

# SHANNON M. MURPHY

Department of Biological Science  
2050 E. Iliff Ave, Boettcher West  
University of Denver, Denver, CO 80210  
(303) 871-7571  
Shannon.M.Murphy@du.edu  
[smurphlab.weebly.com](http://smurphlab.weebly.com)

## EDUCATION

- 2005 Ph.D. Cornell University  
Ecology and Evolutionary Biology  
Advisor: Paul Feeny      Committee: Monica Geber, Alan Renwick, and Marina Caillaud
- 1997 B.A. *Summa Cum Laude* University of Colorado at Boulder  
Environmental, Population and Organismic Biology Major, Biochemistry Minor  
Advisor: Yan Linhart      Committee: Dave Armstrong, and Bert Covert

## RESEARCH INTERESTS

Plant-insect interactions	Population ecology	Chemical ecology	Community ecology
Multi-trophic interactions	Behavioral ecology	Ecosystem ecology	STEM education

## PROFESSIONAL EXPERIENCE

- 2021-      *Professor*, Department of Biological Sciences, University of Denver.
- 2016-21   *Associate Professor*, Department of Biological Sciences, University of Denver.
- 2010-16   *Assistant Professor*, Department of Biological Sciences, University of Denver.
- 2007-10   *Postdoctoral Scientist* in the laboratory of Dr. John Lill,  
Department of Biological Sciences, The George Washington University.
- 2005-08   *External Fellow* in the laboratory of Dr. Robert Denno, Department of Entomology,  
University of Maryland.
- 2005-08   *National Parks Ecological Research Postdoctoral Fellow*, funded by the Ecological  
Society of America and the National Park Foundation.
- 1997-98   *Professional Research Assistant* for Dr. Donald (Skip) Walker and Dr. Marilyn Walker.  
Institute of Arctic and Alpine Research (INSTAAR) Tundra Ecosystem Analysis and  
Mapping Laboratory (TEAML) at the University of Colorado.
- 1997-98   *Research Assistant* for Dr. Yan Linhart, EPO Biology, University of Colorado.

## AWARDS AND OTHER RECOGNITION

- 2023      **Provost's Award for Excellence in Academic Advising**, University of Denver. Given to a single faculty member across the University.
- 2023      **Faculty Career Champion**, University of Denver. Nominated by graduating students as the faculty member who most impacted their career and professional development.

- 2022 **You Rock! Award**, University of Denver
- 2020 **Excellence in Research Award**, Biological Sciences. Nominee for the College of Natural Sciences and Mathematics, University of Denver.
- 2020 **Distinguished Achievement Award in Teaching**, Entomological Society of America.
- 2020 **Distinguished Achievement Award in Teaching**, North Central Branch of the Entomological Society of America.
- 2019 **Faculty Career Champion**, University of Denver. Nominated by graduating students as the faculty member who most impacted their career and professional development.
- 2018 **Excellence in Service Award**, Biological Sciences. Nominee for the College of Natural Sciences and Mathematics, University of Denver.
- 2018 **Faculty Career Champion**, University of Denver. Nominated by graduating students as the faculty member who most impacted their career and professional development.
- 2015 **Excellence in Service Award**, Biological Sciences. Nominee for the College of Natural Sciences and Mathematics, University of Denver.
- 2013 **Excellence in Research Award**, Biological Sciences. Nominee for the College of Natural Sciences and Mathematics, University of Denver.
- 2012 **Outstanding Junior Faculty Award**, College of Natural Sciences and Mathematics, University of Denver.
- 2005 **Excellence in Teaching Award**, Department of Ecology and Evolutionary Biology, Cornell University. This award is given each year to a single graduate student.
- 2005 **LaMont C. Cole Award**, Department of Ecology and Evolutionary Biology, Cornell University. This award is given each year to the author of the most outstanding published paper written by a graduate student

## PUBLICATIONS

*\*\*undergraduate student co-author, \*graduate student co-author, †postdoc co-author  
§middle-school co-author, # denotes shared last author*

### Peer-Reviewed Journal Articles

71. Horna Lowell, E. S.\* and **S. M. Murphy**. In Press. Neighborhood effects and honey bee foraging behavior. Journal of Apicultural Research.
70. Tanino-Springsteen, M. M.\*, D. K. Vyas, A. Mitchell\*\*, C. Durso, and **S. M. Murphy**. 2024. Investigating the effect of host plant identity on instar number in fall webworm, a common generalist herbivore. Environmental Entomology 53(1): 188–194.
69. Rippel, T. M.\*, A. L. DeCandia, M. A. Collier, C. L. McIntosh, **S. M. Murphy**, and G. M. Wimp. 2024. Habitat characteristics and plant community dynamics impact the diversity, composition, and co-occurrence of sediment fungal communities. Wetlands 44:3.

68. Grenis, K.\*, C. Nufio, G. M. Wimp, and **S. M. Murphy**. 2023. Does artificial light at night alter moth community composition? Philosophical Transactions of the Royal Society B 378: 20220365.
67. Broder, E. D., K. J. Fetrow\*\*, S. M. Murphy, J. L. Hoffman, R. M. Tinghitella. 2023. STEM summer camp for girls positively affects self-efficacy. The American Biology Teacher 85(8): 432–439.
66. Rippel, T. M.\*, A. L. DeCandia, J. Tomasula\*, C. L. McIntosh, **S. M. Murphy**, and G. M. Wimp. 2023. Detritivores and exogenous nitrogen influence litter microbial communities in coastal salt marshes. Marine Ecology Progress Series 716: 17–29.
65. Bieber, B. V.\*, D. K. Vyas, A. M. Koltz, L. A. Burkle, K. S. Bey\*\*, C. Guzinski\*, **S. M. Murphy**#, and M. C. Vidal#. 2023. Increasing prevalence of severe fires change the structure of arthropod communities: Evidence from a meta-analysis. Functional Ecology 37: 2096–2109
64. Barnes, E. E.\* and **S. M. Murphy**. 2023. Bottom-up and top-down pressures mediated competition between two generalist insects. Ecology 104: e3957
63. Bieber, B. V.\*, G. T. Welsh\*, M. C. Vidal\*, W. R. Lehto\*, E. M. Lehmer, R. M. Tinghitella, and **S. M. Murphy**. 2023. Disease Ecology: can plant disease affect human health? National Center for Case Study Teaching in Science. University of Buffalo, State University of New York. <https://www.nsta.org/case-studies>
62. Tomasula, J.\*, B. Maguire\*\*, T. M. Rippel\*, E. Lopez, S. Perez, A. Arab, **S. M. Murphy**, and G. M. Wimp. 2023. Conditions for collapse: chronic nutrient enrichment increases native insect density linked to salt marsh dieback. Biological Conservation 278: 109882.
61. Rippel, T. M.\*, J. Tomasula\*, B. Maguire\*\*, **S. M. Murphy**, and G. M. Wimp. 2022. Species loss and nitrogen pollution alter litter decomposition dynamics in coastal salt marshes. Oecologia 200: 479–490.
60. Jenck, C. S.\*, W. R. Lehto, K. E. Hunnicutt\*, **S. M. Murphy**, T. W. Quinn, E. L. Larson, R. M. Tinghitella. 2022. Genetic divergence among threespine stickleback that differ in nuptial coloration. Journal of Evolutionary Biology 35:934–947.
59. Vyas, D. K.† and **S. M. Murphy**. 2022. Diet mediated immune response to parasitoid attacks on a caterpillar with a broad diet breadth. Ecological Entomology 47: 636–644.
58. Mitchell, R. M., L. A. Brudvig, **S. M. Murphy**, and G. M. Wimp. 2022. COVID resilience inside the research ecosystem. Frontiers in Ecology and the Environment 20(4): 203.
57. Santangelo, J. S., R. W. Ness, B. Cohan, C. R. Fitzpatrick, S. G. Innes, S. Koch, L. S. Miles, S. Munim, P. R. Peres-Neto.... **S. M. Murphy**... and M. T. J. Johnson. 2022. Global urban environmental change drives adaptation in white clover. Science 375: 1275–1281.
56. **Murphy, S. M.**, D. K. Vyas†, A. A. Sher, and K. Grenis\*. 2022. Light pollution affects invasive and native plant traits important to plant competition and herbivorous insects. Biological Invasions 24: 599–602.
55. **Murphy, S. M.** and G. M. Wimp. 2021. Effects of global change on species interactions and biodiversity in natural and managed landscapes. Current Opinion in Insect Science 47: iii–vi.

