## HÄNSCH RECEIVES NEW ITALGAS PRIZE FOR RESEARCH AND INNOVATION

To celebrate its 150th anniversary and to pay homage to the "scientific and technological tradition of Turin and of Europe," the Società Italiana per il Gas (Italgas), an Italian natural gas company, last year presented the first Italgas Prizes for Research and Innovation. Intended to recognize scholars and researchers in the European Economic Community who have "distinguished themselves particularly in basic fields of civil and social progress," the prizes will be awarded annually for ten years. Each awardee will receive 100 million lire (which was worth about \$80 000 when the 1987 winners were announced). The 1987 winners were selected from finalists chosen by the Turin Academy of Science.

Theodor Hänsch (Max Planck Institute for Quantum Optics and the University of Munich) is the first physicist to receive the prize. He was honored for his work in very-highresolution nonlinear atomic spectroscopy, such as two-photon spectroscopy, in which the Doppler effect is eliminated. In 1970 Hänsch built the first monochromatic tunable dye laser, and he pioneered saturation and polarization techniques that eliminate Doppler broadening in spectroscopic measurements. He has applied these techniques to studies of the hydrogen atom and other simple atomic systems; in 1975 he measured the Lamb shift of the ground state of atomic hydrogen.

Hänsch received his MS (1966) and his PhD (1969) from the University of Heidelberg. He went to Stanford University in 1970 on a NATO fellowship, and remained to become associate professor of physics in 1973 and full professor in 1975. In 1986 he became a director at the Max Planck Institute for Quantum Optics and a professor at the University of Munich.



Theodor Hänsch

## APS HONORS GO TO PARTRIDGE AND BLAND

The American Physical Society in April presented the 1988 Award for Research at an Undergraduate Institution to R. Bruce Partridge (Haverford College) for his "internationally recognized research in the study of the cosmic microwave background radiation and for his enthusiastic, conscientious and outstanding commitment to the guidance of the undergraduate students participating in his research." He has studied the cosmic microwave background, in particular its angular distribution, since the late 1960s. Partridge has also collaborated with his undergraduate students on several papers on the microwave background, the mass density of the universe, intergalactic dust and radiosource counts.

Partridge received his AB from Princeton University (1962) and his



R. Bruce Partridge

PhD from Oxford University (1965). He went to Princeton in 1965 as a lab instructor and became an assistant professor there in 1967. In 1970 he went to Haverford as an associate



Roger W. Bland

professor. Partridge became a full professor there in 1977 and the Marshall Professor of Natural Science in 1982.

APS presented its 1987 Award for