

# Memorial to Elliott Bates McKee, Jr.

## 1934–1982

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Elliott Bates McKee, Jr., geologist, yachtsman, and pilot, and two companions died in a plane crash near Wenatchee, Washington, July 17, 1982, while making a geological reconnaissance in the Cascade foothills.

Bates was the son of E. Bates McKee, Sr., and Katharine Pillsbury McKee; he was born January 10, 1934, at Mount Kisco, New York. He attended St. Paul's School in Concord, New Hampshire, graduating in the Form of 1951, and received his bachelor's degree in geology from Yale University in 1955.

Bates did his graduate study in geology at Stanford University and was awarded the degree of Doctor of Philosophy in 1959. He came to the University of Washington in the spring of 1958 as assistant professor with special interest in structural and engineering geology. He plunged immediately into a creative teaching program at both the graduate and undergraduate levels while continuing his research begun in California. On the basis of his teaching and research he was promoted to associate professor in 1964.

McKee's unique contribution during this early period was his recognition of the significance of the widespread occurrence in surface exposure (more than 140 square miles) of the mineral jadeite replacing sodic feldspar in clastic sedimentary and volcanic rocks of the Franciscan Formation in the central California Coast Range south of San Francisco. Because jadeite had long been thought to form only at high pressures (above 10,000 bars), McKee suggested that the Franciscan now seen in outcrop must have been at or near the Mohorovičić discontinuity at one time and that it subsequently faulted up to its present position in the area studied. He bolstered the case with papers on the association of lawsonite and glaucophane with the jadeite in the sedimentary rocks, and he pointed out that the white veins occurring throughout the 140-square-mile area near Pacheco Pass contained aragonite, the high-pressure form of  $\text{CaCO}_3$  altering to calcite.

Bates had an almost unique rapport with people of all ages. Even as a graduate student, senior professors talked to and confided in him as an equal. Conversely, he never talked down to the greenest freshman. These qualities made him a most effective teacher at all levels. He was a patient and successful administrator. Even at a junior rank he lobbied through a number of changes in long-standing, conservative curricula of geologic and supporting courses.

During the late 1960s, Bates gathered material for a forthcoming book and also found time to act as Associate Curator at the Burke Memorial Washington State Museum, giving special attention to its mineral collection.

Bates took sabbatical leave during the 1970–71 year and with his wife, Pamela, their twin boys, David and John, and his only daughter and eldest child, Katherine, visited Japan and the Asian coast, settling down in Australia and New Zealand to complete a book manuscript. *Cascadia, the Geologic Evolution of the Pacific Northwest* was

published in early 1972 and was an instant success. The book met a real need for students, the intelligent layman, and the amateur geologist. He began immediately to accumulate material for the book's eventual revision. There can be no better memorial to Bates than the completion of the revision on which he was working at the time of his death.

Bates returned to the campus from sabbatical in time to take charge of the mini-field course and was dragooned into the onerous task of acting departmental chairman for the spring quarter of 1972. He retired December 15, 1972, at the age of 39 to begin a career in business. The department voted and the regents appointed him Affiliate Professor of Geological Sciences, the rank he held for ten years prior to his death.

To understand the sudden career change, one need only consider the history of McKee, the sportsman. From boyhood he had two consuming passions: hockey in the winter and sailing the rest of the year. He played varsity hockey at St. Paul's and at Yale, and even participated in pick-up competition on European vacations. There was a break during his Stanford years, but he resumed the "madness" temporarily in Seattle. The sailing he never gave up. When he graduated from the small-boat class, his father, a perennial Atlantic, Bermuda-to-Bergen racer, included him several times in his crew, remarking only recently "If I had only taken Bates's advice we might have won that last race."

McKee brought his competence to the Pacific, crewing in Victoria to Maui races, and participated in Puget Sound racing at all levels. The 1982 sailing season in the Northwest bid fair to become Bates's most successful when, in his own boat with his three older sons, Bates III, Jonathan, and Charles as crew, they won their class and were placed second overall in the Swiftsure race.

Bates, with his multitude of talents, became one of the most successful yacht brokers in the Northwest and cultivated and maintained personal contacts with brokers in all the boating centers in the United States. He recently turned over the brokerage part of his business to an associate when he discovered the joys and convenience of flying his own plane. Bates always maintained his interest in geology. He was actively working on the revision of his book, *Cascadia*, and was raising money for the Corporation Fund of Washington's Department of Geological Sciences. In 1981 he joined with university colleagues in starting a promising geological consulting firm. He was truly a man for all seasons.

Bates was cosponsor and coorganizer of the symposium at the Cordilleran Section of the Geological Society of America at Anaheim, California, in May 1982. Twenty-two papers were solicited and twenty-two presented as "The Regional Geology of the State of Washington." Bates was a Fellow of the Geological Society of America and was for eight years (1965-1973) the secretary of the Cordilleran Section of the Society; he was a member of the Geochemical Society, the Cordilleran Section of the Geological Association of Canada, the Society of the Sigma Xi, the Cruising Club of America, and the Seattle Yacht Club.

In addition to the members of his immediate family previously mentioned in this Memorial, Bates is survived by his father, E. Bates McKee of Annapolis, Maryland, and two brothers, Phillip Winston McKee of Washington, D.C., and Charles Dunn McKee of Portland, Maine.

Bates McKee was a quiet but multitalented man with a fine command of the written and spoken language and a finely developed sense of good humor, who will be sorely missed by his family, geological and boating friends, and the several generations of students whose lives he touched.

**SELECTED BIBLIOGRAPHY OF ELLIOTT BATES MCKEE, JR.**

- 1958 Jadeitic alteration of sedimentary and igneous rocks [abs.]: *Geological Society of America Bulletin*, v. 69, p. 1612.
- 1960 Tectonic significance of the phase change—plagioclase-jadeite + quartz [abs.]: *Geological Society of America Bulletin*, v. 71, p. 1926–1927.
- 1962 Widespread occurrence of jadeite, lawsonite and glaucophane in central California: *American Journal of Science*, v. 260, p. 596–610.
- Aragonite in Franciscan rocks of the Pacheco Pass area, California: *American Mineralogist*, v. 47, p. 379–397.
- 1966 Knoxville-Franciscan contact near Paskenta, western Sacramento Valley, California [abs.]: *Geological Society of America Special Paper* 87, p. 215–216.
- 1968 The northwestern part of the Columbia Plateau: The central and southern Cascades; The destruction of Mount Rainier; Glaciation of the Puget Sound Lowland; The Northern Cascades: Sacramento, California, Association of Engineering Geologists, 1968, National Meeting, Seattle, Washington, Guidebook to Field Trips, p. 4–10, 31–45, 46–52, 53–67, 85–97.
- 1969 (with Diery, H. D.) Stratigraphy of the Yakima Basalt in the type area: *Northwest Science*, v. 43, p. 47–64.
- 1970 (and McKee, Pamela) Refractive index data for fused glass from basalts of the Columbia Plateau: Cheney, Eastern Washington College Press. *Proceedings, 2nd Columbia River Basalt Symposium*, 1969, p. 39–49.
- 1971 (and Stradtling, Dale) The sag flowout, a newly discovered type of volcanic structure: *Geological Society of America Bulletin*, v. 81, p. 2035–2044.
- 1972 *Cascadia, the geologic evolution of the Pacific Northwest*: New York, McGraw-Hill, 394 p.