sures, both domestic and international, for another round of testing that there have been in the present situation. Here, the rather free talk of Administration officials of the unlikelihood of our having to test again following the presumed new Russian tests may indicate not only an effort to reassure those who are opposed to the present testing but an inclination to get the jump on those who will be charging the Administration with appeasement if it fails to follow a second Russian series with a second American series.

Last Sunday evening the President gave a dinner for Nobel laureates living in North America, plus a scattering of guests who had not won the prize, of whom the most significant was J. Robert Oppenheimer. Oppenheimer was ruled a security risk in 1954 after a hearing in which his opinions on national security policies appeared to be more of an issue than his leftist associations prior to 1942. In particular, Oppenheimer had been chairman of the AEC General Advisory Committee in 1949 when the GAC recommended against an immediate crash program to develop the hydrogen bomb. Although the GAC recommendation was unanimous (with one member unrecorded), the witnesses against Oppenheimer placed the blame on him, asserting that he had enormous powers to sway others to his views.

In a more general way, Oppenheimer was accused of undermining the effort to build a massive nuclear deterrent by pressing for alternative use of resources. On several of the subordinate issues, such as the need for continental air defense, tactical nuclear weapons, and conventional non-nuclear forces, Oppenheimer's position has since become accepted national policy. But at the time, it seemed to some people reasonable to suspect that Oppenheimer was, or might well have been, motivated not by an honest difference of opinion over the most effective defense policies, but by a conscious desire to deflect American policy from its most effective course, presumably through some combination of leftist sympathies and softhearted pacifism.

Only one witness (not Teller) questioned Oppenheimer's loyalty, and the review board explicitly absolved Oppenheimer of that charge. But apparently the view prevailed that it was dangerous to have such a purportedly pursuasive man of such purportedly unsound views advising the government on questions of high national policy.

The decision was not formally on these grounds, for they would imply at most only that the man should not be used as a consultant to the government, not that he was a security risk. The decision was based essentially on various incidents and associations of Oppenheimer prior to 1943, none of which involved any leakage, or alleged leakage, of security information. All of this information had been known to the AEC for years, and had been reviewed in detail before he had been granted clearance in 1947. In 1954, though, any number of people who were no more serious "security risks" than Oppenheimer suffered similar humiliations. The Alsop brothers, who had been the most effective supporters in the press of the crash program for developing the hydrogen bomb which Oppenheimer had opposed, wrote that Oppenheimer had been made a "burnt offering" to the spirit of McCarthyism. They produced an elaborately documented book on the case called *We Accuse* (after Zola's defense of Dreyfus), but neither the Alsops' book nor the efforts of Oppenheimer's defenders, in and out of the scientific community, produced any concrete results. Oppenheimer's position outside the government did not suffer in any obvious way (he is head of the Institute for Advanced Study at Princeton), but he remains, officially, a security risk.

After the new Administration took office, this reporter asked a high official whether any sort of formal relief was being considered on the Oppenheimer case. The answer was that it was difficult to see exactly what could be done that would be in Oppenheimer's best interest. The view, perhaps a sound one, was that any overt action would do as much harm as good to Oppenheimer by opening the door to a public raking-over of all the old charges. Essentially the same argument is made on suggestions that several other victims of the McCarthy era receive some sort of formal absolution. On the other hand, it can, of course, be argued that the Administration is worried more about the possible political liability of overt steps. Oppenheimer's invitation to dinner at the White House presumably was intended as a modest compromise between the political and personal problems inherent in a formal reinstatement and the needs of conscience.

—HOWARD MARGOLIS

Fallout Shelters: Administration's Program Is Facing Difficulty On Capitol Hill

The Administration's civil defense program appears to be bound for drastic surgery in the House of Representatives.

Having sat by patiently and, in many cases, extremely attentively during the long and often emotional public debate over a nationwide fallout shelter program, the House is now about to exercise its vital function of writing the checks. The final decision has yet to work its way through the complex and frequently unpredictable appropriations process, but the prevailing sentiment appears to be fairly divided between indifference and hostility. Unless the Administration is able to work some magic on the generally untractable members of the lower house, it seems very likely that the $695-million civil defense request is going to be liberally cut; just how much is uncertain, but 50 percent is said to be the amount in the mind of Rep. Albert Thomas, the reticent and highly influential Texas Democrat who chairs the Independent Offices subcommittee, the body that passes on civil defense funds.

In past years Thomas has whacked 50 to 75 percent from Administration civil defense requests, basing his opposition on what was generally regarded to be the ineptitude of civil defense management. The current Administration program—for whatever its worth and whatever its implications may be in the broad context of the Cold War—is acknowledged to be in competent hands, but Thomas and a good number of his colleagues are understood to regard it as an almost meaningless, and quite costly, response to the possibility of nuclear attack. As one member of Thomas's seven-man subcommittee put it: "I've studied the Administration program, I've talked to the civil defense people, I've read lots of studies, and still no one has been able to convince me that this fallout shelter program is worth a damn."

