

NUTRITIONAL ECOLOGY WORKING GROUP

MESSAGE FROM THE CHAIR

Hello everyone,

It is my pleasure to open this year's statement on behalf of the Nutritional Ecology Working Group. First and foremost, I hope everyone is doing well in these challenging times and that the cuts we are seeing in the fields we love and rely on are having a minimal impact on your lives. Additionally, I hope each of you had productive field seasons and semesters since our last newsletter. Thank you all for your continued support of our working group! I am surrounded by an amazing group of board members who work tirelessly to provide members of TWS with high-quality wildlife nutrition information and opportunities. Their expertise and willingness to serve in these roles continue to push this working group forward and enhance the understanding of nutritional ecology throughout this amazing organization.

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Our winter webinar series recently concluded, which was filled with a fantastic group of 5 speakers. For those of you who were unable to attend these talks, you can find the recordings on NEWG's website. Our next series will begin this upcoming winter, and we would love to hear from our members regarding any topics that they would like to see covered. Additionally, if you are interested in presenting in this series, please feel free to reach out to us at the NEWG email. We are always looking to showcase new and exciting work that our members are conducting around the world.

THE WILDLIFE SOCIETY



NUTRITIONAL ECOLOGY WORKING GROUP

... understanding wildlife populations from the bottom-up.

We are excited to announce that The Wildlife Professional special issue on nutritional ecology is coming out next month, in print, and is currently available online through the members' portal. Members of NEWG put together 5 articles based on input from the membership, from various professionals in the field. Additionally, we have secured accompanying open access to articles associated with the special issue through Wiley.

MESSAGE FROM THE CHAIR

We hope this special issue will further promote our field and allow us to reach a wider audience about the importance of nutritional ecology in wildlife management. Thank you to all the authors who worked diligently to put these articles together.

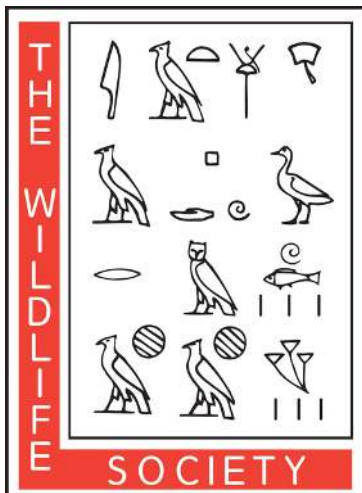
Earlier in the year, the board submitted a proposal for a TWS symposium, "Integration of Nutrition into On-The-Ground Management: Potential and Challenges", at the 32nd annual TWS conference in Edmonton, Alberta. We are excited to announce that our proposal was accepted, and we have put together a great slate of presentations from biologists across Canada and the United States. In this symposium, we will bring together speakers with expertise in developing applied research in nutritional ecology to discuss examples of implementing research into on-the-ground management, identifying findings that can be incorporated into management actions, and highlighting the barriers that often exist at the agency level in administering these findings. Given the frequency our members have brought forth this topic, we are anticipating high interest in this symposium. We are confident that attendees will leave with valuable insights on how to effectively integrate nutrition-focused research into the systems they study.

The NEWG Skills Workshop will be taking place in Palmer, Alaska, from June 10-12th, with an optional half day on the 13th. We thank everyone who registered to attend the workshop and are confident that y'all will have an informative and great time. This workshop continues to receive positive feedback from those who attend, and we expect this year's event to be no different. If you haven't attended one of these events in the past, please consider it in the future. The workshop is a great opportunity to strengthen your understanding of nutritional ecology and proper sampling techniques.

Finally, this fall the Nutritional Ecology Working Group will hold elections for chair-elect, all 5 board members at large, treasurer, newsletter editor and outreach/communications. If you or anyone you know is interested in these positions, please contact myself or any of our board members. Serving on this board is a great way to help advance and help generate further interest in the field of nutritional ecology. Again, thank you for your continued support and please feel free to contact me with any questions you may have regarding the working group.

