AIP SURVEY FINDS INCREASE IN POSTDOCS

Physicists earning physics doctorates in 1986 were much more likely to accept postdoctoral positions and much less likely to take potentially permanent jobs compared with those who received PhDs the year before, according to the report on AIP's 1986 employment survey. Based on replies to the survey, done in December 1986, 62% of the new physics PhDs were doing postdocs versus 51% the year before. One-third of the 1986 physics PhDs were in potentially permanent jobs, while in 1985 nearly half were. "Thus," the report observes, "an approximate 1:1 ratio between postdocs and potentially permanent positions in 1985 became nearly a 2:1 ratio between the two groups in one year."

The proportion of foreign students among respondents to the AIP survey increased from 27% to 32% between 1985 and 1986, and foreign students earning PhDs were much more likely than US students to take postdocs. Among experimenters, for example, 74% of the foreign students were doing postdocs in 1986, and just 55% of the US students.

Commenting on the shift from potentially permanent to postdoctoral employment, the report says: "Both US and foreign graduates contributed to this shift but for different reasons. Foreign graduates by and large hold visas that restrict their employment to temporary postdocs; US degree recipients, on the other hand, choose temporary postdocs when they perceive the market to be favorable and consequently feel free to pursue specific research interests for a limited time."

The report includes tables contrasting the ability of new PhDs to continue working in their specialties in potentially permanent jobs and in postdocs. To take an extreme example, among the students doing postdocs, 76% of those who did their doctoral work in nuclear physics were continuing to do research in nuclear physics; among those who accepted potentially permanent jobs, just 10% of those with nuclear physics PhDs obtained positions in that subfield.

Newly employed PhDs in potentially permanent jobs earned a median monthly salary of $3250 in 1985–86, up from $3120 the year before. Median salaries ranged from $2000 at four-year colleges to $3570 in industry.

Physics masters earned a median monthly salary of $2300, and bachelors $1930. Bachelors working for defense contractors had a median monthly salary of $2315, while those teaching earned $1350. Those with BA rather than BS degrees in physics tended to earn less but they were more likely to have jobs.

The 1986 employment survey is available free of charge from Susanne D. Ellis, Education and Employment Statistics Division, American Institute of Physics, 335 East 45 Street, New York NY 10017.

BECKERS LEAVES NOAO FOR ESO PROJECT

Jacques Beckers, the associate director for advanced development at the National Optical Astronomy Observatories in Tucson, Arizona, is leaving that job, effective 1 August, to work for the European Southern Observatory in Garching, West Germany.

Beckers's main responsibility at NOAO was designing and planning the National New Technology Telescope, which was intended to have an effective light-gathering area of 15 meters, and he has resigned specifically because of the bleak outlook for that project. Beckers will join the design team working on ESO's Very Large Telescope, a $250 million project that received official approval from ESO's governing council last December (PHYSICS TODAY, April, page 80).

The US 15-m telescope was singled out as a top priority by the Astronomy Survey Committee of the National Academy of Sciences in 1982, and following reorganization of the national observatories and establishment of NOAO in 1983, it was decided that the instrument—intended to be the world's largest—would be a multiple-mirror telescope consisting of four 7.5-m honeycomb mirrors of the type designed by Roger Angel at the University of Arizona (PHYSICS TODAY, January 1985, page 91). Soon after that design was adopted, however, Caltech announced that it would build the 10-m Keck Telescope on Mauna Kea in Hawaii, employing a segmented-mirror technology developed by Jerry Nelson at Lawrence Berkeley Lab.

At ESO, Beckers will be responsible for a project aiming at high angular resolution by means of adaptive optics on existing optical telescopes and the Very Large Telescope. A native of the Netherlands and a naturalized US citizen, he earned a doctorandus degree in 1959 and a doctorate in astronomy in 1964, both at the University of Utrecht. From 1962 to 1979 he worked as a research physicist at Sacramento Peak Observatory and for shorter periods at the High Altitude Observatory in Boulder, Colorado. He became director of the Multiple Mirror Telescope Observatory on Mount Hopkins in 1979, and director of the advanced development program at NOAO in 1984.

AIP HISTORY GROUP WILL STUDY LARGE COLLABORATIONS

The Center for History of Physics at the American Institute of Physics has launched a study on the documentation of multi-institutional collaborations in physics and allied sciences. The objective of the project is to provide guidance on preserving meaningful historical records of large scientific collaborations.

In an initial two-year phase, the history center will study collaborations in high-energy physics, gathering information from experiments conducted since the early 1970s at Brookhaven, Fermilab, SLAC and Cornell University's Newman Laboratory of Nuclear Studies. It is anticipated that collaborations in space science and geophysics will be studied next.

History center staff will identify patterns of collaboration, define problems associated with the documentation of collaborations, test possible approaches to securing documentation and formulate recommendations for archivists at laboratories and other scientific institutions.

Partial support from the National Historical Publications and Records Commission and a commitment from NSF have permitted the history center to start up the project. A panel of distinguished advisers has been assembled, and the project manager is Joan Warnow.

FEL INVENTOR MADEY LEAVES STANFORD FOR DUKE

John M. J. Madey is leaving Stanford University for Duke University, where he plans to build a program to explore broad scientific and medical applications of free-electron lasers. Toward the end of this year the Mark III free-electron laser will be moved from Stanford to an underground nuclear physics facility at Duke that housed a retired Van de Graaff parti-