54. **Murphy, S. M.**, D. K. Vyas<sup>¶</sup>, J. L. Hoffman, C. S. Jenck<sup>\*</sup>, B. A. Washburn<sup>\*</sup>, K. E. Hunnicutt<sup>\*</sup>, A. Davidson<sup>\*</sup>, J. M. Andersen<sup>\*</sup>, R. K. Bennet<sup>\*</sup>, A. Gifford<sup>§</sup>, M. Herrera<sup>§</sup>, B. Lawler<sup>§</sup>, S. Lorman<sup>§</sup>, V. Peacock<sup>§</sup>, L. Walker<sup>§</sup>, E. Watkins<sup>§</sup>, L. Wilkinson<sup>§</sup>, Z. Williams<sup>§</sup>, and R. M. Tinghitella. 2021. Streetlights positively affect the presence of an invasive grass species. Ecology and Evolution 11(15): 10320–10326.
53. Wimp, G. M. and **S. M. Murphy**. 2021. Habitat edges alter arthropod community composition. Landscape Ecology 36: 2849–2861.
52. Rippel, T. M.<sup>\*</sup>, J. Tomasula<sup>\*</sup>, **S. M. Murphy**<sup>#</sup> and G. M. Wimp<sup>#</sup>. 2021. Global change in marine coastal habitats impacts insect populations and communities. Current Opinion in Insect Science 47:1–6.
51. Wimp, G. M., D. Lewis<sup>¶</sup> and **S. M. Murphy**. 2021. Prey identity but not prey quality affects spider performance. Current Research in Insect Science 1: 100013.
50. Wimp, G. M. and **S. M. Murphy**. 2021. Disentangling the effects of primary productivity and host plant traits on arthropod communities. Functional Ecology 35(3): 564–565.
49. Robinson–Castillo, M.<sup>\*\*</sup>, A. Mitchell<sup>\*\*</sup>, A. Fasching<sup>\*\*</sup>, M. C. Vidal, M. Abarca<sup>¶</sup>, G. M. Wimp, B. Bieber<sup>\*</sup>, D. K. Vyas<sup>¶#</sup> and **S. M. Murphy**<sup>#</sup>. 2021. Protocols for rearing fall webworm (*Hyphantria cunea*) in a colony and basic methods for laboratory and experiments. University of Denver Undergraduate Research Journal 2(1): 75–85.
48. **Murphy, S. M.**, L. A. Richards, and G. M. Wimp. 2020. Editorial: Arthropod interactions and responses to disturbance in a changing world. Frontiers in Ecology and Evolution 8:93.
47. Vidal, M. C.<sup>\*</sup>, J. T. Lill, R. J. Marquis, and **S. M. Murphy**. 2020. Geographic variation in performance of a widespread generalist herbivore. Ecological Entomology 45: 617–625.
46. Wilson, J. D.<sup>\*</sup>, S. C. Anner<sup>\*\*</sup>, **S. M. Murphy**<sup>#</sup>, and R. M. Tinghitella<sup>#</sup>. 2020. Consequences of advanced maternal age on reproductive investment of male offspring. Journal of Orthoptera Research 29(1): 71–76. (#=shared last authorship)
45. **Murphy, S. M.**, D. Lewis<sup>¶</sup>, and G. M. Wimp. 2020. Predator population size structure alters consumption of prey from epigeic and grazing foodwebs. Oecologia 192: 791–799.
44. Broder, E. D.<sup>¶</sup>, K. E. Guilbert, R. M. Tinghitella, **S. M. Murphy**, C. Ghalambor, and L. Angeloni. 2019. Authentic science with dissemination increases self-efficacy of middle school students. Integrative and Comparative Biology 59(6): 1497–1508.
43. Vidal, M. C.<sup>\*</sup>, T. Quinn, J. Stireman, R. Tinghitella, and **S. M. Murphy**. 2019. Geography is more important than host plant use for the population genetic structure of a generalist insect herbivore. Molecular Ecology 28: 4317–4334.
42. Wimp, G. M., D. Lewis<sup>¶</sup> and **S. M. Murphy**. 2019. Impacts of nutrient subsidies on salt marsh arthropod food webs: a latitudinal survey. Frontiers in Ecology and Evolution 7: 350.
41. Horna Lowell, E. S.<sup>\*\*</sup>, J. A. Morris, M. C. Vidal<sup>\*</sup>, C. S. Durso, and **S. M. Murphy**. 2019. The effect of conspecific cues on honey bee foraging behavior. Apidologie 50:454–462.

40. **Murphy, S. M.**, M. C. Vidal\*, C. J. Hallagan\*, E. D. Broder<sup>†</sup>, E. E. Barnes\*, E. S. Horna Lowell\*, and J. D. Wilson\*. 2019. Does this title bug (Hemiptera) you? How to write a title that increases your citations. Ecological Entomology 44: 593–600.  
*\*\*\*A top-downloaded paper for Ecological Entomology*
39. Wimp, G. M., L. Ries, D. Lewis<sup>†</sup> and **S. M. Murphy**. 2019. Habitat edge responses of generalist predators is predicted by prey and structural resources. Ecology 100(6): e02662.
38. Grenis, K.\* and **S. M. Murphy**. 2019. Direct and indirect effects of light pollution on the performance of an herbivorous insect. Insect Science 26:770–776.
37. Beshai, R. A.\*\*, E. E. Barnes\*, and **S. M. Murphy**. 2019. The role of enemy-mediated competition in determining the fitness of a generalist herbivore. Southwestern Entomologist 44(1): 69–77.
36. Vidal, M. C.\* and **S. M. Murphy**. 2018. Quantitative measure of fitness in tri-trophic interactions and its influence on diet breadth of insect herbivores. Ecology 99(12): 2681–2691.
35. **Murphy, S. M.**, M. C. Vidal\*, T. P. Smith\*\*, C. J. Hallagan\*, E. D. Broder<sup>†</sup>, D. Rowland\*\*, and L. C. Cepero\*. 2018. Forest fire severity affects host plant quality and insect herbivore damage. Frontiers in Ecology and Evolution 6:135. doi: 10.3389/fevo.2018.00135
34. Koltz, A. M., L. A. Burkle, Y. Pressler, J. E. Dell, M. C. Vidal\*, L. A. Richards and **S. M. Murphy**. 2018. Global change and the importance of fire for the ecology and evolution of insects. Current Opinion in Insect Science 29: 110–116.
33. Lehto, W. R.\*, **S. M. Murphy**, M. C. Vidal\* and R. M. Tinghitella. 2018. Life tables, Darwin’s finches, and the dynamics of small island populations. National Center for Case Study Teaching in Science. University of Buffalo, State University of New York. <https://www.nsta.org/case-studies>
32. Barnes, E. E.\* and **S. M. Murphy**. 2018. Time-lagged intraspecific competition in temporally separated cohorts of a generalist insect. Oecologia 186: 711–718.
31. **Murphy, S. M.**, M. C. Vidal\*, C. J. Hallagan\*, E. E. Barnes\* and E. D. Broder<sup>†</sup>. 2018. A slow-growth high-mortality meta-analysis for insects: A comment on Chen & Chen. Insect Science 25: 352–354.
30. Vidal, M. C.\* and **S. M. Murphy**. 2018. Bottom-up vs. top-down effects on terrestrial insect herbivores: a meta-analysis. Ecology Letters 21: 138–150.  
*\*\*\*A top-downloaded paper for Ecology Letters*
29. Vidal, M. C.\*, K. Grenis\*, W. R. Lehto\*, R. M. Tinghitella and **S. M. Murphy**. 2017. Butterfly hunt: the role of density dependence in Batesian and Müllerian mimicry. National Center for Case Study Teaching in Science. University of Buffalo, State University of New York. <https://www.nsta.org/case-studies>
28. Grenis, K.\*, W. R. Lehto\*, **S. M. Murphy**, M. C. Vidal\* and R. M. Tinghitella. 2017. Animals on Treadmills: critical thinking and public perception of science. National Center for Case Study Teaching in Science. University of Buffalo, State University of New York. <https://www.nsta.org/case-studies>

