John Raven Johnson

August 9, 1900 — May 25, 1983

John Raven Johnson came to Cornell’s chemistry department as an assistant professor in 1927. Although only twenty-seven years old, he had already developed a deserved reputation as one of the nation’s brilliant young chemists. He had taken his Ph.D. degree at the University of Illinois in 1922, spent two years abroad doing research at the Collège de France under a prestigious American Field Service fellowship, and spent three further years at Illinois as an instructor, where, among other things, he coauthored with his teacher and friend, Roger Adams, a widely used laboratory textbook on organic chemistry.

Jack Johnson (as he was known to all his friends) brought to Cornell the new organic chemistry that Illinois had become famous for. He quickly put into place a lively program of research and attracted large numbers of graduate students. He also restructured Cornell’s courses in organic chemistry and taught them superbly. Since, in addition, Johnson was a lively-minded and personable man with many friends, it is not surprising that in 1930, when he was barely thirty years old, he became a full professor at Cornell.

During the decade of the 1930s Cornell brought from the outside another half-dozen young chemists, most of whom, like Johnson, stayed at Cornell. In combination, and with the addition in 1940 of the great Peter Debye, they helped change the face of Cornell’s chemistry department. Johnson was a central figure in this new generation of Cornell chemists. He became the implicit leader of the organic chemistry group and greatly influenced subsequent hirings in the field. He quickly received outside recognition, becoming a member of the National Academy of Sciences in 1948. In 1952 he became the Todd Professor of Chemistry at Cornell, thus occupying the only chair available to chemistry at the time.

Johnson’s research bridged the old and the new in organic chemistry. He and his students gave much effort to devising syntheses and determining structures of important molecules in the best tradition of organic chemistry. His work on the synthesis of gliotoxin is especially well known. However, Johnson was also interested in new and unusual types of organic molecules and did pioneering work on organo-boron compounds and on the chemistry of furan derivatives. Finally, he was an early student of the mechanisms by which complex organic molecules undergo change from one form to others.
Jack Johnson was an early and valued senior consultant to the research groups of the Du Pont de Nemours Company, which was the major chemical concern of the United States. This close association continued even after his retirement from Cornell.

In the period 1941-45 Johnson became deeply involved with the scientific aspects of the United States wartime development efforts. He was an early participant in studies on the synthesis of new chemical explosives and also contributed to the vigorous United States search for new antimalarial agents. From 1942 to 1945 he served in London, England, as the scientific liaison officer for chemistry of the U.S. Office of Scientific Research and Development. For his wartime services he received the U.S. Medal of Merit.

Jack Johnson returned to Cornell when the war ended and resumed his career of supervising the research of graduate students, teaching large classes of students of organic chemistry, and consulting with the Du Pont company. In 1951 he served for a year in West Germany as special consultant on scientific matters for the U.S. Department of State. In 1965 Johnson retired from Cornell and he and Hope, his wife of thirty-six years, moved to their beloved home in Vermont. His life became increasingly restricted, but he remained engaging and intellectually lively up to his death in May 1983. He is survived by his wife and two sons, Keith and Leonard.

Jack Johnson’s Cornell colleagues and his many students and other friends will remember him with admiration and affection as one of the important figures in the development of Cornell into the great research university that it now is.

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