GENERAL SCIENCE

## Research To Be Supported

Has been advocated at Senate hearings, but world implications of atomic energy proposals overshadow national science plans.

THERE is going to be government support on a large scale for the sort of scientific research that will wrest new secrets, not just from the atoms, but many other sectors of the scientific unknown.

That much was clear with the Senate hearings on the National Research Foundation bills in their second week. And coupled with the broad research set-up are provisions for a plan for scholarships and fellowships for promising young scientists that will keep the scientific personnel of the nation up to fighting strength, ready to battle disease, poverty, and depression as well as military enemies.

The difference of opinion in the hearings arises with regard to how the proposed National Research Foundation is to be controlled and whether or not the act shall specify the degree of patent control the government shall exercise over the results of researches.

The organization for the proposed foundation provided in the bill of Senator Harley M. Kilgore (Dem., W. Va.), is a so-called "in-line" plan, consisting of a director, with an advisory committee with scientists in its membership and working divisions headed by scientists and committees of scientists. The director would have powers and responsibilities similar to those of a federal department head, and he would be appointed by the President and confirmed by the Senate and therefore be removable by the President. This form of organization has been supported in testimony of Secretary of Commerce Henry Wallace and Budget Director Harold D. Smith.

The other suggested organization for the Foundation would put control in a board of nine Presidential appointees who would serve without compensation and who would appoint a director to serve under them. This procedure was recommended by the "The Endless Frontier" report of Dr. Vannevar Bush, director of the Office of Scientific Research and Development, and is provided in the bill of Senator Warren G. Magnuson (Dem., Wash.).

The Kilgore form of organization is attacked on the ground that it puts the

control of scientific research into the realm of so-called "political" control, while the Magnuson plan is criticized because the director is too far removed from democratic control and the governing board would tend to be static and unresponsive to changing conditions.

In both plans, just as in the wartime OSRD, scientists themselves would plan the details and carry out the researches. Under, both plans the research itself would be done largely through contracts by university and other non-profit laboratories and industrial laboratories, not by the Foundation itself.

Who shall own the discoveries and any patents resulting is another controversial question. Under the OSRD, and current Army and Navy practice, the gov-

ernment retains only the right to use the results of the research in the work of the government itself. The commercial rights in patents go to the individual scientist and are usually assigned to the industrial or other laboratory conducting the investigation, even though the research is done largely or wholly with government money. This practice is virtually continued under the Magnuson bill through its failure to cover the matter of patents. The Kilgore bill provides that inventions and discoveries resulting from federally financed projects shall be the property of the United States, directs that they shall be patented, and authorizes nonexclusive licenses for all who wish them.

The Kilgore provisions are not favored by industrialists and scientists allied with industry, who would rather see the kind of contract made with the laboratories varied to suit the conditions of the particular piece of research to be done. They predict reluctance on the part of industrial laboratories to undertake investigations with government money if patent rights are lost. On the other hand, supporters of the Kilgore bill feel



BRITISH "FROGMEN"—In their skin-like diving suits, "frog" goloshes, and streamlined breathing helmets, these men of the submarine commando army swam underwater, towing on the surface explosive-packed pneumatic dinghies, placed their demolition charges so skillfully that 3,000 otherwise indestructible underwater steel obstacles blew up under German noses. They also cleared the enemy minefields laid off the invasion coast to make the safe landings on D-Day possible.