27. Ries, L., **S. M. Murphy**, G. M. Wimp and R. Fletcher. 2017. Closing persistent gaps in knowledge about edge ecology. Current Landscape Ecology Reports 2:30–41.
26. Barnes, E. E.\*, S. Gosnell\*\*, C. Hallagan\*\*, K. E. Otten\*\*, L. Slayter\*\* and **S. M. Murphy**. 2016. Performance of western tent caterpillar (*Malacosoma californicum*) on two common host plants, including a new host plant record. Journal of the Lepidopterists' Society 70(4): 277–282.
25. **Murphy, S. M.**, A. H. Battocletti\*, R. M. Tinghitella, G. M. Wimp, and L. Ries. 2016. Complex community and evolutionary responses to habitat fragmentation and habitat edges: what can we learn from insect science? Current Opinion in Insect Science 14: 61–65.
24. **Murphy S. M.** and K. J. Loewy\*. 2015. Trade-offs in host choice of an herbivorous insect based on parasitism and larval performance. Oecologia 179: 741–751.
23. Grenis, K.\*, B. Tjossem\*\* and **S. M. Murphy**. 2015. Predation of larval Lepidoptera in habitat fragments varies spatially and temporally but is not affected by light pollution. Journal of Insect Conservation 19: 559–566.
22. **Murphy, S. M.**, J. T. Lill, M. D. Bowers and M. S. Singer. 2014. Enemy-free space for parasitoids. Environmental Entomology 43(6): 1465–1474.
21. Stoepler, T. M., J. T. Lill and **S. M. Murphy**. 2014. Intraplant movement of generalist slug caterpillars (Limacodidae: Lepidoptera): Effects of host plant and light environment. Environmental Entomology 43(6): 1561–1573.
20. **Murphy, S. M.**, T. M. Stoepler, K. Grenis\*, and J. T. Lill. 2014. Host ontogeny determines parasitoid use of a forest caterpillar. Entomologia Experimentalis et Applicata 150: 217–225.
19. Fiorentino, V. L.\*\*, **S. M. Murphy**, T. M. Stoepler and J. T. Lill. 2014. Facilitative effects of group feeding on performance of the saddleback caterpillar, *Acharia stimulea* (Lepidoptera: Limacodidae). Environmental Entomology 43: 131–138.
18. Loewy, K. J.\*, A. Flansburg\*\*, K. Grenis\*, M. Kjeldgaard\*\*, J. McCarty\*\*, L. Montesano\*\*, J. Vernick\*\* and **S. M. Murphy**. 2013. Life history traits and rearing techniques for fall webworm (*Hyphantria cunea* Drury) in Colorado. Journal of the Lepidopterists' Society 67(3): 196–205.
17. Wimp, G. M., **S. M. Murphy**, D. Lewis†, M. R. Douglas\*, R. Ambikapathi\*\*, L'A. Van-Tull\*\*, C. Gratton and R. F. Denno. 2013. Predator hunting mode influences patterns of prey use from grazing and epigeic food webs. Oecologia 171: 505–515.
16. **Murphy, S. M.**, G. M. Wimp, D. Lewis† and R. F. Denno. 2012. Nutrient presses and pulses differentially impact plants, herbivores, detritivores and their natural enemies. PLoS ONE 7(8): e43929.
15. Gates, M. W., J. T. Lill, R. R. Kula, J. E. O'Hara, D. B. Wahl, D. R. Smith, J. B. Whitfield, **S. M. Murphy** and T. M. Stoepler\*. 2012. Review of parasitoid wasps and flies (Hymenoptera, Diptera) associated with Limacodidae (Lepidoptera) in North America, with a key to genera. Proceedings of the Entomological Society of Washington 114(1): 24–110.
14. Stoepler, T. M.\*, J. T. Lill and **S. M. Murphy**. 2011. Cascading effects of host size and host plant species on parasitoid resource allocation. Ecological Entomology 36: 724–735.

13. **Murphy, S. M.**, J. T. Lill and M. E. Epstein. 2011. Natural history of Limacodid moths (Zygaenoidea) in the environs of Washington, DC. Journal of the Lepidopterists' Society 65(3): 137–152.
12. Wimp, G. M., **S. M. Murphy**, D. Lewis<sup>†</sup> and L. Ries. 2011. Do edge responses cascade up or down a multi-trophic foodweb? Ecology Letters 14: 863–870.
11. **Murphy, S. M.** and J. T. Lill. 2010. Winter predation of diapausing cocoons of slug caterpillars (Lepidoptera: Limacodidae). Environmental Entomology 39(6): 1893–1902.
10. Wimp, G. M., **S. M. Murphy**, D. L. Finke, A. F. Huberty and R. F. Denno. 2010. Increased primary production shifts the structure and composition of a terrestrial arthropod community. Ecology 91(11): 3303–3311.
9. Kula, R. R., J. T. Lill, **S. M. Murphy** and T. Stoepler\*. 2010. The first host records for the nearctic species *Triraphis discoideus* (Hymenoptera: Braconidae: Rogadinae). Entomological News 120(4): 380–386.
8. **Murphy, S. M.**, S. M. Leahy\*\*, L. S. Williams\*\* and J. T. Lill. 2010. Stinging spines protect slug caterpillars (Limacodidae) from multiple generalist predators. Behavioral Ecology 21(1): 153–160.
7. **Murphy, S. M.**, J. T. Lill and D. R. Smith. 2009. A scattershot approach to host location: Uncovering the unique life history of the Trigonalyid hyperparasitoid *Orthogonalys pulchella* Cresson. American Entomologist 55(2): 82–87.
6. **Murphy, S. M.** 2008. Notes on *Papilio machaon alaska* (Papilionidae) populations near Fairbanks, AK. Journal of the Lepidopterists' Society 62(2): 80–83.
5. **Murphy, S. M.** 2007. Inconsistent use of host plants by the Alaskan swallowtail butterfly: Adult preference experiments suggest labile oviposition strategy. Ecological Entomology 32: 143–152.
4. **Murphy, S. M.** 2007. The effect of host plant on larval survivorship of the Alaskan swallowtail butterfly (*Papilio machaon alaska*). Entomologia Experimentalis et Applicata 122: 109–115.
3. **Murphy, S. M.** and P. P. Feeny. 2006. Chemical facilitation of a naturally-occurring host shift by *Papilio machaon* butterflies (Papilionidae). Ecological Monographs 76(3): 399–414.
2. **Murphy, S. M.** 2004. Enemy-free space maintains swallowtail butterfly host shift. Proceedings of the National Academy of Sciences 101(52): 18048–18052.
1. **Murphy, S. M.** and Y. B. Linhart. 1999. Comparative morphology of the gastrointestinal tract in the feeding specialist *Sciurus aberti* and several generalist congeners. Journal of Mammalogy 80(4): 1325–1330.

#### Non-Peer Reviewed Articles

2. Galemba, R., K. McRae, **S. M. Murphy**, A. A. Sher, and A. Stanton. 2022. Supporting DU faculty (and staff) caregivers with family-friendly practices. Vice Provost of Faculty Affairs Website.

1. Morris, J. A. and **S. M. Murphy**. 2015. A New Community Garden on the University of Denver Campus. Denver Museum of Nature & Science Reports 2: 6–8.

### Edited Volumes

3. **Murphy, S. M.** and G. M. Wimp. 2021. Global Change Biology issue (13 papers included). Current Opinion in Insect Science.
2. **Murphy, S. M.**, L. A. Richards, and G. M. Wimp. 2020. Special Research Topic “Arthropod Interactions and Responses to Disturbance in a Changing World” (19 papers included). Frontiers in Ecology and Evolution.
1. **Murphy, S. M.** editor. 2015. 26<sup>th</sup> Annual Meeting of the High Country Lepidopterists. Denver Museum of Nature & Science Reports 2: 1–11.

### GRANTS AND FELLOWSHIPS

#### Extramural funding (at DU)

2023–24	Joint Fire Science Program, Bureau of Land Management Awarded with my graduate student Alaina Smith	\$10,000
2020–25	National Science Foundation, Population and Community Ecology. Collaborative grant with Murphy as PI, \$744,343 to Murphy	\$1,529,343
2019–23	National Science Foundation, Population and Community Ecology Program. Travel Grant and Synthesis Workshop, Murphy as PI	\$49,940
2020–21	Boulder Open Space and Mountain Parks	\$5,000
2019–22	National Science Foundation, Research Coordination Networks in Undergraduate Biology Education, Murphy as PI	\$74,975
2021	Entomological Society of America, funding for students from my Insect Ecology class to attend the Annual Meeting in Denver	\$8,400
2018–21	National Oceanic and Atmospheric Administration, New Jersey Sea Grant Consortium. Collaborative grant with Murphy as Co-PI, Murphy portion \$38,535	\$139,615
2017	Entomological Society of America, funding for students from my Insect Ecology class to attend the Annual Meeting in Denver	\$8,400
2013	National Science Foundation, Population and Community Ecology Program. Research Experience for Teachers award, Murphy as PI	\$22,788
2010–16	National Science Foundation, Population and Community Ecology Collaborative grant with Murphy as PI, \$400,000	\$800,000

#### Intramural funding (at DU)

2023	Internationalization grant “Strengthening partnership with the University of Glasgow via Research Collaborations.”	\$9,000
2020–23	Knowledge Bridge pilot funding to create a Global Environmental Change Institute at the University of Denver	\$45,000
2021–22	DU Libraries Information Literacy Grant	\$2,500
2019–21	Faculty Internationalization Grant, University of Denver	\$2,000
2019–20	Knowledge Bridge Incubator Funding	\$5,000
2019–20	NSM Olin Faculty Development Award, University of Denver Co-awarded with Dr. Robin Tinghitella to attend the Alda Center for Communicating Science, Stem immersion program	\$8,220
2019	University of Denver Course Design Institute	\$1,000