Mail and Polls

Civil defense officials seeking to cultivate congressional support have cited the enormous volume of inquiries they receive as evidence of grass roots support for the program; but congressmen consider themselves pretty well tuned into the more sensitive concerns of their constituents, and the mail flooding

civil defense offices weighs little in comparison with the sentiments congressmen deduce from the constituents' mail, their own polls, and talks with people who have the power to determine whether they return to Congress next January. The conclusions thus derived are that the spirited public debate over civil defense bores most of the voters and that a majority of those who can be brought to think about it are against it. In the parlance of the trade, the issue lacks political mileage, and promoting it may even be a political liability.

This conclusion is supported by a number of polls that House members have taken among their constituents. The techniques employed may not reflect all the refinements of public opinion sampling, and the folks back home are quite capable of endorsing such seemingly contrary goals as more missiles and lower taxes, but the polls are given a most attentive reading in the House. It is common practice for a member to offer his colleagues the benefit of his findings by inserting his polling results in the *Congressional Record*, where they unquestionably contribute in an unmeasurable fashion to the formation of the House's climate of opinion. One such insertion that seems to have attracted considerable attention was the work of Rep. Harold C. Ostertag, Republican of western New York, who sits on Thomas's subcommittee. In response to the question "Do you approve of federal aid for construction of public fallout shelters in schools, hospitals, and other public centers?" Ostertag reported he received 6700 replies, with 58.3 percent in opposition.

A similar question in a poll conducted by Rep. Walter Norblad, Republican of Oregon, received about 15,000 replies, with 87 percent expressing disapproval of civil defense; a poll by Rep. William E. Minshall, Republican of Ohio, drew 20,000 replies, with 69.4 percent opposing civil defense, and a poll by Rep. James G. O'Hara, Democrat of Michigan, found 52.4 percent of the respondents reacting negatively.

The path that lies ahead for the civil defense appropriation is strewn with opportunities for the friends as well as the foes of the Administration's program, but the starting point for the budget request—Thomas's subcommittee—puts the Administration at a disadvantage from the outset. Civil defense seemed for a time to have been removed from Thomas's jurisdiction when the Administration transferred the program out of the Executive Office and placed it under the control of the Defense Department, whose budget is reviewed by the Defense Appropriations subcommittee. The shift came last year, when the Kennedy Administration was basically operating under the budget bequeathed to it by the Eisenhower Administration; the decision to expand civil defense, by $207 million, was reflected in an addition to the Senate's defense appropriations bill. Senate approval of the appropriation was followed by a conference with the House Defense Appropriations subcommittee, which went along with the request. The House, against the background of the Berlin crisis and the Soviet nuclear test series, departed from its traditional opposition to civil defense and upheld the appropriation. The impression was thus created that by moving civil defense to the Defense Department Thomas had been outflanked for all time. When Congress returned for the second session, however, the civil defense jurisdiction was once again restored to Thomas's subcommittee, an action which suggests that the overall Appropriations Committee chairman, Clarence Cannon, of Missouri, is not brimming over with enthusiasm for the Administration's program.

Administration's Approach

The Administration's quest for Thomas's support has been pitched on the assumption that his past opposition was aroused by the questionable management and indecisiveness that had afflicted civil defense since its inception in 1950. However, with the program now located in the Defense Department and operated by a set of administrators who are rated high for competence, it seems that Thomas's doubts actually run deeper than concern over management, and many of these doubts have found support in the anti-civil defense attitudes flourishing in academic settings.

At a series of closed hearings last week, Thomas and his subcommittee received testimony from civil defense officials; it is understood that he considered their presentation to be the best offered by the Administration since he has been sitting in judgment over the program. At the same time, however, the subcommittee also took the unusual step of hearing nongovernment witnesses—described only as representing several academic and religious groups—who appeared in opposition to the Administration program. Thomas is reported to have found their views quite in harmony with his own thinking.

The Administration's fallout shelter program need not stand or fall on the sympathies of Congressman Thomas, but as the machinery of the House operates, his will is not to be easily overcome. The Appropriations Committee rarely does mischief to the products of its subcommittees, and the House does not often toy with the recommendations of the Appropriations Committee. When it does, the action is against the background of strong sentiment on the part of the chamber's rank and file, a factor which in this case seems either to be lacking or running in the wrong direction.

One slightly mystifying element in the legislative travail that seems to be shaping up for civil defense is the role of the White House. There is not one bit of evidence to indicate that the Administration is backing away from its deep involvement with civil defense; but, on the other hand, the White House's persuasive arts have not been overly employed in behalf of the program. Thomas is understood to have been called in for a chat with the President, but no broad effort has been made to cultivate support on Capitol Hill. The Pentagon's civil defense office has a former congressman in its employ as a legislative liaison man, but he is sticking to a low-key operation, and while he makes the rounds industriously, he is not infecting the Congress with any feeling of urgency. Even more significantly, it has been a long time since the President has had anything to say publicly about civil defense; nor have there been any recent public statements from Defense Secretary McNamara.