Marcus Blum
Chair, Nutritional Ecology Working Group

The Wildlife Society 32nd Annual Conference



This year's Conference will be located in Edmonton, Alberta, Canada from October 5-9, 2025.

Call for Abstracts submission ends May 11, 2025. Additionally, the North American Society for Bat Research (NASBR) will hold their Conference, the 53rd North American Symposium on Bat Research in Edmonton, Alberta, Canada from October 8-11, 2025.

Don't forget to come see us at the Symposium: **Integration of Nutrition into On-The-Ground Management: Potential and Challenges**. This is going to be an exciting look at how the role of nutrition can play in applied management. See the next page for more information. Additionally, please click [here](#) for more information regarding the Annual Conference.

Board Members

Chair: Marcus Blum

Chair-elect: Dan Thompson

Past Chair: VACANT

Secretary: Katey Huggler

Treasurer: Brittany Wagler

Outreach & Communications Officer:
Yasaman Shakeri

Newsletter Editor: Mary Hiney

Board Member: Rachel Cook

Board Member: Colter Chitwood

Board Member: Jocelyn Biro

Board Member: Jacob Dykes

Board Member: Levi Heffelfinger

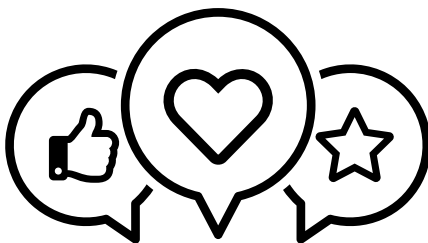
Upcoming Elections

Elections will be open this fall for the following positions:

Chair-elect

5 Board Members at Large
Treasurer

Newsletter Editor
Outreach/Communications



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Symposium – TWS Annual Conference in Edmonton, Alberta. October 5-9, 2025

Integration of Nutrition into On-The-Ground Management:
Potential and Challenges

The Nutritional Ecology Working Group of TWS is excited to sponsor the symposium integrating nutrition into wildlife management. Wildlife nutrition plays a fundamental role in population performance and ecosystem balance. This symposium will explore the critical, often overlooked, role of nutrition in applied management. The following experts will present nutritional ecology research across diverse taxa and ecosystems, demonstrating the potential to inform management and the challenges of on-the-ground application.

Tony Wasley – The Wildlife Management Institute: Challenges of integrating nutrition within state agency management decisions

David Hewitt – Texas A&M Kingsville: Nutritionally induced density independence in cervids: Implications for management

Anthony Pagano – United States Geological Survey Alaska Science Center: Bear nutrition with implications for management

Chris Guglielmo – University of Western Ontario: Fatty acid nutrition in migratory birds

Rachel Vanausdall – Colorado State University: Energy availability for sandhill cranes during spring and autumn migration in the San Luis Valley, Colorado

Ryan Long – University of Idaho: Integrative Approaches for Predicting Herbivore Responses to Nutritional Resources

John Crouse – Alaska Department of Fish and Game: Integrating physiology and nutrition into moose research and management

Jennifer Smith – Texas A&M Kingsville: Nutritional limitation of white-winged dove reproduction

Brian Davis – Mississippi State University: Food for Thought: Meeting foraging and other habitat needs of nonbreeding waterfowl in southern United States

Jeff Werner – British Columbia Ministry of Water, Land, and Resource Stewardship: Moose forage dynamics in natural and converted landscapes

TWS TRAVEL AWARD WINNERS

Maire O'Malley

Largely due to financial support from NEWG, I was able to attend TWS 2024 in Baltimore and had a wonderful time. I enjoyed meeting new wildlife and nutritional ecology enthusiasts, even outside of my primary field of primatology, and I saw familiar faces from TWS 2023. I especially enjoyed the symposium NEWG hosted on nutritional geometry; it was fascinating to learn about how the framework is applicable to diverse taxa (primates, hares, and moose were a few species I remember from the symposium). Lastly, I presented a poster on my master's thesis studying lemur nutritional ecology and it was a great opportunity to practice my presentation skills as a young academic and to receive personal feedback, especially since I'm in the feasibility phase of my dissertation. BIG thanks again to NEWG; I really enjoy being a member of this scientific community.