2019–20	University of Denver Public Good Bridge Fund “DU SciTech 2019: Building STEM identification and scientific self–efficacy with girls of color in Denver.” Co–awarded with Dr. Robin Tinghitella and Dr. Jennifer Hoffman	\$20,000
2018–20	University of Denver, Professional Research Opportunities for Faculty	\$20,000
2018–20	Knoebel Institute for Healthy Aging Co–awarded with Dr. Robin Tinghitella	\$40,000
2018–19	University of Denver Public Impact Fellow	\$1,000
2017	Internationalization Grant “Biology Strategic Partnership and 311 with University of Western Australia.”	\$23,180
2017	Internationalization Grant “Biology Strategic Partnership and 311 with Lund University.”	\$7,982
2017	Public Good Fund to support “DUSciTech: A STEM summer camp for girls from underrepresented backgrounds at the University of Denver.” Co–awarded with Dr. Robin Tinghitella and Dr. Jennifer Hoffman	\$15,000
2016	Public Good Fund to support “DUSciTech: A STEM summer camp for girls from underrepresented backgrounds at the University of Denver.” Co–awarded with Dr. Robin Tinghitella and Dr. Jennifer Hoffman	\$19,000
2016	Center for Community Engagement and Service Learning, Service Learning course grant	\$750
2016	Center for Community Engagement and Service Learning, High–Impact STEM Community Engagement mini–grant	\$750
2016	NSM Olin Faculty Development Award, University of Denver Co–awarded with Dr. Julie Morris	\$2,817
2016	Center for Community Engagement and Service Learning, High–Impact STEM Education conference grant	\$900
2016	Office of Teaching and Learning “One New Thing” award, University of Denver	\$500
2016	Faculty Internationalization Grant, University of Denver	\$3,815
2015–18	University of Denver Research Post Doctoral Fellows Award Co–awarded with Dr. Robin Tinghitella	\$65,000
2015	NSM Olin Faculty Development Award, University of Denver Co–awarded with Dr. Robin Tinghitella	\$3,390

Graduate and Postdoctoral Funding Prior to Arrival at DU

2005–08	National Parks Ecological Research Fellowship	\$144,000
2004–10	Gordon Conference Travel Grants (x3)	\$2,200
2003	American Museum of Natural History, Theodore Roosevelt Memorial Fund	\$1,000
2001–03	National Science Foundation Doctoral Dissertation Improvement Grant	\$12,000
2001	Explorer’s Club Exploration Fund Grant	\$1,200
2001	Organization for Tropical Studies <i>Tropical Biology</i> course	\$3,000
2001	National Science Foundation Graduate Research Fellowship Travel Grant	\$1,000
2000–04	Cornell University Conference & Travel Grants (x5)	\$2,900
2000–03	Edna Bailey Sussman Fund Grants (x2)	\$8,000
2000–03	Andrew W. Mellon Student Research Grants (x3)	\$2,300
2000–02	Sigma Xi Grants (x3)	\$1,700
1999–04	Department of Ecology and Evolutionary Biology Grants (x4)	\$2,400
1999–02	National Science Foundation Graduate Research Fellowship	\$62,000
1998–99	Cornell Fellowship from the Cornell University Graduate School	\$16,000
1996	Undergraduate Research Opportunities Program Grants (x2)	\$600

Funding to DU Mentees (undergraduate students, graduate students, and postdocs)

Extramural to DU	\$738,104
Intramural from DU	\$213,861

**Total Extramural Funding from the Murphy Lab to DU**

**>\$2.1 million**

## **TEACHING**

---

### Undergraduate Courses

BIOL 2010 General Ecology  
BIOL 3085 Insect Ecology  
BIOL 3095 Global Change Ecology  
BIOL 3700 Plant-Insect Ecology

### Graduate Courses

BIOL 4220 Graduate Seminar: Scientific Writing  
BIOL 4220 Graduate Seminar: Insect Ecology  
BIOL 4220 Graduate Seminar: Introduction to Entomology  
BIOL 4220 Graduate Seminar: Plant-Insect Ecology  
BIOL 4231 Responsible Conduct in Research (research ethics)  
BIOL 4330 Foundations in Literature: Ecology

### Guest Lectures

2021 Mesa State University  
2021,22 Salisbury University

### Professional Development

2023 University of Denver, Teaching for Inclusion and Equity Badge  
2022 University of Denver Office of Teaching and Learning, Neurodiversity Institute,  
2022 University of Denver Office of Teaching and Learning, UDL Your Course: Flexible Assessment  
2022 University of Denver Office of Teaching and Learning, UDL Your Course: Inclusive Classroom Participation  
2021 Center for the Improvement of Mentored Experience in Research  
2020 University of Denver Office of Teaching and Learning, Teaching Online Short Course  
2019 Alda Center for Communicating Science, STEM Immersion program  
2019 University of Denver Office of Teaching and Learning, Course Design Institute  
2018 University of Denver, Public Impact Fellow  
2016 University of Denver Community-Engaged and Service Learning Training Course  
2016 University of Denver Office of Teaching and Learning, Inclusive Excellence training  
2011 University of Denver High Performance Leadership Program

## **RESEARCH ADVISING**

---

### Postdoctoral Scholars

2020-21 Mariana Abarca (co-advised with Dr. Gina Wimp, Georgetown University)  
2019-21 Dhaval Vyas (co-advised with Dr. Erica Larson, University of Denver)  
2016-18 Dale Broder (co-advised with Dr. Robin Tinghitella, University of Denver)  
2010-16 Danny Lewis (co-advised with Dr. Gina Wimp, Georgetown University)

### Graduate Students, Advisor

2025 Kailey Hicks, M. S.  
2025 Emma Sellers, M. S.  
2025 Mykaela Tanino-Springsteen, M.S.

2024 Alaina Smith, M.S.  
2022 Blyssalyn Bieber, M.S.  
2019 Eva Horna Lowell, M.S.  
2019 Jacob Wilson, M.S.  
2019 Claudia Hallagan, M.S.  
2018 Mayra Vidal, Ph.D.  
2017 Elizabeth Barnes, Ph.D.  
2016 Kylee Grenis, Ph.D.  
2013 Katrina Loewy, M.S.

#### Graduate Students, Committee Member

2028 Lacey Conrad, Ph.D.  
2028 Scott Melander, Ph.D.  
2026 Aziz Syammach, Ph.D.  
2025 Gabrielle Welsh, Ph.D.  
2023 Alexander Goetz, Ph.D.  
2022 Ali Alghamdi, Ph.D.  
2022 Amy Byerly, Ph.D.  
2021 Brooke Washburn, Ph.D.  
2020 Kelsie Hunnicutt, Ph.D.  
2020 Dan Swann, M.S.  
2020 Brittany Sprout, M.S.  
2020 Annie Henry, Ph.D.  
2019 Whitley Lehto, Ph.D.  
2018 Gabrielle Gurule–Small, M.S.  
2018 Lisa Clark, M.S.  
2017 Darin Schulte, PhD  
2016 Caitlin Kelly, Ph.D. (University of Colorado)  
2015 Ross Minter, M.S.  
2015 Gordon Kersten, M.S.  
2013 Hisham El Waer, Ph.D.

#### Undergraduate Honors Thesis Students

2024 Max Meyer, B.S.  
2023 Kailey Hicks, B.S.  
2023 Emma Sellers, B.S.  
2023 Bella Shaw, B.S.  
2023 Audrey Mitchell, B.S.  
2019 Andrea Ku, B.S.  
2017 Eva Horna Lowell, B.S.  
2017 Timothy Smith, B.S.  
2017 Ryan Beshai, B.S.  
2017 Dexter Rowland, B.S.  
2016 Lainey Slayter, B. S.  
2014 Bergen Tjossem, B.S.  
2013 Jennifer McCarty, B.S.  
2013 Amy Flansburg, B.S.  
2013 MacKenzie Kjeldgaard, B.S.  
2012 Jennifer Vernick, B. S.

Undergraduate Students at DU: Research experience in my lab (at least 1 quarter or summer)

\*\* Students who have co-authored publications

§ Students who have presented posters or given talks

¶ Students who were funded intramurally (e.g., DU Partnership in Scholarship Grant, DU Summer Research Grant, Pustmueller Fellowship, Emerging Scholars Fellowship, IRISE)

1. Austin Adams
2. Lucy Allen
3. Bruna Barbar
4. Ryan Beshai \*\* § ¶
5. Kiaryce Bey \*\*
6. Allison Brunner
7. Trinity Brush
8. Lincoln Buttrick
9. Da Laina Cameron ¶
10. Corinne Casper
11. Carissa Cherpes § ¶
12. Grace Connor
13. Nicole Cosmany
14. Margot Couraud (Kalamazoo College)
15. Tanisha Crosby-Addipoe
16. Shanika De Silva
17. Meredith DeSouza
18. Becki Dillon
19. Avery Evans
20. Amanda Fasching \*\* ¶
21. Kirsten Fetrow \*\* § ¶
22. Hannah Fine
23. Amy Flansburg\*\* § ¶
24. Maddie Gelinis
25. Sofia Giaritelli
26. Sierra Golbetz
27. Sarah Gosnell\*\*
28. Andrew Haertzen ¶
29. Claudia Hallagan\*\* §
30. Kate Harrison
31. Ashley Hasty § ¶
32. Kailey Hicks §
33. Sarah Hicks
34. Bridget Hill
35. Collette Hong
36. Sophia Kim
37. Eva Horna Lowell \*\* § ¶
38. Veronica Huizar Cabral § ¶
39. Eilidh Keuss
40. MacKenzie Kjeldgaard\*\* § ¶
41. Sarah Kraft (Kalamazoo College)
42. Andrea Ku § ¶
43. Paulina Levy
44. Ellie Mango
45. Mallory Mayeda
46. Jennifer McCarty\*\* § ¶
47. Yorke McGillivray (Colorado State U.)
48. Max Meyer
49. Audrey Mitchell \*\* § ¶
50. Morgann Monahan
51. Lily Montesano\*\*
52. Sara Neuder
53. Gia Ngo
54. Angel Nickels
55. Kayla Nocon
56. Sarah Olson
57. Keelia Otten\*\*
58. Elizabeth Pacheco § ¶
59. Emma Phillips
60. Traci Reese
61. JD Reigrut (Vassar College)
62. Matt Reiman
63. Maelah Robinson-Castillo \*\* § ¶
64. Bailey Rojewski
65. Dexter Rowland \*\* § ¶
66. Kate Sanford
67. Todd Savolt
68. Emma Sellers § ¶
69. Allison Serakos
70. Bella Shaw
71. Norah Schroder ¶
72. Lia Shtereva
73. Katherine Sislow
74. Lainey Slayter\*\* § ¶
75. Maddie Sligh
76. Timothy Smith \*\* § ¶
77. Grace Sommerville § ¶
78. Mykaela Tanino-Springsteen \*\* §
79. Ruby Tedeschi
80. Bergen Tjossem\*\* § ¶
81. Mika Ulmet
82. Jennifer Vernick\*\* § ¶
83. Alexandra Vieth
84. April Vollmer
85. Mick Wahlheim ¶
86. Rachel Wegener
87. Samantha Winsett
88. Mikenna Wolff
89. Morgan Ziegler
90. Gui Zheng ¶

