NAS Finds Flaws in RANN

The applied social sciences research projects supported by the National Science Foundation's RANN (Research Applied to National Needs) program are subjected to some hard criticism in a report released last month by the National Academy of Sciences.

The study, initiated last summer by NSF's new deputy director, psychologist Richard C. Atkinson, was commissioned to give the agency a fresh independent assessment of its programs of social and behavioral sciences research, both basic and applied. The panel is headed by psychologist Herbert A. Simon of Carnegie-Mellon University and composed almost entirely of academic social and behavioral scientists.

The group looked with favor upon the basic research side, saying the quality of the projects supported was "generally excellent." It pushed for more of the same, noting that only 30 percent of qualified investigators in these sciences get federal support, as compared with 58 percent of investigators in the hard sciences. It added that budgetary limitations notwithstanding, more consideration should be given to projects that require long-term or large-scale support.

There were few kind words for the applied research projects, which were found to be of "highly variable quality and on average, not impressive." The critique of the program is dotted with words like "pedestrian" and "unhealthy" —reportedly much to the distress of some RANN officials who believe the panel does not fully understand how things operate around there.

The committee felt that a fundamental problem with management of the RANN projects is that the planning process has a "top down character," with problems being defined by the RANN staff and the "user" community more than by investigators themselves. ". . . [T]he organization is structured to identify applications in search of science, rather than science in search of applications," says the report. One result of this approach is that the applied program jumps around too much with short-lived attacks on problems of the moment and not enough attention is given to long-term societal problems. The projects, therefore, are "relatively undistinguished, with only modest potential for useful application." (No examples of such marginally useful projects are given.) The report says that too many of the research proposals originate from the agency, a policy that is not particularly attractive to first-rate investigators, and too many of the projects are executed by nonprofit or profit-making corporations rather than universities—all of which, in the panel's opinion, exaggerates the gap between user and research communities.

The study group, which made no secret of its academic bias, believes management of RANN social science research should more closely emulate the model set in the basic research division, with more reliance on unsolicited proposals. Reorganization along these lines, says the report, would reduce the number of staff required and "would lead quite logically to the creation of an applied social and behavioral science division with RANN" (the projects are now scattered among RANN's five divisions). It would also mean more high-level social and behavioral scientists at NSF.

Social science research has always dwelled somewhat uncomfortably at NSF, eyed with suspicion by those who believe the agency's proper role is as supporter of basic research and hard science. The increasing visibility of the social sciences has coincided with a surge in hostile congressional scrutiny. The panel says NSF is going to have to do a lot better in making the case for social sciences not only before Congress but in other parts of the agency itself, where the "level of appreciation of the social sciences . . . is not impressive."

In addition to its implicit call for more money—the report points out that 24 percent of the nation's basic researchers are social and behavioral scientists but they only get 7 percent of the NSF budget—the panel believes the time has come to study the feasibility of setting up national laboratories, such as exist for the physical sciences, to fill research needs that can't be met at individual facilities. A computer facility for cognition and a psychoacoustics laboratory are two of the examples given.

Atkinson emphasizes that this is an interim report and may sound a little harsh because "we told them to take as tough a view as you can." The final report is to be issued in June.—C.H.

outward appearance of an illuminating battle between titans. Unfortunately the main issue is never joined, because Wilson denies that he says what the Sociobiology Study Group claims he says. The group has "utterly misrepresented the spirit and content" of the book, Wilson charges. They "cite piece by piece incorrectly, or out of context, and then add their own commentary to furnish me with a political attitude I do not have and the book with a general conclusion that is not there."

The chief bone of contention thus dissolves into an arid analysis of Wilson's text. This reporter's opinion, for what it is worth, is that Wilson is substantially if not wholly correct in claiming that his critics have seriously distorted what he says. On the issue, for instance, of how much of human social behavior may be genetically determined, the Sociobiology Study Group portrays Wilson's position as thoroughly determinist, even though he says in the book that "the genes have given away most of their sovereignty" and has since stated that maybe 10 percent of social behavior has a genetic basis. The group dismisses these qualifications and says that Wilson's "effective" position is "an extreme hereditarian one." The reader of *Sociobiology* may get the impression that the author believes somewhat more than 10 percent of human social behavior is genetically based, but there is no good reason for assuming he is an extreme hereditarian.

The Sociobiology Study Group consistently misrepresents Wilson's arguments by removing the hedges. A particularly flagrant example concerns "conformer genes." The group attacks him for asserting that such genes must exist, whereas in fact they are merely postulated. "In speaking of indoctrinability, for example," the group says in its letter to the *New York Review of Books*, "he asserts that 'humans are absurdly easy to indoctrinate' and therefore 'conformer genes' must exist." What Wilson actually says is: "Human beings are absurdly easy to indoctrinate—they seek it. If we assume for argument that indoctrinability evolves, at what level does natural selection take place?" The invocation of conformer genes occurs a few sentences later as what is clearly part of the "if we assume for argument." A second example is the charge that, by applying to insect societies such metaphors as "slavery" and "caste," Wilson "promotes the analogy between human and animal societies and leads one to believe that behavior patterns in the two have the same basis." Unwary readers might not guess that Wilson prefaces his comparison with the statement, "Roles in human societies are fundamentally different from the castes of social insects."