Photo courtesy of Maire O'Malley

TWS TRAVEL AWARD WINNERS

Calvin C. Ellis

Thanks to the Nutritional Ecology Working Group Travel Scholarship, I was able to attend The Wildlife Society's Annual Conference in Baltimore, Maryland this past year. During my time at the conference, I was able to network with fellow wildlife professionals and discuss exciting ongoing research. While there, I presented an oral presentation and a student research-in-progress poster which both incorporated aspects of nutritional ecology. Furthermore, I attended the Nutritional Ecology Working Group Meeting where I joined the Scholarship Committee and furthered my involvement with the working group. I am grateful for the assistance from the working group to be able to attend the annual meeting this past year and look forward to continuing my engagement with the working group!



Photo courtesy of Calvin C. Ellis

TWS TRAVEL AWARD WINNERS

Juliana Balluffi-Fry

As a recipient of the TWS Travel Award it was a great pleasure to be able to attend last year's TWS meeting in Baltimore. It was particularly special that I was able to attend the meeting because I helped organize that year's NEWG symposium, "Dietary balancing acts: The nutritional geometry of feeding decisions in wildlife ecology". I was very inspired meeting so many researchers who's work I have been reading for years. Baltimore had a lot of history to offer and the aquarium outing was a particular highlight of the trip!