### Undergraduate Students: Natural Sciences and Math Inclusive Excellence Mentor Program

1. Ruth Hollenbeck
2. Abby Horton

### Graduate Students: Research experience in my lab (not including Thesis students above)

1. Amanda Keil – MA in Curriculum and Instruction from the Morgridge College of Education

### High School Students: Research experience in my lab

1. Walker Hecht, Heritage High School
2. James Sheinbaum, Smokey Hill High School
3. Helen Gloege, DSST
4. Max Guerra, George Washington High School
5. Kanshita Dam, Kent Denver

## **INVITED SEMINARS AND CONFERENCE PRESENTATIONS**

### Invited Presentations

- |      |  |
|------|--|
| 2024 | Pioneer Journeys, Panama   |
| 2024 | Pioneer Journeys, Costa Rica   |
| 2023 | University of Glasgow, Glasgow, Scotland   |
| 2022 | International Congress of Entomology, Helsinki, Finland  |
| 2021 | Denver Botanic Gardens, Denver, CO   |
| 2021 | Entomological Society of America, Annual Meeting: Denver, CO   |
| 2021 | Western State College of Colorado, Department of Biology   |
| 2021 | Global Environmental Change Institute, University of Denver<br>(virtual due to COVID-19)                       |
| 2020 | Nocturnal World Workshop, Bristol, UK (virtual due to COVID-19)  |
| 2020 | University of Alabama, Department of Biological Sciences, Tuscaloosa Alabama<br>(virtual due to COVID-19)      |
| 2020 | Colorado Native Plant Society Annual meeting, Golden Colorado<br>(virtual due to COVID-19)                     |
| 2020 | Artificial Light at Night, 6 <sup>th</sup> International Conference, Lleida Spain<br>(virtual due to COVID-19) |
| 2020 | International Congress of Entomology, Helsinki Spain (postponed due to COVID-19)                               |
| 2019 | Colorado State University, Department of Biology   |
| 2019 | University of Denver, Knoebel Institute for Healthy Aging  |
| 2019 | Boulder Garden Club, Boulder Colorado  |
| 2018 | Stockholm University, Department of Zoology, Stockholm Sweden  |
| 2018 | Lund University, Department of Biology, Lund Sweden  |
| 2018 | Colorado State University, Department of Bioagricultural Sciences and Pest<br>Management                       |
| 2018 | Undergraduate Research & Scholarship, University of Denver   |
| 2018 | Hadassah, Denver, CO   |
| 2018 | University of Western Australia, School of Biological Sciences, Perth Australia                                |
| 2018 | University of Colorado, Colorado Springs, Department of Biology  |
| 2018 | Pike's Peak Beekeepers Association   |
| 2017 | Entomological Society of America, Annual Meeting: Denver, CO   |
| 2017 | University of Colorado Denver, Department of Integrative Biology   |
| 2017 | University of Denver, Internationalization Summit  |
| 2017 | University of Denver, Department of Biological Sciences  |
| 2017 | University of Kentucky, Department of Entomology   |
| 2017 | University of Denver, DU Diversity Summit on Inclusive Excellence  |
| 2016 | University of Denver, Center for Community Engagement and Service Learning                                     |

2016 James Cook University, Center for Tropical Biodiversity and Climate Change,  
Queensland Australia

2016 University of Denver, Office of Teaching and Learning

2015 University of Colorado, Department of Ecology and Evolutionary Biology

2015 Purdue University, Department of Entomology

2014 Colorado State University, Department of Bioagricultural Sciences and Pest  
Management

2014 Colorado College, Department of Biology

2013 Entomological Society of America, Annual Meeting: Austin, TX

2013 University of Denver, Wellness Program "Get Growing!" summer series

2013 University of Wyoming, Department of Zoology

2012 Western State College of Colorado, Department of Biology

2011 University of Northern Colorado, School of Biological Sciences

2010 Virginia Tech, Department of Biological Sciences

2009 Cornell University, Department of Ecology and Evolutionary Biology

2009 University of Virginia, Blandy Experimental Farm

2009 University of Denver, Department of Biological Sciences

2009 Smithsonian Environmental Research Center

2008 Entomological Society of America, Annual Meeting: Reno, NV

2008 Smithsonian Institution, National Museum of Natural History

2008–09 Howard Hughes Medical Institute & National Science Foundation, Research  
Experience for Undergraduates Seminar Series, George Washington University

2007 Georgetown University, Department of Biology

2006 University of Maryland, Department of Entomology

2005 The George Washington University, Department of Biological Sciences

2005 Cornell University, Department of Ecology and Evolutionary Biology

2004 Cornell University, Ecology and Evolutionary Biology Graduate Student Recruitment

2003 Eastern Branch of the Entomological Society of America: Harrisburg, PA

#### Contributed Presentations

2023 Entomological Society of America, Annual Meeting: Washington, D.C.

2020 Entomological Society of America, Annual Meeting: Virtual due to COVID-19

2020 Entomological Society of America, North Central Branch Annual Meeting: Oklahoma  
City, OK (cancelled due to COVID-19)

2019 Entomological Society of America, Annual Meeting: St. Louis, MO

2019 Gordon Research Conference on Plant-Herbivore Interactions (poster): Ventura, CA

2018 High Country Lepidopterists' Society, Annual Meeting: Butterfly Pavilion,  
Westminster, CO

2018 Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting:  
University of Colorado Mountain Research Station, CO

2017 Gordon Research Conference on Plant-Herbivore Interactions (poster): Ventura, CA

2016 High Country Lepidopterists' Society, Annual Meeting: Boulder, CO

2016 International Congress of Entomology: Orlando, FL

2016 Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting:  
Rocky Mountain Biological Lab, Gothic, CO

2015 High Country Lepidopterists' Society, Annual Meeting: Denver, CO

2015 Ecological Society of America, Annual Meeting: Baltimore, MD

2015 Front Range Isotope Day: US Geological Survey, Denver, CO

2014 High Country Lepidopterists' Society, Annual Meeting: Denver, CO

2014 Ecological Society of America, Annual Meeting: Sacramento, CA

2013 Gordon Research Conference on Plant-Herbivore Interactions (poster): Ventura, CA

2012 Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting:  
University of Colorado Mountain Research Station, CO

2012 Ecological Society of America, Annual Meeting: Portland, OR

2012 Lepidopterists' Society, Annual Meeting: Denver, CO

- 2011 High Country Lepidopterists' Society, Annual Meeting: Boulder, CO  
 2011 Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting:  
 University of Colorado Mountain Research Station, CO  
 2010 Entomological Society of America, Annual Meeting: San Diego, CA  
 2010 Gordon Research Conference on Plant–Herbivore Interactions (poster): Galveston, TX  
 2009 Ecological Society of America, Annual Meeting: Albuquerque, NM  
 2008 Ecological Society of America, Annual Meeting: Milwaukee, WI  
 2007 Ecological Society of America, Annual Meeting: San Jose, CA  
 2007 Gordon Research Conference on Plant–Herbivore Interactions (poster): Ventura, CA  
 2006 Ecological Society of America, Annual Meeting: Memphis, TN  
 2005 Ecological Society of America, Annual Meeting: Montreal, Canada  
 2005 Society for the Study of Evolution, Annual Meeting: Fairbanks, AK  
 2004 Ecological Society of America, Annual Meeting: Portland, OR  
 2004 Society for the Study of Evolution, Annual Meeting: Fort Collins, CO  
 1999–06 Ecology and Evolutionary Biology Graduate Student Symposium: Cornell University  
 1996 Guild of Rocky Mountain Population Biologists Annual Meeting: Colorado College  
 Baca Campus, Crestone, CO

