In Memoriam Leslie A. Viereck

Authors: Dyrness, Ted, Van Cleve, Keith, and Yarie, John

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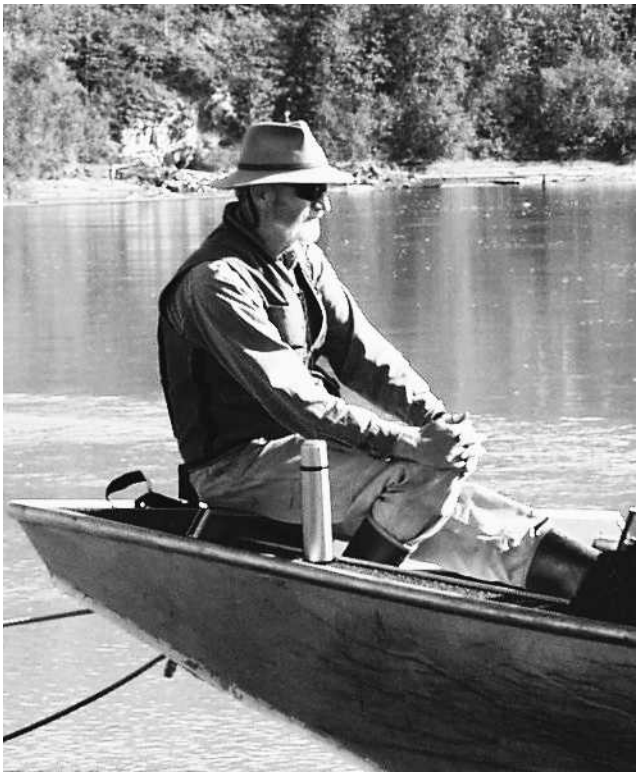
Leslie A. Viereck

1933–2008

In Memoriam



Leslie A. Viereck

Leslie A. Viereck passed away at age 78 on 31 August 2008 in Fairbanks, Alaska. At the time of his death Les's knowledge and understanding of the vegetation of Alaska was second to none; he is sorely missed. His introduction to Alaska occurred during the summer of 1948 while he was still an undergraduate at Dartmouth College. He completed his graduate work (M.S. and Ph.D.) at the University of Colorado under the direction William A. Weber, the pre-eminent Colorado botanist, and John W. Marr, the founder and first Director of the Institute of Arctic and Alpine Research. For his doctoral thesis he conducted a study of plant succession and soil development on gravel outwash of the Muldrow Glacier, Alaska. In 1959 Les permanently moved to Alaska as Assistant Professor of Botany at the University of Alaska in Fairbanks (UAF). One of his first research assignments was to work on possible environmental impacts of a proposed harbor to be excavated by atomic blast in northwest Alaska, dubbed "Project Chariot." Les and two of his colleagues soon became convinced that the hazards of nuclear fallout contamination far outweighed any possible benefits. Since this conflicted with the university's stand, they were forced to resign. In 1993 Les was awarded an Honorary Doctor of Science degree from UAF for his stand for truth in science.

Les was a man of many talents. He pioneered a new route up Denali and he was an expert boatman, house builder, gardener, and a devoted family man. He was beloved by all. An excellent obituary and other details of his life can be found in Murray (2008). We contribute a few notes here on his contributions to Alaskan and northern forestry. From 1961 to 1963 Les was a Research Biologist with the Alaska Department of Fish and Game. In 1963 he entered the federal service by joining the Institute of Northern Forestry (INF), USDA Forest Service (located on the campus of the UAF) as Principal Plant Ecologist where he remained until his retirement.

Les was a kindly man and generous collaborator with colleagues, both with the university and Forest Service. His extensive knowledge of Alaska's vegetation and soils catalyzed the synergism needed to pursue integrative studies, and he provided an extensive legacy of information that will prove invaluable for scientists who follow him. For example, the book *Alaska Trees and Shrubs* written with E. L. Little has been hugely popular not only with researchers but also the general public. A revised, second edition was published in 2007. He was the leading author of the *Alaska Vegetation Classification* (1992). This book lists, along with accurate source material, virtually all Alaskan plant communities which had ever been described. This is directly a result of not only Les's firsthand knowledge of many of these ecosystems, but also his exhaustive collection of references, both published and unpublished.

Interdisciplinary research, in which Les took leadership over the years, included work on plant succession along interior Alaskan rivers and the effects of fire on plants and soils. Early in his career, Les conducted pioneering studies of forest succession on permanent plots located along the Chena and Tanana Rivers. Results of his work form the basis of on-going studies in Bonanza Creek Experimental Forest and elsewhere. His studies of the effects of fire on interior Alaskan ecosystems (especially the black spruce forest) concentrated on measurements of soil temperature and depths to permafrost. He became a recognized and world authority on fire effects in the taiga and wrote several well-received reviews and papers on this subject.

Starting in the late 1960s, multidisciplinary research on the dynamics of taiga forest ecosystems in interior Alaska had the advantage of a strong cooperative commitment from the INF and the UAF. Les was an integral and committed partner in this work. His detailed knowledge of the flora of interior Alaska and the community succession framework he developed for upland and floodplain forests in the Fairbanks area were repeatedly utilized over the next 20 years as the group of Forest Service and university scientists examined the structure and function of taiga forest systems.

The successional pathways established by Les provided an overarching guide for organization of hypotheses testing work

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concerning controls of forest development in interior Alaska. Always interested in cooperation, sharing data and ideas, and the routine work of maintaining field sites associated with a long-term research program, Les truly facilitated these cooperative efforts. His contribution of the succession model manifested itself in at least four major research synthesis publications (cited below). These efforts involved continuing research support from the U.S. Forest Service Pacific Northwest Forest and Range Experiment Station, the McIntire-Stennis Forestry Research program at UAF, the State of Alaska, and the National Science Foundation (NSF). These cooperative associations culminated in 1987 in the funding of the NSF Long-Term Ecological Research program at UAF that continues to the present time. It is a memorial to Les and his persistent search for long-term understanding of plant communities and their dynamics.

Throughout his life Les conveyed an unflagging dedication and commitment to developing an understanding of the ecology of the Alaskan boreal forest. This understanding is the foundation of future work. Les as a friend and colleague will be greatly missed but his life story, our memories of him, and his legacy will remain.

Acknowledgments

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Ted Dyrness
1037 Morse Lane, Albany, Oregon 97321, U.S.A.

Keith Van Cleve
279 Kanaka Bay Road
Friday Harbor, Washington, 98250, U.S.A.

John Yarie
Forest Soils Laboratory
University of Alaska Fairbanks
Fairbanks, Alaska 99775, U.S.A.