

The sea-level data present no conflict in that I believe in the Mid-Wisconsin high stand of sea level reported by others (1). The only difference of opinion here is that 37,000 years ago is a Mid-Wisconsin date and not that of the Wisconsin-Illinoian interglacial (Sangamon).

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Reference

1. *The Bering Land Bridge*, D. M. Hopkins, Ed. (Stanford Univ. Press, Stanford, Calif., 1967).

Shift of NSF Funds

In a report entitled "Toward a Public Policy for Graduate Education in the Sciences" (1), the National Science Board has made a number of official recommendations for changes in the "mechanisms of federal support" of research and graduate education. The most novel and controversial of these is to shift a large portion of the funds currently allocated by the National Science Foundation for the support of scientific research through many individual research contracts and grants to the funding of a much smaller number of large "institutional sustaining grants" to be administered by the various universities. Just what portion of NSF expenditures is to be devoted to such institutional grants is unclear except that it will be a very significant fraction of the current \$400 million budget.

We believe this proposed changeover to institutional grants is not in the public interest. First, if the decision to allot the grants is left to the university administrations, research will receive less total funding than at present. Administrations are apt to be overresponsive to current student demands for more undergraduate teaching and less research and graduate education by the faculty. Moreover, they are under steady pressure to increase the financial support of undergraduate students. Second, an important purpose of graduate education is to bring the student up to the prevailing frontiers of knowledge, and this is inconceivable without a faculty steeped in active research. Peaceful periods of sustained activity free from interruptions, such as the summer vacation, are necessary to do this research. Any plan which reduces support for research, especially summer research, will be detrimental.

Third, the system of "institutional sustaining grants" will create interdepartmental problems with regard to the sound apportionment of funds between individual members within departments. As it is, the universities and their departments are overburdened by questions of judgment and comparison of the relative merits of their faculty members. To this very time-consuming task would now be added the arduous one of evaluating individual research projects. Whatever arbitrary formula is followed, it will be less objective and fair than the present refereeing and reviewing system employed by the NSF, Office of Naval Research, and other research funding agencies. For instance, it might be decided to divide the funds allocated to mathematics uniformly over the whole department, giving summer research support to all who want it. This would lower the summer stipend below the two-ninths of the academic year salary which the NSF allows. Quality would suffer and mediocrity would be encouraged instead of a premium being placed on important projects. Reduced summer salaries would discourage young mathematicians who would interpret it as a sign of lowered priorities for research. Contrary to the opinion of many administrators, the hope of financial compensation cannot be dismissed as an incentive for stimulating good research. One need only contrast the weak position of research in most American universities of the pre-World War II period with the situation today to measure the importance of a national policy of sustained and direct financial support for individual research.


For these reasons we believe that the plan proposed by the NSB will create more problems than it will solve and will be inferior to the existing system which is working relatively well. If changes are necessary, then why not retain the existing system for funding the projects of the senior faculty, and support the research efforts of younger faculty members through departmental rather than institutional grants?


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Reference

1. *National Science Board Report 69-1* (Government Printing Office, Washington, D.C.), pp. 41-50.

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