#### Contributed Presentations by Student Mentees while at DU

*\*\*undergraduate student co-author, \*graduate student co-author*

- 2024 Sellers, E. J.\*, D. K. Vyas, M. M. Tanino–Springsteen\*, C. Guzinski\*, M. C. Vidal, G. M. Wimp, M. S. Comerford, B. Maguire, and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO.  
**\*\*\*Winner of Best Student Presentation**
- 2024 Smith, A. K.\*, A. L. Carper, and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO.
- 2024 Hicks, K.\*, C. A. Guzinski\*, M. M. Tanino–Springsteen\*, and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO.
- 2024 Tanino–Springsteen, M. M.\*, D.K. Vyas, K. Hicks\*, and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO.
- 2024 Tobin, K.\*, **S. M. Murphy**, and A. A. Sher. Front Range Student Ecology Symposium: Fort Collins, CO. (poster)
- 2024 Schroder, N.\*\*, A. Smith\*, and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO. (poster)
- 2024 Wahlheim, M.\*\*, A. Smith\*, and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO. (poster)
- 2024 Mitchell, A.\*\*, D. K. Vyas, and **S. M. Murphy**. Biology 24: Zurich, Switzerland. (poster)
- 2023 Tanino–Springsteen, M. M.\*, D.K. Vyas, K. Hicks\*, and S. M. Murphy. University of Denver, Biology Graduate Symposium.
- 2023 Smith, A.\*, M. Wahlheim\*\*, S. Hicks\*\*, N. Schroder\*\*, and **S. M. Murphy**. International Fire Ecology and Management Congress. Monterey, CA.
- 2023 Sellers, E. J.\*, D. K. Vyas, M. M. Tanino–Springsteen\*, C. Guzinski\*, M. C. Vidal, G. M. Wimp, M. S. Comerford, B. Maguire, and **S. M. Murphy**. Entomological Society of America, Annual Meeting: Washington, D.C.
- 2023 Smith, A. K.\*, A. L. Carper, and **S. M. Murphy**. Entomological Society of America, Annual Meeting: Washington, D.C. (poster)  
**\*\*Winner of Best Graduate Student Poster**
- 2023 Hicks, K.\*, C. A. Guzinski\*, M. M. Tanino–Springsteen\*, and **S. M. Murphy**. Entomological Society of America, Annual Meeting: Washington, D.C. (poster)
- 2023 Meyer, M.\*\* and **S. M. Murphy**. High Country Lepidopterists' Society, Annual Meeting: University of Colorado, Boulder, CO.

- 2022 Mitchell, A.\*\*, D. K. Vyas, and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: University of Colorado Mountain Research Station, CO.
- 2022 Tanino–Springsteen, M.\*\*, D. K. Vyas, C. Durso, A. Mitchell\*\*, and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: University of Colorado Mountain Research Station, CO.
- 2022 Guzinski, C.\*, A. Mitchell\*\*, D. K. Vyas and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: University of Colorado Mountain Research Station, CO.
- 2022 Hasty, H.\*\*, D. K. Vyas, M. Tanino–Springsteen\*\*, and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: University of Colorado Mountain Research Station, CO. (poster)
- 2022 Sellers, E.\*\*, D. K. Vyas, M. Tanino–Springsteen\*\*, and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: University of Colorado Mountain Research Station, CO. (poster)
- 2022 Hicks, K.\*\*, C. Guzinski, M. Tanino–Springsteen\*\*, and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: University of Colorado Mountain Research Station, CO. (poster)
- 2022 Guzinski, C.\*, A. Mitchell\*\*, D. K. Vyas and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO.
- 2022 Bieber, B. V.\*, A. L. Carper and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO.
- 2022 Tanino–Springsteen, M.\*\*, D. K. Vyas and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO.
- 2021 Guzinski, C.\*, A. Mitchell\*\*, D. K. Vyas and **S. M. Murphy**. Entomological Society of America, Annual Meeting: Denver, CO. “  
\*\*\***Winner of Best Graduate Student Presentation**”
- 2021 Bieber, B. V.\*, A. L. Carper and **S. M. Murphy**. Entomological Society of America, Annual Meeting: Denver, CO.
- 2021 Mitchell\*\*, A., D. K. Vyas, and **S. M. Murphy**. Annual Meeting of the Lepidopterists’ Society: Virtual.  
\*\***Winner 2<sup>nd</sup> Best Student Presentation**”
- 2019 Horna Lowell, E. S.\* and **S. M. Murphy**. Entomological Society of America, Annual Meeting: St. Louis, MO.
- 2019 Hallagan, C. J.\*, **S. M. Murphy**, A. M. Smilanich, J. D. Wilson\*, and R. M. Tinghitella. Gordon Research Conference: Ventura, CA. (poster)
- 2019 Horna Lowell, E. S.\* and **S. M. Murphy**. Gordon Research Conference: Ventura, CA. (poster)
- 2019 Wilson, J.\*, **S. M. Murphy**, and R. M. Tinghitella. Gordon Research Conference: Ventura, CA. (poster)
- 2018 Hallagan, C. J.\*, **S. M. Murphy**, A. Smilanich, J. D. Wilson\*, and R. M. Tinghitella. Entomological Society of America, Annual Meeting: Vancouver, BC. (poster)
- 2018 Horna Lowell, E. S.\* and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: University of Colorado Mountain Research Station, CO.
- 2018 Hallagan, C. J.\*, **S. M. Murphy**, J. C. Wilson\*, A. Smilanich, and R. M. Tinghitella. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: University of Colorado Mountain Research Station, CO.
- 2018 Ku, A.\*\*, E. S. Horna Lowell\*, and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: University of Colorado Mountain Research Station, CO. (poster)
- 2018 Horna Lowell\*, E. S., J. A. Morris, M. C. Vidal\*, C. S. Durso and **S. M. Murphy**. International Society for Behavioral Ecology: Minneapolis, MN.
- 2018 Hoffman, J. L., K. J. Fetrow\*\*, D. E. Broder<sup>1</sup>, **S. M. Murphy**, R. M. Tinghitella, and Q. N. Hart. American Astronomical Society, Annual Meeting: Denver, CO. “ (poster)



- 2018 Wilson, J. D.\* , C. J. Hallagan\*, S. **M. Murphy** and R. M. Tinghitella. Front Range Student Ecology Symposium: Fort Collins, CO. "(poster)  
**\*\*Winner of Best Graduate Student Poster.**
- 2018 Hallagan\*, C. J., R. M. Tinghitella and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO.  
**\*\*Winner of 2<sup>nd</sup> place for Best Presentation.**
- 2018 Fetrow, K.\*\* , E. D. Broder<sup>†</sup>, **S. M. Murphy**, R. M. Tinghitella, Q. Hart and J. Hoffman. Front Range Student Ecology Symposium: Fort Collins, CO. (poster)  
**\*\*Winner of 2<sup>nd</sup> place for Best Undergraduate Poster.**
- 2018 Horna Lowell, E. S.\* , J. A. Morris, M. C. Vidal\*, C. S. Durso and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO.
- 2017 Vidal, M. C.\* and **S. M. Murphy**. Entomological Society of America, Annual Meeting: Denver, CO.
- 2017 Hallagan, C. \* , **S. M. Murphy** and R. M. Tinghitella. Entomological Society of America, Annual Meeting: Denver, CO. (poster)  
**\*\*Winner of Second Place for the Student Competition for the President's Prize.**
- 2017 Broder, E. D. <sup>†</sup>, K. Fetrow\*\*, **S. M. Murphy**, R. M. Tinghitella, J. Hoffman and Q. Hart. Entomological Society of America, Annual Meeting: Denver, CO.
- 2017 Fetrow, K.\*\* , E. D. Broder<sup>†</sup>, **S. M. Murphy**, R. M. Tinghitella, Q. Hart and J. Hoffman. Entomological Society of America, Annual Meeting: Denver, CO. (poster)
- 2017 Grenis, K.\* , C. Nufio, G. M. Wimp and **S. M. Murphy**. Entomological Society of America, Annual Meeting: Denver, CO. (Invited)
- 2017 Horna Lowell, E. S.\* , J. A. Morris, M. C. Vidal\*, C. S. Durso and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: University of Colorado Mountain Research Station, CO.
- 2017 Vidal, M.C.\* and **S. M. Murphy**. Society for the Study of Evolution, Annual Meeting: Portland, OR.
- 2017 Vidal, M.C.\* and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO.
- 2017 Horna Lowell, E. S.\*\* , J. A. Morris and **S. M. Murphy**. Front Range Student Ecology Symposium: Fort Collins, CO. (poster)
- 2017 Barnes, E. E.\* and **S. M. Murphy**. Gordon Research Conference: Ventura, CA. (poster)
- 2017 Vidal, M.C.\* and **S. M. Murphy**. Gordon Research Conference: Ventura, CA. (poster)
- 2016 Smith, T.,\*\* L. Cepero\*, and **S. M. Murphy**. High Country Lepidopterists' Society, Annual Meeting: Boulder, CO.
- 2016 Beshai, R.\*\* , E. E. Barnes\*, and **S. M. Murphy**. High Country Lepidopterists' Society, Annual Meeting: Boulder, CO.
- 2016 Barnes, E.E.\* , S. Gosnell\*\*, C. Hallagan\*\*, K. Otten\*\*, L. Slayter\*\* and **S. M. Murphy**. High Country Lepidopterists' Society, Annual Meeting: Boulder, CO.
- 2016 Vidal, M.C.\* and **S. M. Murphy**. High Country Lepidopterists' Society, Annual Meeting: Boulder, CO.
- 2016 Vidal, M. C.\* and **S. M. Murphy**. International Congress of Entomology: Orlando, FL.
- 2016 Vidal, M. C.\* and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: Rocky Mountain Biological Laboratory, Gothic CO.
- 2016 Barnes, E. E.\* and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: Rocky Mountain Biological Laboratory, Gothic CO.
- 2016 Vidal, M. C.\* and **S. M. Murphy**. Annual Meeting of the Lepidopterists' Society: Florissant, CO.
- 2016 Barnes, E. E.\* and **S. M. Murphy**. Annual Meeting of the Lepidopterists' Society: Florissant, CO.  
**\*\*Winner of Best Presentation by a Student.**
- 2015 Grenis, K.\* and **S. M. Murphy**. Entomological Society of America, Annual Meeting: Minneapolis, MN.
- 2015 Cepero, L. C.\* and **S. M. Murphy**. Entomological Society of America, Annual Meeting: Minneapolis, MN. (poster)
- 2015 Vidal, M. C.\* and **S. M. Murphy**. High Country Lepidopterists' Society, Annual Meeting:

