



Robert DeWitt Huntoon

coordinator of Atomic Energy Commission projects at NBS.

From 1951–53, Huntoon served as director of the NBS Corona laboratories in California, overseeing a military research and development program that included guided missiles, infrared measurement and electronic ordnance devices. He then returned to NBS in Washington, DC. In 1958 he was appointed the first deputy director, essentially supervising the internal operations of NBS. In 1963 he became the deputy director for basic standards and services, including the Standard Reference Data program. The following year, when NBS was reorganized into specialized institutes, he became director of the Institute for Basic Standards. In 1967 he was appointed the first chief of the Office of Program Development and Evaluation, serving in this capacity until his retirement the following year.

The positions Huntoon held at NBS indicate his extraordinary range of interests and competence in science and technology, covering atomic beams, experimental nuclear physics, secondary emission phenomena, microwave measurements, electronic ordnance devices, atomic physics, guided missiles, computers and fundamental physical constants.

With Ugo Fano in 1950 Huntoon directed attention to the possibility and desirability of adopting a complete set of atomic standards of physical measurement, replacing the established arbitrary standards.

His most notable achievement was formulating the concept of a national measurement system for modern science and trade. He used a systems approach to improve understanding of the nation's measurement activities and of the vital importance of NBS at the apex of the pyramid, setting the primary standards of measurements.

These were then the bases for the network of measurements by industry and commerce. His concept led the White House Office of Science and Technology to establish in 1963 the National Standard Reference Data System, with NBS assigned the responsibility for its administration and coordination. In his active retirement these ideas continued to grow, and he introduced them to the leaders of many other countries, where he bonded technical understanding with personal friendships.

Bob Huntoon is best remembered by those who worked with him for his calm manner, even when surrounded by the near chaos of war, and for his clear scientific thinking. His was the rare and remarkable combination of scientist and manager, with the scientist being predominant.

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Carl Oberman

Carl Oberman, formerly of Princeton University and an adjunct professor in the physics department of the University of California, Irvine, died of lung cancer on 12 April 1993.

Carl was born in California on 29 July 1925. He served in the US Army from 1943–46, then received his BS in physics from the California Institute of Technology in 1948. In 1954 he received his PhD in physics from Ohio State University. From 1952–55 he was an assistant professor of physics at Lafayette College in Pennsylvania.

In 1955 Carl joined Princeton University's fledgling Project Matterhorn (later to become the Princeton Plasma Physics Laboratory), whose goal under the direction of Lyman Spitzer was to develop nuclear fusion for commercial power production. In 1966 Carl became both a principal research physicist at PPPL and a lecturer with the rank of professor in the university's department of astrophysical sciences. He remained in those positions until 1991, when he moved to the University of California, Irvine.

In Carl's almost 40-year career in plasma physics, he made seminal contributions to a variety of important areas. With Martin Kruskal, he developed the energy principle for kinetic plasma stability, which is still explored and generalized today. Carl pioneered the rigorous mathematical calculation of the classical high-frequency conductivity of a fully ionized plasma; the insights and techniques for

radiation theory that stemmed from this research are now classic. His insight and tenacity were essential in the development of the nonlinear theory of parametric instabilities within the weak-turbulence framework, including the problem of nonlinear saturation. With his students and colleagues, Carl then carried out a campaign to systematize the foundations of plasma turbulence and transport theory, transforming that theory into a practical tool; he remained deeply interested in this topic and other challenges of nonlinear physics for the remainder of his career.

Carl demonstrated superb judgment in his choice of research problems; many of his papers have stood the test of time. He had the highest integrity, both scientific and personal. His passion for physics, deep insight and careful attention to proper foundations inspired the successful research careers of several generations of his graduate students. Carl's sociability, acute wit and constant output of improbable stories brightened the lives of all those who interacted with him. As a pioneering physicist, role model and friend, he is greatly missed.

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Michael A. Schluter

The death of Michael A. Schluter on 17 November 1992, at the age of 47, was a tragic loss for the condensed matter physics community and especially for his many colleagues who regard his scientific work with deep respect and admiration. He will be remembered as much for the exceptional lucidity of his technical presentations and the diplomatic style of his personal interactions as for his scientific achievements.

Michael was born on 23 February 1945 in Straubing, Germany. He received his Diplom degree in physics in 1969 from Karlsruhe Technical University and his PhD in 1973 from the Ecole Polytechnique Federale in Lausanne, Switzerland, where he did theoretical work in Emanuel Mooser's group on the electronic structure of layered compounds.

Michael then spent two years as a postdoc in Marvin Cohen's group at the University of California, Berkeley, and in 1975 he joined AT&T Bell Laboratories as a permanent member of the technical staff. He stayed at