

§27. Plan A and the Establishment of the Institute of Plasma Physics

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Those who aimed at nuclear fusion discussed research program in Japan in 1959. This is known as the AB dispute concerning whether or not plan B which was aimed at constructing medium-size experimental devices would immediately be promoted besides plan A that was basic research. Finally, it was decided to promote plan A only, and to immediately establish the Institute of Plasma Physics at Nagoya University. In the discussion a plan to establish some central research institute was included in plan A at first, but it was not necessarily considered a matter of urgency.

Soon after the Kakuyugo Kondankai (Nuclear Fusion Research Group) was established in February of 1958, a questionnaire on the research program of nuclear fusion was sent out to the members. The result of the questionnaire was summarized in the Kakuyugo Kenkyu (Nuclear Fusion Research, Vol.1, No. 2). Concerning the plan for a research center, opinions were divided, and almost all researchers considered that it would take time to establish some central research institute because they had to be fully discussed and elaborate on the plan. That is to say, the majority of researchers did not desire to immediately establish a research center.

Japanese Atomic Energy Commission (JAEC) set up the Kakuyugo Senmonbukai (Special Panel on Nuclear Fusion Research) in April, 1958. Seishi Kikuchi who was a member of JAEC wrote a report on the meeting of the Special Panel (Nuclear Fusion Research, Vol.1, No.3). The research program in the report was similar to the result of the questionnaire mentioned above.

Nuclear Fusion Research Group offered a proposal for setting up Kakuyugo Tokubetsu-Iinkai (Special Committee of Nuclear Fusion (SCNF)) to the Science Council of Japan(SCJ) in October. At the same time they made the assertion that they should promote basic research in the next year and make efforts to inspire and carry out original ideas and that they should carry out the main research in universities and educate researchers there. That is to say, they considered that they should promote the basic research at universities.

The content of the first International Conference on

Peaceful Uses of Nuclear Energy held in September was reported in the Special Panel held in October. As the result, the Special Panel decided a concrete program for promoting the research (Satio Hayakawa's report, Nuclear Fusion Research, Vol. 1, No. 5). The concrete program was plan B. In February of 1959 the Special Panel prepared the draft of a report and it submitted an interim report "Kakuyugo-Kenkyu no Susumekata (How to promote Nuclear Fusion Research) to JAEC in March of 1959. In the interim report it was proposed to promote both of the two plans A and B at the same time.

SCJ set up a preparatory meeting of SCNF and held symposium on the research program of the nuclear fusion in May of 1959. In this symposium the description of plan A was as same as the result of the questionnaire mentioned above.

In the second meeting of Special Panel held in June, it was confirmed that constructing of a medium-size experimental device was indispensable. (Ichiro Kawakami's report, Nuclear Fusion Research, Vol.3, No. 1).

In the meeting of the Nuclear Fusion Research Group in July of 1959, various plans for a research center were proposed. Then in the third meeting of SCNF held in July, those plans were discussed, and in the fourth meeting held in August, the plan that the research center was established using the budget of the Ministry of Education, Science and Culture (MOE) was adopted. By that time the researchers had the opinion that the research center should be established immediately. That is to say, the minority opinion in summer of 1958 became the majority after a year.

The fifth meeting of SCNF was held jointly with the Special Panel in August of 1959. At this joint meeting discussion was made whether or not plan B would immediately be promoted. Finally plan B was postponed.

In November of 1959 SCJ advised the Japanese Government to establish the Institute of Plasma Physics. In July of 1960 the establishment of the institute was decided.

Through the dispute of plans A and B, the researchers changed their opinions, though there was not any remarkable progress in basic researches.

At the beginning the researchers gave up to demand the large budget to MOE. During the AB dispute, however, it seemed to be suggested that they could use the budget of MOE to establish the research center.