- Denver, CO.
- 2015 Grenis, K.\* and **S. M. Murphy**. High Country Lepidopterists' Society, Annual Meeting: Denver, CO.
- 2015 Barnes, E.\* and **S. M. Murphy**. High Country Lepidopterists' Society, Annual Meeting: Denver, CO.
- 2015 Cepero, L. C.\* and **S. M. Murphy**. High Country Lepidopterists' Society, Annual Meeting: Denver, CO.
- 2015 Barnes, E.\* and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: University of Colorado Mountain Research Station, CO.
- 2015 Grenis, K.\* and **S. M. Murphy**. Guild of Rocky Mountain Ecologists and Evolutionary Biologists, Annual Meeting: University of Colorado Mountain Research Station, CO.
- 2015 Barnes, E.\* and **S. M. Murphy**. Ecological Society of America, Annual Meeting: Baltimore, MD. (poster)
- 2015 Hayes, M. E.\*\*, G. M. Wimp, D. Lewis<sup>¶</sup> and **S. M. Murphy**. Ecological Society of America, Annual Meeting: Baltimore, MD. (poster)
- 2014 Grenis, K.\* and **S. M. Murphy**. Ecological Society of America, Annual Meeting: Sacramento, CA.
- 2013 Kuras, E. R.\*\*, **S. M. Murphy**, D. Lewis<sup>¶</sup> and G. M. Wimp. Ecological Society of America, Annual Meeting: Minneapolis, MN.
- \*\*Winner of Best Presentation by an Undergraduate Student.**
- 2012 Grenis, K.\* and **S. M. Murphy**. High Country Lepidopterists' Society, Annual Meeting:
- 2012 Grenis, K.\* and **S. M. Murphy**. Ecological Society of America, Annual Meeting: Portland, OR.
- 2012 Flansburg, A.\*\*, K. J. Loewy\* and **S. M. Murphy**. Ecological Society of America, Annual Meeting: Portland, OR. (poster)
- 2012 Kjeldgaard, M.\*\*, K. J. Loewy\* and **S. M. Murphy**. Ecological Society of America, Annual Meeting: Portland, OR. (poster)
- 2012 Loewy, K. J.\* and **S. M. Murphy**. Ecological Society of America, Annual Meeting: Portland, OR.
- 2012 Grenis, K.\* and **S. M. Murphy**. Combined Annual Meeting of the Lepidopterists' Society and the Societas Europaea Lepidopterologica: Denver, CO.
- 2012 Kjeldgaard, M.\*\*, K. J. Loewy\* and **S. M. Murphy**. Combined Annual Meeting of the Lepidopterists' Society and the Societas Europaea Lepidopterologica: Denver, CO.
- 2012 Loewy, K. J.\* and **S. M. Murphy**. Combined Annual Meeting of the Lepidopterists' Society and the Societas Europaea Lepidopterologica: Denver, CO.
- 2012 Lill, J. T., T. M. Stoepler\* and **S. M. Murphy**. Eastern Branch of the Entomological Society of America, Annual Meeting: Hartford, CT.
- 2011 Loewy, K. J.\* and **S. M. Murphy**. High Country Lepidopterists' Society, Annual Meeting: Boulder, CO.
- 2011 Grenis, K.\* and **S. M. Murphy**. High Country Lepidopterists' Society, Annual Meeting: Boulder, CO.

## **SERVICE**

---

### Journal Editorial Board

- 2024– *Ecological Entomology*, Editor in Chief
- 2023–24 *Ecological Entomology*, Reviews Editor
- 2018– *Environmental Entomology*, Subject Editor
- 2014–23 *Ecological Entomology*, Associate Editor

### Guest Editor

- 2022–23 *Ecology* – Invited Editor for issue on COVID caregivers 2023
- 2019–21 *Current Opinion in Insect Science* – Invited Editor for issue on Global Change 2021

2017–19 *Frontiers in Ecology and Evolution* – Special Research Topic “Arthropod Interactions and Responses to Disturbance in a Changing World”

Review of Manuscripts (> 120 papers reviewed)

American Naturalist	Insects
Arthropod–Plant Interactions	Invertebrate Survival Journal
Austral Ecology	Journal of Animal Ecology
Australian Journal of Entomology	Journal of Applied Ecology
Basic and Applied Ecology	Journal of Chemical Ecology
Behavioral Ecology	Journal of Ecology
Biological Conservation	Journal of Insect Behavior
Biological Journal of the Linnean Society	Journal of the Lepidopterists’ Society
BMC Ecology	Landscape Ecology
Botany	Naturwissenschaften
Current Opinion in Insect Science	New Phytologist
Ecography	Oecologia
Ecological Entomology	Oikos
Ecology	Pan–Pacific Entomologist
Ecology Letters	PLoS ONE
Ecosphere	Proceedings of the Royal Society B
Entomologia Experimentalis et Applicata	Scientific Reports
Environmental Entomology	Systematics and Biodiversity
Estuaries and Coasts	The Canadian Entomologist
Ethology	The Great Lakes Entomologist
FACETS	Trends in Ecology and Evolution
Functional Ecology	Urban Ecosystems
Global Change Biology	Wetlands
Insect Science	Zoology

Society Service

2020	EEB Mentor Match, mentor volunteer
2019	Judge for Student Presentation awards at the Entomological Society of America Annual Meeting: St. Louis MO
2018–	Chairperson for the Ron Leuschner Memorial Fund for Research on the Lepidoptera, Lepidopterists’ Society
2017	Expert Reviewer for McGraw–Hill Publishing
2010	Expert Reviewer for Sinauer Associates Publishing
2008–15	Judge for Buell and Braun awards at the Ecological Society of America Annual Meetings: Milwaukee WI, Albuquerque NM, Portland OR, Sacramento CA, Baltimore MD

Review of Proposals (>480 proposals reviewed)

2024	External Referee, NSF Population and Community Ecology
2023	Panelist, NSF GRFP
2022	External Referee, NSF Population and Community Ecology
2022	Panelist, NSF GRFP
2021	Panelist, NSF Population and Community Ecology
2021	Panelist, NSF Undergraduate Biology Education
2020	External Referee, NSF Population and Community Ecology
2020	Panelist, University of Denver PROF
2020	Panelist, NSF Graduate Research Fellowship Program, Ecology
2019	External Referee, NSF IOS
2018–	Ron Leuschner Memorial Fund for Research on the Lepidoptera, Lepidopterists’

- Society
- 2017 External Referee, Netherlands Organization for Scientific Research (Dutch Research Council), Council for Earth and Life Sciences
  - 2015 NSF, Georgia Coastal Ecosystems LTER site review, Sapelo Island, GA
  - 2015 External Referee, Netherlands Organization for Scientific Research (Dutch Research Council), Council for Earth and Life Sciences
  - 2015 Panelist, American Philosophical Society, Lewis and Clark Fund
  - 2014 Panelist, University of Denver PROF
  - 2014 External Referee, NSF Population and Community Ecology
  - 2013 Panelist, NSF Population and Community Ecology
  - 2012–13 Panelist, American Philosophical Society, Lewis and Clark Fund
  - 2012 External Referee, California Sea Grant
  - 2012 Panelist, NSF Population and Community Ecology
  - 2011 External Referee, Graduate School for Production Ecology & Resource Conservation, Wageningen University, the Netherlands
  - 2011 External Referee, California Sea Grant
  - 2010 Panelist, NSF Evolutionary Processes Cluster
  - 2010 Panelist, NSF Doctoral Dissertation Improvement Grant (DDIG)
  - 2010 Panelist, NSF East Asia & Pacific Summer Institutes (EAPSI) Program, Biological Sciences
  - 2010 Panelist, Department of Defense Science, Mathematics & Research for Transformation (SMART) Scholarship Program, Biosciences
  - 2009–10 External Referee for 4 NSF Panels: Ecology, Ecosystems, Evolutionary Processes and Long-Term Research in Environmental Biology
  - 2009–10 Panelist, NSF Graduate Research Fellowship Program, Ecology (2 times)
  - 2008 External Referee, Netherlands Organization for Scientific Research (Dutch Research Council), Council for Earth and Life Sciences
  - 2002–04 Panelist, Andrew W. Mellon Fund, Cornell University
  - 2002–04 Panelist, Kieckhefer Adirondack Fellowship, Cornell University