Tactical Problems

In seeking to arouse congressional support for its civil defense program, the Administration faces a difficult tactical situation. The appropriation that went through Congress last year unqestionably found its way eased by international tensions. These have now lessened considerably, with the result that the Administration's case for civil defense finds the public less apprenhensive about the likelihood of war. To cultivate public opinion as a weapon against congressional opposition to the

program would require an intensive effort aimed at making the world appear considerably more hazardous than it now appears to a great many Americans. A crisis of some sort may arrive to provide the Administration with a beneficial background, but with Berlin cooled off and talk of summitry on the increase, it seems likely that the appropriations measure will arrive on stage during a time of relative international calm.

If Thomas succeeds in sustaining heavy cuts in the budget request, it is not clear at this stage just what the effects will be on the overall civil defense program. The Administration's program is built around the use of existing structures for shelters and an incentive plan to encourage state and local governments and private nonprofit organizations to build shelters, the latter to cost $1.8 billion over a 5-year period. According to a member of Thomas's subcommittee, it appears likely that the group would be willing to continue the program to identify, mark, and stock buildings that offer fallout protection, "but it's going to be hard to convince us that we should pour a lot of money in building from scratch."

—D. H. GREENBERG

Space Cooperation: The Past Week Was a Busy and Fruitful One

International space cooperation was zipping along last week at something resembling orbital speed.

The most dramatic event was the arrival in this country of Major Gherman S. Titov, the Soviet cosmonaut, to participate in the Committee on Space Research meetings now under way in Washington. Titov's agenda had not been finally determined at this writing, but it appeared likely that his travels would include a tour of Cape Canaveral, with his U.S. counterpart, Lieutenant Colonel John Glenn, as a guide. Titov's arrival at the Cape would make him the first Soviet representative to accept an invitation to visit America's biggest and best-known space facility, and would indicate that the Soviets are becoming still less edgy about getting involved with the U.S. in joint space efforts. The Soviets accepted an invitation last month to visit Cape Canaveral with the U.N. Committee on the Peaceful Uses of Outer Space, but at the last minute declined without explanation.

The past week also saw the launching of the first international satellite, a 132-pound British device carried aloft at Cape Canaveral by an American Thor Delta rocket. The launching was a success. It was followed by another successful joint undertaking, the firing from Wallops Island, Virginia, of a sounding rocket carrying instruments developed by Japanese and American scientists.

During the week the way was cleared for additional undertakings in space cooperation with the announcement that the secrecy classification had been lifted from the geodetic "flashing light" satellite. The project is one for which the National Aeronautics and Space Administration originally shared responsibility with the military, but NASA stepped out when a security classification was applied.

The satellite, which is scheduled for launching sometime this month, carries a flashing light which will make possible earth measurements of far greater precision than can be obtained with existing techniques. The device fits in extremely well with the U.S. desire to have other countries know of the peaceful fruits of our space research, since even a simple astronomical telescope will be adequate for observing the light for measurement purposes.

The struggle to remove the security classification is reported to have been a hard one, that finally resolved with a decision from Roswell L. Gilpatric, the number two man in the Pentagon. The Defense Department's new combined intelligence organization opposed the decision on the ground that the precise earth measurements obtainable with the satellite would be useful for pinpointing missile targets. Derived measurements of the United States, the argument ran, would quickly become available to everyone, but measurements of Soviet territory would be hard to come by.

In the final showdown on the question of the satellite's security classification, the secrecy advocates found themselves arrayed against the President's science adviser, NASA, the House Space Committee, and the Pentagon's civilian authority. The most decisive argument was perhaps that, in the era of supermegaton weapons, the importance of precise measurement to the target becomes fairly negligible and is outweighed by the good will that could be derived from making the satellite available to the world.

Announcements

The U.S. Public Health Service, following a study by a subcommittee of the House Committee on Government Operations, has terminated the practice of awarding **research grants to profit-making institutions**. Present support to such organizations will either be discontinued at the termination of the current grant or continued under contract. The new policy affects only a small portion of the 15,000 PHS grants now in effect; the majority are to universities and other nonprofit institutions.

Educational Television Overseas, designed to provide **packaged ETV programs for developing countries**, is scheduled to begin operation this spring in London. School programs will be directed at both secondary and primary levels, with emphasis on teacher-training; adult programs for home viewing will concentrate on literacy, public health, agriculture, and child welfare. Notes on intended teaching points and suggestions for adaptation to local needs will be supplied with the kits, and ETO members will be available for work in the countries concerned.

Funds for the center are being supplied from private British sources, with grants of $280,000 promised by the British Government over the next 5 years. (British Information Services, 45 Rockefeller Plaza, New York 20)

Grants, Fellowships, and Awards

One- to two-year postdoctoral fellowships for basic research in the **chemistry and physics of fibers** are being offered by the Textile Research Institute in cooperation with Princeton University. Annual stipends will range from $7200 to $9000, depending on experience. (L. Rebenfeld, Textile Research Institute, Princeton, N.J.)

Applications for July 1964 appointments as **clinical or research associates** are now being accepted by the National Institutes of Health. Deadline for receipt of applications: *21 September 1962*. (Murray C. Brown, Clinical Center, NIH, Bethesda 14, Md.)

The National Aeronautics and Space Administration will begin supporting a $2 million **training program in science and engineering** at 10 universities next