.

Member; Local planning committee for the annual meeting of American Ornithological Society. 2003–2005.

Member; Professional Awards Task Force, American Ornithological Society. 2003–2004.

Symposium/Workshop Organizer

- **Co-Organizer**; "Birds as sentinels for 21st century environmental change in forest ecosystems." Symposium held at the annual meeting of the American Ornithological Society, London, Ontario, Canada. 2023.
- **Co-Organizer**; "The Ecological Importance of Forest to Pollinators." Symposium held at the joint meeting of the Entomological Society of America, the Entomological Society of Canada, and Entomological Society of British Columbia, Vancouver, British Columbia, Canada. 2022.

- **Co-Organizer**; "Forage Fish Workshop: Connecting the Land and Sea." Workshop held at Oregon State University, Newport, OR. 2019.
- **Lead Organizer**; "Forest Pollinator Sampling Workshop." Workshop held at High Desert Museum, Bend, OR. 2019.
- **Co-Organizer**; "Survival Analysis for Avian Ecologists: Moving Beyond Mayfield." Workshop held at annual meeting of the American Ornithological Society, Anchorage, AK. 2019.
- **Co-Organizer**; "Movement, space use, and breeding ecology *Brachyramphus* murrelets." Symposium held at the annual meeting of the American Ornithological Society, Anchorage, AK. 2019.
- **Co-Organizer**; "The Value of Forests to Insect Pollinators." Symposium held at the joint meeting of the Entomological Society of America, the Entomological Society of Canada, and Entomological Society of British Columbia, Vancouver, British Columbia, Canada. 2018.
- **Co-Organizer**; "Sustaining Wildlife Populations in Working Forests: Lessons from the Pacific Northwest." Symposium held at the annual meeting of the Society of American Foresters, Portland, OR. 2018.
- **Lead Organizer**; COMPASS Science Communication Workshop. Workshop organized for students and postdoctoral researchers at Oregon State University, Corvallis, OR. 2018.
- **Lead Organizer**; "Pollinators in Managed Forest Landscapes." Workshop organized at Oregon State University, Corvallis, OR. 2017.
- **Co-Organizer**; "From Fungi to Fledglings: Cavity-nesting Bird Ecology and Conservation Across North America." Symposium held at the annual meeting of the American Ornithological Society, East Lansing, MI. 2017.
- **Co-Organizer**; "Ecology and Evolution of Brood Parasitism. Symposium held at the Australasian Ornithological Society, Perth, West Australia. 2007.
- **Co-Organizer**; "Workshop for New Manuscript Reviewers." Workshop held at the annual meeting of American Ornithological Society, Santa Barbara, CA. 2005.
- **Co-Organizer**; "Ecology and Evolution of Nestling Begging Behavior." Symposium held at the annual meeting of the American Ornithological Society, Quebec City, Quebec, Canada. 2004.

Co-Organizer; "Influence of exotic species on biological diversity." Symposium held at the annual meeting of The Wildlife Society, Bismarck, ND. 2002.

Manuscript Reviews for Peer-Refereed Journals

American Naturalist, Animal Behaviour, Auk, Avian Biology Research, Behavioral Ecology, Behavioral Ecology and Sociobiology, Biodiversity Conservation, Biological Conservation, Biological Journal of the Linnean Society, Biology Letters, Biota Neotropica, Canadian Journal of Zoology, Condor, Conservation Biology, Conservation Science and Practice, Diversity and Distributions, Ecological Applications, Ecology and Evolution, Ecosphere, Environmental Entomology, Ethology, Evolution, Forest Ecology and Management, Frontiers in Ecology and the Environment, Functional Ecology, Great Plains Research, Journal of Animal Ecology, Journal of Applied Ecology, Journal of Avian Biology, Journal of Comparative Psychology, Journal of Ethology, Journal of Evolutionary Biology, Journal of Experimental Biology, Journal of Field Ornithology, Journal of Human-Wildlife Interactions, Journal of Interpretation Research, Journal of Raptor Research, Journal of Wildlife Management, Landscape Ecology, Movement Ecology, Natural Areas Journal, Oecologia, PLoS ONE, The Prairie Naturalist, Proceedings of the Royal Society B: Biological Sciences, Western North American Naturalist, Wildlife Biology, Wildlife Society Bulletin, Wilson Journal of Ornithology.

