# Random Walk

### **Obituaries**

#### Robert P. Dilworth

Robert Dilworth, professor of mathematics, emeritus, a member of the faculty since 1944, died October 29, 1993. Born in Southern California in 1914, Dilworth never left the area for very long. He earned his BS in mathematics at Caltech in 1936 and his PhD in 1939. After a few years as Sterling Research Fellow and instructor at Yale, he returned to Caltech as assistant professor in 1943, becoming associate professor in 1945, and full professor in 1951. He retired in 1982. Dilworth was known for his work in the fields of lattice theory and universal algebra.

#### Charles Newton

Chuck Newton, who came to Caltech in 1948 as special assistant to Lee DuBridge, died March 2, 1994. Born in Kentucky in 1907, Newton earned his PhB from the University of Chicago in 1933, then worked for a few years as a newspaper feature writer in Chicago and as radio director at the University of Chicago. From 1941 to 1946 he served as head of special publications and photography at the MIT Radiation Laboratory, where he met DuBridge, whom he was shortly to follow to the West Coast. At Caltech Newton wore many hats, being in charge, at various times from 1948 to 1966, of public relations, high school relations, publications, and development. He founded the Industrial Associates in 1951, and he also taught, as a lecturer in English in 1955, 1960–62, and 1966–75.

#### Jan L. A. van de Snepscheut

Jan L. A. van de Snepscheut, associate professor of computer science and executive officer for computer science, died February 23, 1994. Born in the Netherlands in 1953, van de Snepscheut earned his MSc in electrical engineering from the Eindhoven University of Technology in 1977 and his PhD in computing science in 1983. He first taught at Caltech as a visiting assistant professor in 1983-84, then returned to the Netherlands, where he was professor in the Department of Mathematics and Computing Science at Groningen University from 1984 to 1989. Van de Snepscheut returned to Caltech as associate professor in the fall of 1989, and became executive officer in 1992.

Below: Magazine 78, which held high explosives for the Eaton Canyon Project during World War II, stands revealed after the fires.

Right: The site wasn't completely forgotten, as a graffiti-scarred stencil on Magazine 88 attests; the "transient" referred to was not one of the recent visitors but a floating crew member, usually a munitions handler.





### Watson Lectures

The Earnest C. Watson Lecture Series for the balance of the academic year includes: April 6: From Biological to Machine Vision-Pietro Perona, assistant professor of electrical engineeering; April 20: Galileo: Enroute to Jupiter-Torrence V. Johnson, project scientist, Project Galileo, JPL; May 11: Early Results from the Keck Telescope— B. Thomas Soifer, professor of physics; May 25: Farewell to the Party of Lincoln: African-American Politics in Depression-Era Los Angeles-Douglas Flamming, assistant professor of history. All lectures are at 8:00 p.m. in the Beckman Auditorium, and admission is free.

## The Reemergence of Things Past

The fires that ravaged Altadena and the San Gabriel Mountains last October exposed some pieces of Caltech history that had been overgrown with brush and hidden from view for decades. In January Kenton MacDavid discovered five concrete storage magazines for high explosives still standing in the hills above Eaton Canyon, where they had remained for more than 50 years, although the other buildings of the Eaton Canyon Project had long ago been bulldozed for residential development.

The project, directed by Charles Lauritsen, was part of Caltech's contribution to the war effort—making rockets (*E&S*, Spring 1991), which involved a large fraction of Caltech's scientists. Also known as Physics 3, the Eaton Canyon Project handled solid-fuel rocket design and production. MacDavid, who worked as a technician and crew chief on the project in 1943–45, and then at JPL for more than 40 years, is researching the project's history and welcomes stories and information from other participants. He can be reached at 818-794-2919.

MacDavid is puzzled about one thing: although he has found five magazines, maps of the project obtained from the Caltech Archives show only four. Does anyone remember?

### Honors and Awards

Herbert Keller, professor of applied mathematics, will receive the 1994 Theodore von Kármán Prize, presented annually by the Society of Industrial and Applied Mathematics, for his advances in numerical methods for solving important problems in mechanics.

Gilles Laurent, assistant professor of biology and computational and neural systems, has been selected as a 1993 Presidential Faculty Fellow, a distinction bestowed by the U.S. president and the National Science Foundation "to recognize the scholarly achievements and potential of the nation's most outstanding science and engineering faculty [only 15 of each per year, nationwide] members early in their careers."

Ray Owen, professor of biology, emeritus, has been awarded the Thomas Hunt Morgan Medal, for "his lifelong contribution to genetics, not only as a discoverer of key principles in immunogenetics, but also as a teacher" by the Genetics Society of America. Owen's discovery of immunological tolerance made tissue transplantation possible.

William Pickering, professor of electrical engineering, emeritus, and former director of JPL, has been named cowinner of the prestigious Japan Prize, for his work in aerospace technology. Pickering shares the honor with Swedish biochemist Arvid Carlsson. Pickering is also the first recipient of the François-Xavier Bagnoud Aerospace Prize, sponsored by the European-based Association François-Xavier Bagnoud.

John Roberts, Institute Professor of Chemistry, Emeritus, is the American Chemical Society's 1994 recipient of the Arthur C. Cope Award, a tribute to the "crucial role" he has played for more than four decades "in the explosive growth of physical organic chemistry," a development that has "profoundly influenced the way we currently think about and teach organic chemistry."



# Ad Astra per Aspera

Blizzards on Mauna Kea haven't stopped construction of Keck II, the second of twin 10-meter telescopes collectively known as the W. M. Keck Observatory. Mauna Kea is on the Big Island of Hawaii, but winter at 13,600 feet is brutal anywhere. A recent storm dropped two feet of snow that hurricaneforce winds piled into eight-foot drifts. The storm caused minor damage within the dome, and toppled a crane outside. However, these setbacks shouldn't delay the telescope's completion by 1996.

Keck I, now fully operational, is the largest optical and infrared telescope in the world. When Keck II is completed, the two telescopes can be aimed independently at different targets. But they can also be focused on the same point, and their light combined to create a single instrument with the resolving power of an 85-meter mirror—the distance between the two telescopes.

The Keck Observatory is a joint project of Caltech and the University of California.



Top: The Keck site. Keck I is garbed in heat-reflecting white, while Keck II is still primer red. The Japanese National Large Telescope, also under construction, is behind Keck I. Bottom: A few more panels, and Keck II's dome's inner wall will be ready for the next step—a five-inch layer of foam insulation.