#### Departmental and University Service

- 2022– Faculty Mentoring Leaders Community of Practice
- 2022– Biology By-laws working group
- 2021– NSF ADVANCE grant to DU, DU Develop working group
- 2021– Library Liaison Advisory Group
- 2017– Chair of the Global Scholars Biology program with University of Western Australia
- 2016– Chair of the Global Scholars Biology program with Lund University, Sweden
- 2015– Moras and Erne Shubert Graduate Fellowship Fund Chair or Reviewer
- 2014– Co-Director of Graduate Studies, Department of Biological Sciences, University of Denver
- 2011– Graduate Committee, Department of Biological Sciences, University of Denver
- 2011– Student recruitment (Fridays@DU, Pioneer Days)
- 2021–22 Promotion committee chair
- 2020 University of Denver Biophysical Society Student Chapter, invited speaker on Responsible Conduct in Research
- 2018–20 Chancellor’s Community and Values Initiative
- 2018–20 Graduate Student Experience Committee
- 2018 University of Denver Library Pollinator Sustainability Panelist
- 2018 Botanical Bee Bonanza
- 2016 Co-Search Chair, Equity in STEM Postdoctoral Fellowship
- 2015–17 Co-Director of the University of Denver Greenhouse
- 2012–14 College of Natural Sciences and Mathematics, Graduate Council Representative
- 2010–12 Departmental Seminar coordinator

## COMMUNITY OUTREACH

---

- 2016– Co-Director of DU SciTech: A STEM summer camp each summer for 16 middle-school girls from underrepresented backgrounds held at the University of Denver; I am involved in all aspects of organizing, designing, and implementing the camp. Here is a video of the camp from 2023:  
<https://www.youtube.com/watch?v=cyuf1gruZII>
- 2023 Asbury Elementary, Denver Public Schools – Classroom presentation for ~60 1<sup>st</sup> grade students to enhance science curriculum on bee nesting habitat
- 2023 Asbury Elementary, Denver Public Schools – Demonstration for ~65 Kindergarteners to enhance science curriculum on trees
- 2023 Asbury Elementary, Denver Public Schools – Classroom presentation for ~65 Kindergarteners to enhance science curriculum on herbivore choice testing
- 2022 Downtown Denver Expeditionary School – Classroom presentation for ~40 Kindergarteners to enhance science curriculum on herbivore choice testing
- 2022 Asbury Elementary, Denver Public Schools – Classroom presentation for ~65 Kindergarteners to enhance science curriculum on herbivore choice testing
- 2021 Asbury Elementary, Denver Public Schools – Classroom presentation for ~60 2<sup>nd</sup> grade students to enhance science curriculum on pollination
- 2021 Asbury Elementary, Denver Public Schools – Virtual online learning activity for ~130 students to enhance science curriculum on spiders (COVID inspired at-home activity)
- 2020 Asbury Elementary, Denver Public Schools – Virtual online learning activity for ~130 Kindergarten and 1<sup>st</sup> grade students to enhance science curriculum on animal behavior (COVID inspired at-home activity)
- 2020 Asbury Elementary, Denver Public Schools – Classroom presentation for ~60 2<sup>nd</sup> grade students to enhance science curriculum on pollination
- 2019 Asbury Elementary, Denver Public Schools – Classroom presentation for ~67 Kindergarteners to enhance science curriculum on how trees defend themselves
- 2019 Asbury Elementary, Denver Public Schools – Classroom presentation for ~65 Kindergarteners to enhance science curriculum on herbivore choice testing
- 2018–22 Skype a Scientist
- 2015–18 RU SciTech Science and Technology Summer Camp for Girls, hosted by Regis University. Led activities and workshops for 16 girls for 2 days of the camp.
- 2016 Bella Romero Science Club, Greeley Colorado. Helped the Bella Romero Science Club with their guppy science experiments.
- 2015 Conference Chair, Annual Meeting of the High Country Lepidopterists Society. I organized the 26<sup>th</sup> Annual Meeting, hosted by the University of Denver. Participants included members of the general public as well as academics from the University of Colorado, Colorado State University, Metro State University, the Air Force Academy, the Butterfly Pavilion and the Denver Museum of Nature and Science.
- 2015 Girls Exploring Science, Technology, Engineering & Math (GESTEM) volunteer.
- 2014 Asbury Elementary, Denver Public Schools – Classroom presentation for ~25 4<sup>th</sup> graders to enhance science curriculum on predator-prey interactions
- 2013 National Science Foundation, Research Experience for Teachers. Two elementary school teachers from Denver Public Schools worked in my lab for 3 months to learn more about how scientists conduct biological research.
- 2013 DU Day of Action – Munroe Elementary School Visit to the University of Denver, workshop leader.
- 2012 Classroom presentations for >100 1<sup>st</sup> graders to enhance science curriculum on insect life cycles at Tollgate Elementary School, part of Aurora Public Schools, Colorado.
- 2012 College Aspirations Readiness & Empowerment (CARE) for Black Adolescent Girls

- workshop leader. Sponsored by Denver Public Good Grant, University of Denver and Cherry Creek Public School System.
- 2011–12 Denver Public Schools/University of Denver Urban Partnership for Improving Elementary Science. Taught short courses on Ecology to elementary grade teachers from the Denver Public Schools. This summer institute provides elementary school teachers with the science content that they need to successfully implement an inquiry-based science curriculum in their classrooms.
- 2008–09 Classroom presentations for >500 2<sup>nd</sup> graders to enhance science curriculum on insect life cycles at Rosemary Hills Elementary, Garrett Park Elementary and Forest Knolls Elementary, part of Montgomery County Public Schools, Maryland

## **PROFESSIONAL SOCIETIES**

---

### Executive Council At-Large Member

2016–19 Lepidopterists' Society (international society, elected position)

### Society Member

American Association for the Advancement of Science  
 American Association of University Women  
 Colorado Native Plant Society  
 Ecological Society of America  
 Entomological Society of America  
 Lepidopterists' Society  
 Sigma Xi  
 Southwestern Association of Naturalists

## **RESEARCH HIGHLIGHTED IN TEXTBOOKS**

---

Ecology: Concepts and Applications, 8<sup>th</sup> Edition by Molles and Sher (2018)

Murphy et al. 2010, Stoepler et al. 2011, and Murphy et al. 2014 (pp. 282–283)

Insect Ecology: Behavior, Populations and Communities, by Price et al. (2011)

Murphy 2004, Murphy and Feeny 2006 (p. 170)

## **MEDIA**

---

- 2023 Garden Futurist podcast by Pacific Horticulture, <https://pacifichorticulture.org/articles/hit-the-lights-the-impacts-of-artificial-light-on-ecosystems-with-garden-futurist-shannon-murphy/>
- 2022 Discover Magazine, <https://www.discovermagazine.com/the-sciences/how-to-become-a-scientist>
- 2021 Scientific American, research featured in “Invasive cheatgrass spreads under city lights” <https://www.scientificamerican.com/article/invasive-cheatgrass-spreads-under-city-lights/?fbclid=IwAR1DKqDJWVEXx8F-LdG6Dzb18-7KTJvYt91QOhLAqITYsojqjHYGSR9Cji0>

- 2021 Science News for Kids, research featured in “Cheatgrass thrives on the well-lit urban night scene” <https://www.scientificamerican.com/article/invasive-cheatgrass-spreads-under-city-lights/?fbclid=IwAR1DKqDJWVEXx8F-LdG6Dzb18-7KTJvYt91QOhLAqITYsojqjHYGSR9Cji0>
- 2021 Frontiers in Ecology and the Environment, research featured in “City streetlights boost incidence of invasive grass” <https://www.scientificamerican.com/article/invasive-cheatgrass-spreads-under-city-lights/?fbclid=IwAR1DKqDJWVEXx8F-LdG6Dzb18-7KTJvYt91QOhLAqITYsojqjHYGSR9Cji0>
- 2018 Denver ABC 7, The Denver Channel. Featured expert in “Wolf spiders are popping up in Neighborhoods around the Denver metro area.” <https://www.thedenverchannel.com/news/local-news/wolf-spiders-are-popping-up-in-neighborhoods-around-the-denver-metro-area>

### **FIELD EXPERIENCE**

United States: Alaska, Colorado, Delaware, District of Columbia, Florida, Maine, Maryland, Massachusetts, New Hampshire, New Jersey, New York, North Carolina, Rhode Island, Virginia, Washington  
International: Australia, Canada (British Columbia, Yukon Territory), Costa Rica, Panama

### **LANGUAGES**

English (native), French (proficient)