categories must be nested among one another. This requirement, which forbids partial overlap between categories, permitted Kuhn to recast his original concept of incommensurability in a more rigorous form because, with this new understanding, scientific systems could be commensurate with one another—or, in the term he preferred, mutually translatable—only if they shared the same taxonomic structure. Unfortunately, death interceded before Kuhn was able to finish a manuscript fully laying out his developed understanding, although his last publications go quite far in doing so, and an edited version of his final writings will eventually appear in print.

Kuhn was deeply committed to his work, and anyone who wanted to benefit from his tutelage had to be as serious about it as Kuhn himself was. Many of his students gained a great deal indeed from his close scrutiny of their work and his powerful, dedicated drive to uncover the essential meaning of past scientific conceptions. He brought the same intensity to his personal life that he brought to the history and philosophy of science. His friends and his students, including myself, will long remember Tom's dedication to the truth of the matter, as he saw it, in both life and work.

Jed Z. Buchwald
Massachusetts Institute of Technology

Katharine Way

Katharine Way, a pioneer in developing techniques for the retrieval, evaluation and dissemination of information on nuclear structure, passed away in Chapel Hill, North Carolina, on 8 December 1995.

Born in Sewickley, Pennsylvania, on 20 February 1903, Kay Way earned a BS in physics from Columbia University in 1932 and a PhD in nuclear theory from the University of North Carolina in 1938 under John Wheeler. After a year teaching at Bryn Mawr College, she became an instructor and assistant professor at the University of Tennessee. In 1942, she started doing wartime work, briefly in Washington, DC, and then at the Metallurgical Laboratory in Chicago, where she worked on reactor design, evaluation of reactor constants and the organization of radioactivity data on fission products. Theoretical work there with Eugene Wigner led to what became known as the Way–Wigner formula for fission-product decay. She also began to systematize the vast quantities of new results produced by wartime research, at first as a much-enjoyed

Katharine Way

hobby and eventually as the work that absorbed a major fraction of her time and effort for the remainder of her professional career.

In 1945, Kay joined the Clinton Laboratories in Oak Ridge, Tennessee, the forerunner of Oak Ridge National Laboratory (ORNL). She continued her analysis of fission products and began collecting and organizing the growing amount of data on nuclear decay. There also, Kay provided the seminal idea for what has become Oak Ridge Associated Universities.

In 1947, Kay moved to the National Bureau of Standards in Washington, DC, where she devoted herself full-time to the data evaluation needs of the basic and applied research communities. She coauthored a series of publications that evolved into the Nuclear Data Sheets, and created the Nuclear Data Project in 1953. The project moved to ORNL in 1964, and Kay continued as its head until her retirement in 1968.

In 1964, Kay arranged with Academic Press to establish a new journal, *Nuclear Data Sheets*, to publish the extensive data that she and her colleagues had prepared, and in 1965 she was instrumental in establishing a second journal, now titled *Atomic Data and Nuclear Data Tables*. During this same period, Kay persuaded the editors of *Nuclear Physics* to add keywords to the title page of each article, a practice that has evolved into the Nuclear Science Reference File. After retiring from ORNL in 1968, Kay relocated to the Triangle Universities Nuclear Laboratory in Durham, North Carolina, and became an adjunct professor at Duke University.

By her insistence on the critical evaluation of all published basic data and her ability to combine these data into as logical and self-consistent a set of nuclear structure properties as possible, Kay influenced an entire generation of evaluation experts and the presentation of data in physics literature.

Kay Way felt and expressed herself passionately not only about the analysis of nuclear data, but also about many issues of human fairness and social justice. In such matters, she was an outspoken advocate rather than merely a sympathetic bystander. In Washington, Oak Ridge and Durham, she surrounded herself with many colleagues. They all remember with affection and gratitude her keen intelligence, sharp wit and loyal decency.

Murray Martin
Norwood Gove
Ruth Gove
Subramanian Raman
Oak Ridge, Tennessee
Eugen Merzbacher
Chapel Hill, North Carolina

Brian Edward Bent

Brian Edward Bent, a professor of chemistry at Columbia University and an experimental surface scientist of exceptional distinction and promise, collapsed and died on 23 July 1996 while on vacation with his family in northern Minnesota. He was 35 years old.

Brian was born in Minneapolis. He earned a BA in chemistry from Carleton College in 1982 and a PhD in physical chemistry from the University of California, Berkeley, under Gabor Somorjai, in 1986. He joined the Columbia faculty in 1988 after two years of postdoctoral research with Ralph Nuzzo at AT&T Bell Laboratories.

Brian's elegant studies of the molecular details of chemical reactions on solid surfaces answered long-standing questions in materials deposition and etching, metal-catalyzed organic synthesis, and heterogeneous catalysis. He showed that ultrahigh-vacuum spectroscopic studies of stable monolayers adsorbed on cold single-crystal surfaces can in fact give kinetic and mechanistic information about technologically important high-pressure, high-temperature surface reactions. One such reaction is the Fischer–Tropsch process for making hydrocarbons by metal-catalyzed hydrogenation of carbon monoxide. This reaction affected history: Without fully understanding the chemistry of the process, the Germans used it to make 15 million barrels of fuel a year during World War II. Brian determined the mechanism of the Fischer–Tropsch process—a mechanism that had been debated for over 60 years—by demonstrating and studying the methylene–methyl mi-