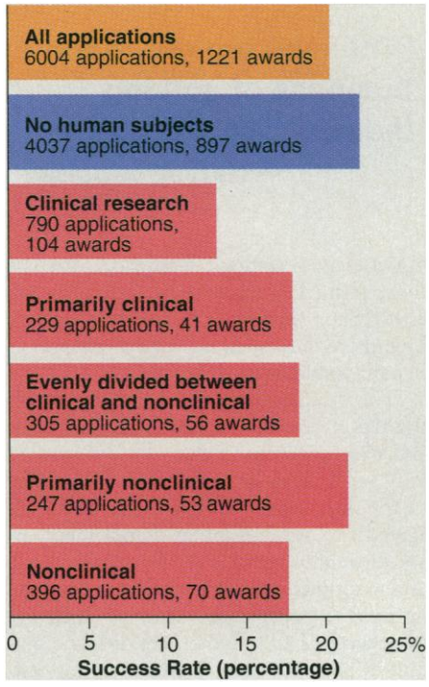
BIOMEDICAL RESEARCH

Clinicians Catch Top NIH Officials' Attention

Researchers who work with patients—as distinct from those who work only with mice or molecules—often feel like the Rodney Dangerfields of biomedical research: They believe they don't get no respect, at least at the National Institutes of Health (NIH). Recently, they've been agitating for more, and they seem to be succeeding. In recent weeks, NIH leaders have acknowledged the importance of what they're calling "patient-oriented research." The NIH chiefs are taking steps to improve training of clinical researchers, and they're weighing changes in peer review that may help clinicians win more grants in the future.

This attention to clinical research is being driven by a couple of organized efforts, each with different goals. One is a political campaign of sorts, led by well-known physicians such as Edward Ahrens, professor emeritus at Rockefeller University, and by a professional lobby, the American Federation for Clinical Research (AFCR). Their aim is to persuade Congress and NIH Director Harold Varmus to steer more money toward clinical studies. AFCR President Roy Silverstein, an oncologist at Cornell University's New York Medical Center, says he is convinced "patient-oriented research is being underfunded because of some inherent flaws in the review process" at NIH. The other push comes from Varmus. Although he doesn't necessarily agree with the physicians that their proposals are being given short shrift, he is concerned that the quality and management of clinical research at NIH may need attention.

In their campaign for more funding, clinical researchers have been citing two studies that appear to give them support. The first, published by the Institute of Medicine (IOM) last summer, was put together by a group of top medical professors chaired by William Kelley, dean of the University of Pennsylvania School of Medicine. The report offered little new data, but it sounded a loud alarm: Funding for patient-oriented research from any source has become "difficult to obtain," training of clinicians does not prepare them for today's cutthroat competition for research funds, and medical economics are making it harder and harder to practice medicine and conduct research at the same time. The Kelley panel offered a dozen recommendations, urging Congress to give more support to the 75 general clinical research centers NIH already backs and encouraging NIH to restructure extramural peer review.



Shortchanged? The Williams panel found that proposals involving human subjects *(red)* have a lower funding rate than the NIH average.

Even before the Kelley report was done, NIH had asked a panel of independent clinical leaders, chaired by Gordon Williams of Harvard Medical School's Brigham & Women's Hospital, to take a close look at NIH's peer review process as it applies to clinical grant proposals. The panel delivered its report to Varmus last month, and NIH will publish it when outside advisers' comments on the findings have been included.

The Williams panel found that proposals submitted for NIH's January 1994 round of reviews that were primarily focused on patients had the lowest success rate (only 13% got funded) of any category examined. Proposals classified as primarily laboratory-oriented research enjoyed a funding rate of about 22%, while the success rate for all proposals was 20%. Applications that were revised and resubmitted—whether based in the clinic or the lab—fared about the same, indicating that clinicians may start out less skilled in grants writing, but learn quickly as they go through the mill. The panel concluded that, in general, clinical proposals did worse than nonclinical proposals in study sections. This led the Williams panel to the most controversial of its six recommendations: NIH should create one or two special study sections composed mainly of clinicians and funnel patient-oriented research proposals to them.

NIH officials argue that the data from the Williams panel study may be too sketchy to justify such a strong remedy. For example, Jerome Green, director of the division of research grants, says no one has determined exactly why clinical applications did poorly in initial reviews in 1994, and it would be important to learn the answer before making big changes. Perhaps, he says, the merit scores awarded by study sections were "fitting and deserved."

Taking a step back from this debate over study sections, Varmus recently pointed out that most clinical research funded by NIH goes through a different system. As he told a meeting of the American Association of Medical Colleges last fall, the NIH institutes use special ad hoc panels to select winners of targeted program grants—many of which support clinical research.

Nevertheless, Varmus says he is taking the clinicians' complaints seriously. He recently named Lawrence Shulman, former director of the National Institute of Arthritis and Musculoskeletal and Skin Diseases, to be a new emissary to keep him attuned to clinicians' concerns. Plans are being developed to create what Varmus has called a "blue-ribbon panel" of senior scientists to undertake a sweeping review of clinical research funded by NIH. And just last week Varmus launched a review of the structure of the Division of Research Grants, which manages the peer reviews of applications for NIH's $9 billion pool of grant money (see p. 443). One of many ideas likely to be considered in this review is the clinicians' plea for a study section that specializes in clinical science.

In addition, Varmus and John Gallin, director of NIH's clinical center, have started a program to improve the training of clinicians at NIH. The first class of 20 will begin in April; by summer, Gallin hopes to increase enrollment to 100. After a test period, he plans to export the new curriculum to medical schools, most of which do not give instruction specifically on how to conduct clinical research. Varmus and Gallin hope it will set a standard for the nation.

These gestures have pleased Silverstein, who says he is "fairly optimistic" now because NIH "is taking some interesting and creative steps to address problems" in the peer-review process. Silverstein is encouraged as well by expressions of interest—still somewhat vague—by Senator Mark Hatfield (R–OR), the new Republican chair of the Senate appropriations committee. Hatfield's aide, Susan Hildick, says the senator is "concerned" and plans to "take a close look" at the argument that clinical research needs more support.

–Eliot Marshall