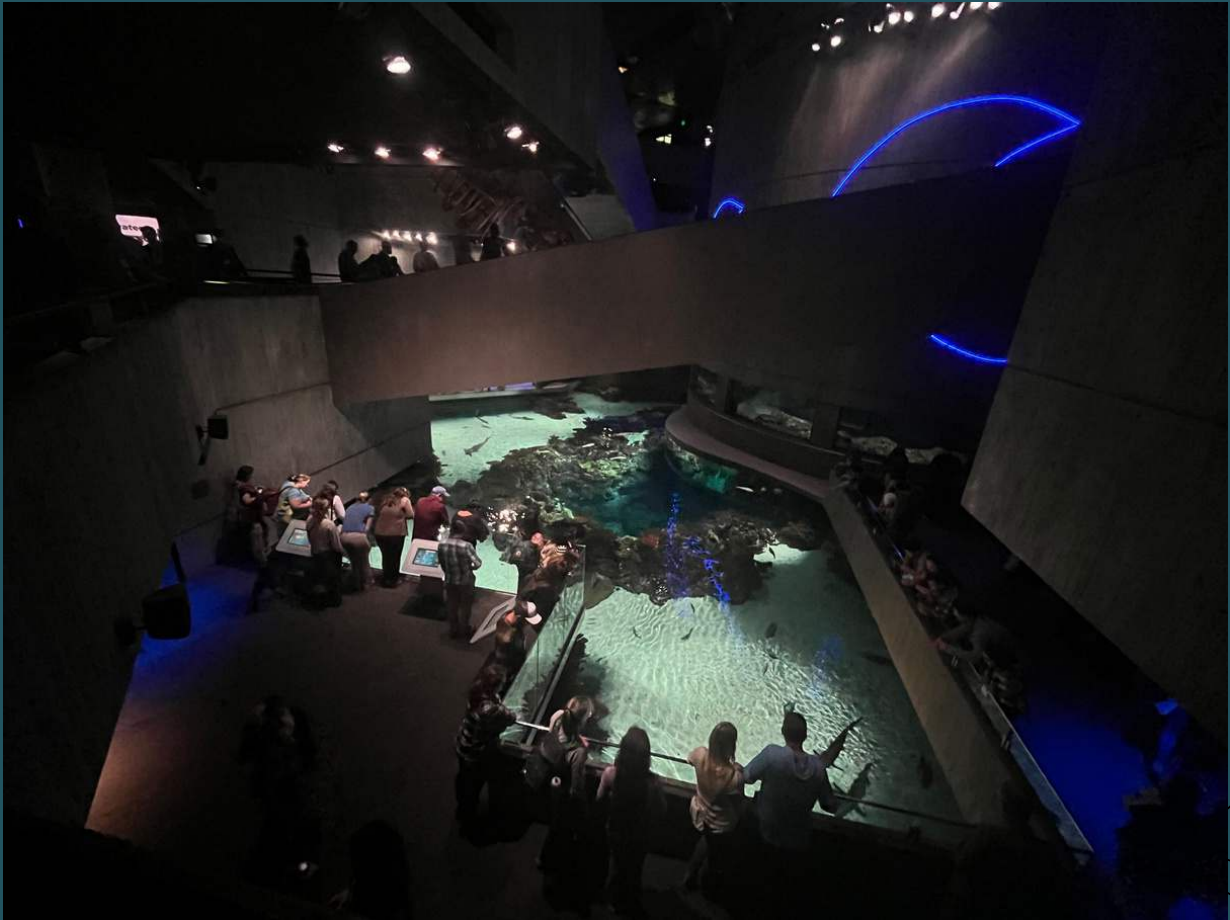


Photo courtesy of Juliana Balluffi-Fry

The Wildlife Professional – **Special focus: Nutritional** **Ecology**

The upcoming May/June issue of The Wildlife Professional has a special focus on Nutritional Ecology. Members of the Nutritional Ecology Working Group (NEWG) suggested topics for a special issue at the annual meeting in Louisville in 2023, and the NEWG board used those suggestions to find subject matter experts within our field to write articles. Jen Merems is the Nutritional Ecology Working Group representative on the editorial board of The Wildlife Professional, and Jen facilitated the articles for this special focus. We thank all the authors that contributed to the special focus on nutritional ecology.

Digesting Nutritional Ecology - The past, present and future of wildlife nutritional ecology. Daniel P. Thompson, Kristin A. Denryter, and Scott McWilliams

Nutritional Nuggets – Integrating nutritional ecology into wildlife management. Jerrey L. Beck, Brogan Holcombe, Marcella J. Kelly, Rachel Cook and John Cook

Ecological Energetics - A mechanistic approach to wildlife conservation. Bryan Spencer, Ryan Martin and Ryan Long

The Great Integrator and the Great Indicator – Nutritional condition links past, present and future. Thomas R. Stephenson and Kevin L. Monteith

Captive Clues – Studying nutrition in controlled settings increases understanding of free-ranging wildlife. Rachel Cook, Charles Robbins, Lisa Shipley and John Cook



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Virtual Issue: Nutritional **Ecology**

Knowledge about food availability and quality, metabolism, and nutritional requirements provides valuable insight into the health of wildlife populations; however, incorporating nutritional ecology into wildlife management remains a challenge and requires innovative research to advance the field.

In conjunction with a Special Focus in The Wildlife Professional 19.2 May/June 2025 issue, we coordinated with The Nutritional Ecology Working Group to compile this virtual issue on nutritional ecology. The research in this virtual issue has been published across 9 society-owned journals to provide a broader picture of the science being published on the topic and to highlight the diversity of societies that are working to communicate wildlife science. It covers a broad range of taxa and topics including effects of nutrition on reproduction, survival, and distribution, and field, laboratory, and analytical methods.

The virtual issue can be found [here](#).

Just a friendly reminder: **Upcoming Elections**

Elections will be open this fall for the following positions:

Chair-elect
5 Board Members at Large
Treasurer
Newsletter Editor
Outreach/Communications

The Wildlife Society's Nutritional Ecology Working Group has facilitated a winter webinar series for the past 5 years, showcasing the diversity of nutritional ecology research. The webinar committee, consisting of Keith Oster, Tamara Johnstone-Yellin, Scott McWilliams, and Dan Thompson, just finished up the webinar series for this winter. We would like to thank our 2024-2025 presenters:

Phil Manlick and Claire Goodfellow – USDA Forest Service and Oregon State University.

Mark Edwards – California Polytechnic State University.

Robin Warne – University of Illinois Urbana-Champaign.

Marjorie Matocq – University of Nevada – Reno.

Lisa Shipley – Washington State University.