Proposal Reviews for Competitive Grants

Biotechnology and Biological Sciences Research Council (UK), Iowa Academy of Science

Membership in Professional Societies

American Ornithological Society (1995-present) Animal Behavior Society (2003-present) The Wildlife Society (1999-present)

SERVICE TO THE PUBLIC

Guest Speaker; Environmental Leadership for Youth Program, Department of Fisheries, Wildlife, and Conservation Sciences, Oregon State University. 2022–present.

Co-Founder and Faculty Advisor, <u>Willamette Valley Bird Symposium</u>, Corvallis, Oregon. 2014–2022.

Scientific Consultant; Harvard Museum of Natural History, Harvard University. 2007.

Guest Speaker; Strategies for Ecology Education, Development, and Sustainability (SEEDS) Program, Ecological Society of America. 2006.

Guest Speaker; Kids in Nature (KIM) Program, Museum of Systematics and Ecology, University of California, Santa Barbara. 2005.

Guest Speaker; Kids Do Ecology Program, National Center for Analysis and Synthesis, University of California, Santa Barbara. 2003.

Guest Speaker; Statewide Biology Competition, Kansas State University. 2000–2001.

PROFESSIONAL DEVELOPMENT

- Strengthening Diversity, Equity, Inclusion and Accessibility in Ornithology Workshop, American Ornithological Society, London, Ontario, Canada. 2023.
- **Conference for Antiracist Teaching, Language and Assessment**, College of Liberal Arts, Corvallis, OR Oregon State University. 2021.
- **Confronting Systemic Whiteness in Higher Education Seminar**, Office of Institutional Diversity, Oregon State University, Corvallis, OR. 2021.
- **Search Advocate Training Workshop**, Office of Human Resources, Oregon State University, Corvallis, OR. 2021.
- Promoting Safe Field-Based Research: Prevention of Sexual Harassment and Assault in the Field Workshop, FieldSafe, Oregon State University, Corvallis, OR. 2021.
- **Engaging Students with Kaltura Workshop**, College of Forestry, Oregon State University, Corvallis, OR. 2021.
- **Group discussion on the film** *Picture a Scientist*, College of Forestry, Oregon State University, Corvallis, OR. 2021.
- **Enhancing Diversity & Equity in Course Content Workshop**, College of Forestry, Oregon State University, Corvallis, OR. 2021.
- **Interpersonal Violence Prevention Education Workshop**, Survivor Advocacy & Resource Center, Oregon State University, Corvallis, OR. 2021.
- **Recognizing and Responding to Sexual Harassment Workshop**, Equal Opportunity and Access Program, Oregon State University, Corvallis, OR. 2021.
- Women's Networking in Wood Products and the Mental Load at Work Workshop, College of Forestry, Oregon State University, Corvallis, OR. 2020.
- **Leading During COVID-19: Supporting Women in Higher Education Webinar**, Oregon State University, Corvallis, OR. 2020.

- **Social Justice Education Initiative Workshop**, Office of Institutional Diversity, Oregon State University, Corvallis, OR. 2020.
- **Juggling Motherhood and Ornithology Workshop**, American Ornithological Society, Anchorage, AK. 2019.
- **Animove: Animal Movement Workshop**, Max Planck Institute for Ornithology, Radolfzell, Germany. 2018.
- **Occupancy Modeling Workshop**, Department of Forest Ecosystems and Society, Oregon State University, Corvallis, OR. 2018.
- Oregon Bee School, Department of Horticulture, Oregon State University, Corvallis, OR. 2018.
- **Media Training for Scientists Workshop**, News and Research Communications Office, Oregon State University, Corvallis, OR. 2017.
- **The Bee Course**, American Museum of Natural History, Southwest Research Station, Portal, AZ. 2014.

