



William D. Emmons

November 18, 1924 - December 8, 2001

William D. Emmons was a native of Minnesota and received his B. S. degree from the University of Minnesota. He served in World War 2 as a meteorologist in the Pacific Theater. After the war he attended graduate school at the University of Illinois, where he received a PhD. with R. C. Fuson in 1951.

Facing recall into the service in the Korean War, he opted to join the Redstone Arsenal Research Division of the Rohm and Haas Co., a laboratory being run for the Army Ordnance Corps in the area of solid propellant research. This laboratory grew to be one of the leaders in that area, largely due to Bill's energy and drive. During this period Bill pioneered work in the applications of peroxytrifluoroacetic acid as a powerful oxidant as well as nitration under alkaline conditions. He discovered the long-sought cyclic isomer of nitrones, the oxaziridines, and in a short period of time he explored the remarkable chemistry of these compounds. His review in 1964 consisted of twenty-two pages and references. An updated review in 1985 consisted of sixty seven pages and 211 references, showing the explosion of interest in these compounds.

In 1957 Rohm and Haas called him to head up a laboratory in the main research center of the company. During this period he introduced with Bill Wadsworth the use of phosphonate esters in Wittig olefination reactions. Bill Emmons always wanted to leave behind a chemical legacy, but he would have found it ironic that his most frequently cited contribution, the phosphonate chemistry, was the one he felt was the least imaginative of his works.

Bill rose through the management levels of Rohm and Haas to the point where his research area, polymers, resins and monomers, was the greatest contributor to the corporate profits. At the same time he always thought of himself primarily as a scientist and, even up to his retirement in 1989, he prided himself on his personal contributions to the research program. In 1986 he received the first Roy W. Tess Award for Coatings

Science sponsored by the Division Of Polymeric Materials of the American Chemical Society.

His scientific leadership qualities were recognized by the 1993 Earle B. Barnes Award for Leadership in Chemical Research sponsored by the American Chemical Society. The following excerpt from an award nomination by his late colleague, Donald L. Glusker, sums up the man I knew:

“Emmons set a clear example for scientific integrity, both on the facts of experimentation but also in dealing with regulatory issues of toxicity, waste disposal, etc., and he did not tolerate sloppiness or short cuts in this area. His interactions with the young scientists continue, even though he now has almost 300 people in his directorate. He participates intensively in program reviews and continues to put forth effective ideas which turn into major opportunities. He is a master at finding the right spot for wizened old bench chemists to revive their enthusiasm and their flagging careers. Without losing sight of the realities of industrial research in terms of profits, costs, competition, etc., he continues to get most enjoyment from the science of what is being accomplished, and sets a role model for the staff of someone who loves and lives for chemistry.”

Bill became an editor of Organic Syntheses in 1961 and served as Editor of Volume 47. He was elected to the Board of Directors in 1971. He served for many years on the Finance Committee of the Board ; he retired from the Board in 1995.

Bill had another great passion in life besides chemistry: ballet. He and his wife Margaret commuted regularly from Philadelphia to New York during the ballet season to see performances by the American Ballet Theater and The New York City Ballet.

Another of his great enthusiasms was good food. When I became Secretary of Organic Syntheses, Bill charged me with the task of providing “memorable” meals for our semi-annual dinners. I am not sure that I ever actually met his standard but he was always encouraging me to keep trying.

Last but not least was his passion for his family. He was not a person demonstrative of his feelings. At first acquaintance he might appear brusque and abrupt. But inside a “crusty” exterior was a person of deep and sincere compassion and sensitivity. His wife of years, Margaret (affectionately known as Quie) and his children, Billy, Jean and Nancy, were the principal beneficiaries of his care and concern in his very private personal life.

I was fortunate and privileged to have been associated early in my career with such a mentor. From my first days as a graduate student in the Fuson group at Illinois in 1950 and then again as a member of Bill’s synthesis group at Redstone from 1953 to 1957, I was introduced to the world of chemical research under the aegis of one of the most imaginative chemists of his generation. His standards, his drive, and particularly his ambition, that never came at the expense of others, remain an inspiration for me to this day.

Jeremiah P. Freeman
November 14, 2002

Originally published in *Organic Syntheses*
Vol. 80, pp xxvii-xxix