Recorded webinars for this year's series, as well as the last 4 years, can be found at the following link: <https://wildlife.org/newg/webinar-series/>.

If you have ideas for presentations for the 2025-2026 webinar series, please email them to twc.nutritional.ecology@gmail.com.



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Recently Published Research

The list of recent publications provided is for informational purposes only and inclusion on the list should not be considered endorsement by NEWG.

- Bilodeau-Hussey, N. M., Huggler, K. S., Frances Cassirer, E., Miyasaki, H., Hurley, M. A., Shipley, L. A., & Long, R. A. (2025). Effects of maternal condition, disease status, and behavior on survival of juvenile bighorn sheep. *The Journal of Wildlife Management*, 89(3). <https://doi.org/10.1002/jwmg.22721>
- Grobbelaar, A., Josling, G. C., Osthoff, G., & Deacon, F. (2025). Faecal analysis as an indicator of the dietary quality utilised by free-roaming giraffe (*Giraffa camelopardalis*) in the free state province, South Africa. *African Journal of Ecology*, 63(2). <https://doi.org/10.1111/aje.70026>
- Harper, C. A., Strickland, B. K., Lashley, M. A., Turner, M. A., Nanney, J. S., Colter Chitwood, M., Moorman, C. E., Ellison-Neary, N., Brooke, J. M., & Street, G. M. (2025). Soil quality does not predict plant nutrition available to white-tailed deer. *The Journal of Wildlife Management*, 89(3). <https://doi.org/10.1002/jwmg.22722>
- Hecker, L. J., DeMoor, J., & Found, R. (2025). Comparison of concurrent plains and wood bison diets at Elk Island National Park. *The Journal of Wildlife Management*, 89(4). <https://doi.org/10.1002/jwmg.70015>
- Heywood, E. I., Murray, K. T., Doughty, L., DiGiovanni, R. A., & Sigourney, D. B. (2025). Postweaning horizontal movements and diving behavior of a recovering grey seal (*Halichoerus Grypus atlantica*) population in the western North Atlantic. *Animal Biotelemetry*, 13(1). <https://doi.org/10.1186/s40317-025-00405-5>
- Hjermann, T. K., Rivrud, I. M., Meisingset, E. L., & Mysterud, A. (2025). Sex-specific selection of agricultural farmland by a partially migratory ungulate. *Journal of Animal Ecology*. <https://doi.org/10.1111/1365-2656.70017>
- O'Shea-Stone, G., Tripet, B., Thomson, J., Garrott, R., & Copié, V. (2025). Polar metabolite profiles distinguish between early and severe sub-maintenance nutritional states of wild bighorn sheep. *Metabolites*, 15(3), 154. <https://doi.org/10.3390/metabo15030154>
- Robatcek, S. L., Shipley, L. A., White, C., & Long, R. A. (2025). Using dynamic Foodscape models to assess bottom-up constraints on population performance of herbivores. *Ecological Applications*, 35(2). <https://doi.org/10.1002/eap.70015>
- Videvall, E., Gill, B. A., Brown, M. B., Hoff, H. K., Littleford-Colquhoun, B. L., Lokeny, P., Musili, P. M., & Kartzinel, T. R. (2025). Diet-microbiome covariation across three giraffe species in a close-contact zone. *Global Ecology and Conservation*, 58. <https://doi.org/10.1016/j.gecco.2025.e03480>
- Wagler, B. L., Stewart, C., Turnbull, Z., Malmberg, J. L., & Monteith, K. L. (2024). Disease and migratory tactic mediate the nutritional benefits of irrigated agriculture to Mule Deer. *The Journal of Wildlife Management*, 89(2). <https://doi.org/10.1002/jwmg.22705>
- Wairokpam, B., Wagh, V. V., Singh, H. C., Maurya, A., Singh, L. A., & Rana, T. S. (2025). Integrating ecological niche modeling and natural regeneration assessment to identify conservation priorities for *garcinia pedunculata* in India. *Environmental Monitoring and Assessment*, 197(4). <https://doi.org/10.1007/s10661-025-13925-7>