POPULAR PRESS

- OSU (January 2024) <u>New online guides will aid in identification of native bees in Pacific</u>
 <u>Northwest</u>
- Jefferson Public Radio (April 2023) <u>Bees and clearcuts: OSU study tracks the interaction</u>; see also <u>phys.org</u>, <u>earth.com</u>
- Phys.org <u>Woodpecker that likes burned forest can breed in unburned woods too, research</u> shows. 2023
- OSU College of Forestry Pollinators in the forest. 2022
- Western Forester How is Wildfire Affecting Wildlife Habitat? 2022.
- Living Bird <u>Sounds like home: experimenting with audio to help Marbled Murrelets find</u> <u>prime habitat</u>. 2022.
- Scientific American <u>Bird feeders are good for some species but possible bad for others</u>. 2022.
- Western Forester The latest findings on forest management and pollinator habitat. 2022.

In the Woods Podcast - Pollinators. 2021.

Designated Drinker Show - <u>Jim Rivers, Assistant Professor of Wildlife Ecology at Oregon State University</u>. 2021.

The Revelator - A rare 'bird of two worlds' faces an uncertain future. 2021.

UPI - <u>Songbirds unlikely to become dependent on bird feeders</u>; see also <u>Anthropocene</u> <u>magazine</u>, <u>Treehugger</u>, <u>Popular Science</u>. 2021.

Hakai Magazine - <u>Scientists Are Tricking Birds Into Finding New Homes</u>; see also <u>phys.org</u>, <u>KTVZ.com</u>. 2021.

Oregon Field Guide - Marbled Murrelets; see also opb.org. 2021.

Tillamook County Pioneer - <u>Hampton Lumber Research Project Centers on Improving</u>
Pollinator Habitat with Wildflower Plantings in Clearcuts. 2021.

KLCC, Eugene, OR - Wildfires Open Forests For Wildlife and Research. 2021.

KOIN, Portland, OR - Wildfires Boost Native Female Bee Numbers. 2021.

Oregonian - Oregon Seabird Facing Dual Threats as Forests Burn and Oceans Warm. 2020.

Proteus - Solve for 'x': The Life Variables of a Forest-nesting Seabird. 2020.

Science Daily - <u>Wild Bees Flock to Forested Areas Affected By Severe Fire</u>; see also wildlife.org, iFiberOne. 2019.

Science Daily - Roadmap For Filling the Gaps in Forest Pollinator Research. 2018.

Audubon magazine - <u>From Sea to Tree, Scientists Are Tracking Marbled Murrelets With Rising Precision</u>. 2018.

Woodland magazine - <u>Logging Site Slash Removal May Be Boon For Wild Bees In Managed Forests</u>; see also <u>Science Daily</u>. 2018.

Oregon Publica Broadcasting – <u>Wild Bees May Benefit From Cleaning Up After Clearcuts</u>. 2018.

Oregon State University - Researchers Assess the Health of Forest Pollinators and Their Link to Agriculture. 2018.

Terra Magazine – Flying Under the Radar. 2018.

Hakai Magazine - The Unsolved Mystery of Marbled Murrelet. 2018.

Oregon Public Broadcasting – <u>Severe Wildfires Bring A Welcome Landscape For Native Bees</u>. 2017.

Terra Magazine – Home from the Sea . 2017.

OSU PolliNation Podcast - Seeing the Forest for the Bees. 2017.

OSU Daily Barometer – <u>Seabird Research Creates Opportunities for Ecosystem Understanding</u>. 2017.

KLCC, Eugene, OR – OSU Researchers Study Elusive Threatened Seabird. 2017.

The World – Marbled Murrelet Study Along the Oregon Coast. 2017.

YouTube - <u>Tracking the Oregon Marbled Murrelet with FLIR Thermal</u>. 2017.

Terra Magazine – Threshold for Thriving. 2013.

Science Daily – For Young Birds, Getting Stressed Out Can Be a Good Thing. 2012.