

8. Fusion Science Archives

The research activities of the Fusion Science Archives (FSA) have been carried out under the collaboration of several tens contributors as well as five core staffs. The core staff members in the fiscal year of 2011 were as follows.

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The purposes of the collaborative research on fusion science archives are:

- (1) To collect and preserve historical documents those are necessary to record the history of nuclear fusion research in Japan over the last half century, and to open those catalogs to the public,
- (2) To describe the history of fusion research from the view points of both scientific research activities and social aspect of the research program as new energy development.

Twelve collaboration programs were approved in the fiscal year of 2011. Main activities and achievements are summarized below. Details on each topic of the collaboration will be described in the following sub-sections.

Record of the Interview to Mr. Shigeru Mori

The interview to Mr. Mori, ex-vice-director of Japan Atomic Energy Research Institute (presently Japan Atomic Energy Agency), was carried out on March 10th, 2011 at the JAEA office in Tokyo. Attendees as interviewers were K. Kimura (Chief organizer), H. Iguchi, T. Amemiya (a graduate student at Nihon University), S. Matsuda (JAEA) and H. Yoshida (JAEA). Taped record of four-hour-long was written down into a document. After examination by Prof. Mori twice, the final version was completed and published in March, 2012. The interview record was registered as an archive of FSA.

Collection of Documents from Administration Office

The law of management for public documents came into force on April 1st, 2011. According to this new law, public documents should be either disposed or transferred to National Archives of Japan (NAJ) or an equivalent facility after finishing their preservation period. Unfortunately, NIFS FSA is not yet registered as an equivalent facility of NAJ, the public documents of NIFS cannot be transferred to FSA directly. On the other hand, it is not a realistic way to transfer the NIFS historical documents directly to NAJ, because NAJ has to preserve documents of the Japanese Government and has no capacity to reserve those documents of National Agencies. We discussed with the NIFS administration office how we should preserve historical documents of our own. Otherwise valuable historical documents will be lost. It is agreed that the documents should be preserved at the administration office as a paper-based process with an extended preservation period. On the other hand, the documents themselves are to be preserved in the FSA storage room. So far, FSA has preserved documents of private donation such as of Profs K. Husimi, S. Hayakawa, et al.. Now we have to manage NIFS public documents as well as privately owned documents.

Collection of Privately owned Documents

Privately owned documents of Prof. A. Iiyoshi, ex-director of NIFS from May 1989 to March 1999, which were stored on the shelf of prefabricated storage hut of NIFS administration office, were given to FSA after his direct examination. Documents were stored in 14 cardboard boxes, and were mostly related with his work before he came to NIFS, when he was a professor at Kyoto University. In addition, documents owned by Prof. T. Sekiguchi, about the dispute of the University of Tokyo in early 1970s, those owned by Prof. Y. Ichikawa on US-Japan Collaboration and by Prof. H. Ikegami on early research on electron cyclotron heating were collected.

Meeting of Archives Network on Natural Sciences

In order to promote archival collaboration in the field of natural sciences, a meeting was held at NIFS on September 29th to 30th, 2011. It was planned as a joint meeting of that on repositories and on archives. About thirty peoples from various research institutions, mostly from those of Sokendai network, attended the meeting. Discussions among people from the field of archives and repositories were stimulating for each and useful. Main topic on archives was on the electronic cross retrieval of catalog data among databases from various organizations. Professor Y. Takaiwa of Tsukuba University of Technology gave a talk on the status of development of the software for the database management system, namely Japanese language version of Archon. Archon is popular software in the western world. On the afternoon of Sep. 30th, we held a lecture meeting on archives. Two invited talks were arranged. The first lecture was given by Dr. T. Steen of the Library of Congress in USA. She talked about "Archives in the US Library of Congress". Especially she stressed that recent progress in electrical cross retrieval system on research documents from all over the world through Internet was remarkable. The second lecture was given by Prof. M. Konuma, the professor emeritus of Keio University. He talked on "Research History of Elementary Particle Physics in Japan and Archives of Yukawa Memorial Hall". The second lecture was transcribed and printed as a leaflet, and was registered as a FSA document.

Meeting of Collaboration Leaders

Discussion meeting on the status and plan of twelve collaboration programs was held on Nov. 10th. Each topic is given in detail in the following sub-sections.

Opening the Catalog Database through Internet

Opening of the catalog database through Internet has been tested by the use of ASP (Application Service Provider). NIFS, KEK and Sokendai have agreed to have common database in which electronic cross retrieval is available. We have decided to start the opening of our common database to the public with ASP-based system. The system is active from April 1st, 2012.

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