

In memoriam: Gary W. Barrett (1940–2022)

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The landscape ecology community mourns the passing of Dr. Gary W. Barrett, one of the pioneers and leaders of our field.

Gary was born and raised in rural Indiana and developed a love of nature from an early age. He majored in biology at Oakland City College in Indiana and graduated *cum laude* in 1961. He then moved to Marquette University, where he earned his M.S. degree in biology in 1963. Although his graduate

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School of Life Sciences and School of Sustainability, Arizona State University, Tempe, AZ 85287, USA advisor, Reznaut M. Darnell, was best known as a marine biologist, Darnell encouraged research in the emerging science of ecology. This was a trait that Gary later carried on with his own mentees, who were given the freedom to work on various taxa and topics. Gary's M.S. research focused on the effects of pesticides on small mammals, and much of the research for the rest of his career was related to the effects of stresses and spatial heterogeneity on small mammals and ecosystem processes.

After his M.S. degree, Gary moved to the University of Georgia (UGA) to conduct his Ph.D. research under the mentorship of Eugene P. Odum. Even after graduating in 1967, Gary maintained friendships and working relationships with people at UGA as he continued his research in ecosystem ecology and later in the then-new field of landscape ecology. After a short teaching stint at Drake University, he moved to Miami University in Oxford, Ohio, where he worked for 26 years as Assistant, Associate, Full, and Distinguished Professor, as well as Deputy Director of the Institute of Environmental Sciences and Co-Director of the Ecology Research Center. In 1994 he returned to UGA to become Director of the Institute of Ecology (1994–1996) and Eugene P. Odum Chair in Ecology (a position he held until his retirement in 2014).

Gary's impacts on the field of landscape ecology were far-reaching. As Director of the Ecology Program at the National Science Foundation between 1981 and 1983, Gary funded the landmark Allerton Park Workshop in April 1983, which produced





Fig. 1 Dr. Gary W. Barrett at the 25th Annual Meeting of US-IALE, held at University of Georgia in 2010

a blueprint for modern landscape ecology. He was one of the first landscape ecologists in North America and made a number of important contributions to the field, especially on the landscape ecology of small mammals and on agricultural landscape ecology. He was a pioneer in stress (or disturbance) ecology and agro-landscape sustainability. Over his career, Gary published about 200 papers and 10 books. His important publications on landscape ecology include:

- 1. Barrett GW, Dyne GMV, Odum EP (1976) Stress ecology. BioScience 26:192–194.
- Barrett GW, Rosenberg R (eds) (1981) Stress Effects on Natural Ecosystems. John Wiley & Sons, New York.
- 3. Barrett GW (1992) Landscape ecology: Designing sustainable agricultural landscapes. Journal of Sustainable Agriculture 2:83–103.
- 4. Harper SJ, Bollinger EK, Barrett GW (1993) Effects of habitat patch shape on population

- dynamics of meadow voles (*Microtus penn-sylvanicus*). Journal of Mammalogy 74:1045–1055.
- 5. Lapolla VN, Barrett GW (1993) Effects of corridor width and presence on the population dynamics of the meadow vole (*Microtus pennsylvanicus*). Landscape Ecology 8:25–37.
- 6. Barrett GW, Peles JD (1994) Optimizing habitat fragmentation: An agrolandscape perspective. Landscape and Urban Planning 28:99–105.
- 7. Barrett GW, Peles JD, Odum EP (1997) Transcending processes and the levels-of-organization concept. BioScience 47:531–535.
- Barrett GW, Barrett TA, Peles JD (1998) Managing agroecosystems as agrolandscapes: Reconnecting agricultural and urban landscapes. In: Collins WW and Qualset CO (eds), Biodiversity in Agroecosystems. CRC Press, Boca Raton, pp. 197–213.



- Barrett GW, Peles JD (eds) (1999) Landscape Ecology of Small Mammals. Springer-Verlag, New York.
- Barrett GW, Farina A (2000) Integrating ecology and economics. BioScience 50:311–312.
- Mabry KE, Barrett GW (2002) Effects of corridors on home range sizes and interpatch movements of three small mammal species. Landscape Ecology 17:629–636.
- Barrett TL, Farina A, Barrett GW (2009) Positioning aesthetic landscape as economy. Landscape Ecology 24:299–307.
- Barrett TL, Farina A, Barrett GW (2009) Aesthetic landscapes: an emergent component in sustaining societies. Landscape Ecology 24:1029–1035.
- 14. Truax B, Barrett G (2011) Soundscape in a context of acoustic and landscape ecology. Landscape Ecology 26:1201–1207.
- 15. Barrett GW, Barrett TL, Wu J (eds) (2015) History of Landscape Ecology in the United States. Springer, New York.

Gary served as President of the U.S. Chapter of the International Association for Landscape Ecology (US-IALE, the predecessor of IALE-North America) during 1988–1990, was Program Chair of the 5th Annual Meeting of US-IALE at Miami University in 1990, received the Distinguished Landscape Ecologist award in 2001, and hosted the 25th Annual Meeting of US-IALE at University of Georgia in 2010 (Fig. 1). In addition to his service for IALE, he was President of the Association of Ecology Research Centers (1988–1996) and President of the American Institute of Biological Sciences (1998), Director of the Ecology Program in the National Science Foundation (1981–1983), and an active member of several other professional societies. He received numerous awards in recognition of his contributions in research, teaching, and professional service. He also mentored a number of students and postdocs who have gone on to make important contributions to the field of ecology.

Two endowed scholarships have been created in his memory, and donations can be made to: Gary W. Barrett Endowed Scholarship, Miami University, 926 Chestnut Lane, Oxford, OH 45056, USA, and Gary W. Barrett Endowment Scholarship, Oakland City University, 138 N. Lucretia St., Oakland City, IN 47660, USA.

Dr. Gary Barrett made a profound impact on the field of landscape ecology and beyond. He will be greatly missed.

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