

Sally Ride to leave NASA orbit; exodus at NSF

Sally K. Ride, America's first woman in space, shocked even her friends among the officials and astronauts at NASA on 26 May by announcing she was leaving the agency this fall to join Stanford University's Center for International Security and Arms Control. With her departure, Ride, who turned 36 the day of her announcement, brings to 10 the number of astronauts to leave the agency since the Challenger explosion in which the crew of seven were killed. She declined to discuss the reasons for her decision, issuing instead a brief statement released by NASA: "I am confident of the future of our nation's space program and will always remember my friends at NASA. The various projects I have participated in have allowed me to grow as a scientist and a person. It is in that same spirit of challenge that I have accepted a position at Stanford University."

The next shuttle mission, which had been scheduled for next February, has now been reset for the following June. Ride, who flew twice aboard the Challenger, had been assigned to a third mission on the same spaceship for a flight in July 1986. The Challenger blew up on 28 January 1986. As the only astronaut on the Presidential commission that investigated the Challenger disaster, Ride was recognized for her technical questions and tenacious skepticism before a national television audience (PHYSICS TODAY, August 1986, page 41). During the Challenger hearings she regained the celebrity she won, to her personal discomfort, during her first flight, a six-day mission in June 1983, when the US was smitten with "Sallymania." She flew an eight-day mission the following year. After the hearings she was boosted into NASA headquarters to head a major study on the agency's long-range goals. In a preliminary version of the study's report, Ride, who holds a PhD in x-ray astrophysics from Stanford, identified four "leadership initiatives"—namely, a permanent base on the moon, "manned" exploration of Mars, extensive study of Earth from space, and examination of the Solar System by robots. The report is to be presented to NASA on 1 August.

The National Science Foundation was shaken by virtually simultaneous announcements that four of its most experienced division directors were leaving the Mathematical and Physical Sciences Directorate. "There's no sinister plot in these departures," says Richard S. Nicholson, who heads the directorate. "It's just bad luck that all these guys are leaving within a few months of each other."

The first was **John C. Polking**, who was on leave as Rice University's mathematics department chairman. When he arrived at NSF in 1984 to direct the mathematics division, no graduate students in mathematics were supported by the agency. "It was a legacy of the 1960s," says Polking, "when horror stories were told about PhDs in mathematics driving taxis." He turned the situation around with the timely help of the David report (see PHYSICS TODAY, September 1984, page 71), which called on NSF to strengthen mathematics education at all levels. In 1986 the foundation funded some 800 math grad students, who averaged about \$5000 per year—considerably less than physics or chemistry students receive. Polking also directed the agency's response to the David report. He originally agreed to spend two years at NSF and was persuaded by Nicholson to stay a year longer. Polking will return to Rice this summer.

Next came the resignation of **Lewis A. Nosenow**, director of materials research, who left in February to be vice chancellor for research and dean of graduate studies at the University of California at Irvine. Before joining NSF in 1974 Nosenow had taught physics at the University of California at San Diego, University of Minnesota, University of Florida and University of Chicago, where he also was associate provost. Nosenow's legacy to the foundation is better funded and better operated materials research labs at universities, newly developed materials research groups and greater support for laboratory instrumentation all around. Under his direction NSF funded work in superconductivity, which had been moribund for decades. "Everyone claimed all fundamental under-

standing of superconductivity was completed in the 1950s and 1960s," says Nosenow. "We held a workshop on the subject early last year and wrung our hands in despair. Nobody seemed to have any good ideas, but we continued to hand out grants to physicists who were not only persistent but imaginative. Now, with the recent discoveries at much higher temperatures and much different materials, NSF is able to boast about the good work it backed in those dismal days."

The other departing division directors are **Edward F. Hayes** of the chemistry division and **Harvey B. Willard** of the physics division. Hayes, who had taught at Johns Hopkins and Rice Universities, arrived at the agency as a one-year "rotator" in the chemistry program and was lured away by the White House Office of Management and Budget to be a budget analyst for NASA and the National Bureau of Standards. When Hayes returned to NSF in 1983 with budget-making experience, Edward A. Knapp, then the foundation's director, named him the first controller in the agency's history. Hayes is going back to Rice to be associate provost and vice president for research.

Willard came to the agency's physics directorate in 1981 after 24 years at Case Western Reserve University, where he had been, successively, physics professor, department chairman, science dean and vice provost. Before that he spent seven years at Oak Ridge National Laboratory. He is best known for running the Nuclear Science Advisory Committee, which provides advice to NSF and the Department of Energy on proposed programs and facilities to put their money into. "Harvey proved to be a sound, steady, scholarly and sympathetic program officer," says an NSF colleague. Willard never wanted to be physics division director, but took the job for one year last August when Marcel Bardon, who had held the post, went off to NATO. True to his word, Willard announced he will leave this August, visit his daughter and her family, now living in Europe, then decide on his next career.

—IRWIN GOODWIN □