

THE DIGITIZATION OF SWITZERLAND: A SPECIAL LIBRARY'S PERSPECTIVE*

By Wolfram Neubauer

Special Librarianship in Switzerland

Compared to other Western European nations Switzerland can only boast of very few major special libraries. Until recently large industries and companies had significant book and journal collections and formed a network of special libraries with good services and professional staff. This was valid especially for the pharmaceutical, chemical, and engineering industry. However, these libraries are increasingly being reduced in number, size and significance.

Apart from these special libraries within commercial enterprises there are a number of well-stocked research libraries affiliated to universities or research institutes. Few of these libraries can be considered as large and although all of them participate in some form of interlibrary loan services, speed and convenience of services vary strongly. The largest special library for public use is certainly the ETH-Bibliothek with very extensive collections in all fields of science and technology. The abbreviation ETH stands for Eidgenössische Technische Hochschule and translates as Swiss Federal Institute of Technology. In this paper we talk about the technical university in Zurich, which is the bigger of the two in Switzerland.

Scientists from industry and academia are increasingly turning towards the ETH Libraries for document supply. However, users are no longer willing to wait a week for a book or even 3 days for a journal article. And often they cannot be bothered to walk across the campus to collect the document at the issue desk. What users want is convenience, i.e. one gateway to information, electronic delivery and supply within 24 hours.

The ETH-Bibliothek therefore saw it as a challenge to put forward a variety of services which would match the needs of research scientists and be competitive on the international market. As libraries in industry are being downsized or closed

* Paper presented at the „Global 2000“ Worldwide Conference on Special Librarianship“ (Brighton, 16-19 October 2000) organised by the Special Libraries Association (SLA) and co-sponsored by several international library associations and organisations.

completely and research libraries are forced to reduce their journal subscriptions for financial reasons, the demand for central document services is growing.

This paper tries to give an overview of the ways a large special library can build up services that not only benefit its students and staff members but also make the collections available to users outside the campus. In this context, digitally available collections, gateway functions and electronic document delivery play a major role within the Swiss library environment.

Current state of digitization

Access to library holdings

In nearly all bigger libraries (special, corporate, academic and public libraries) holdings are generally accessed over the OPAC.

The introduction of library systems in Switzerland goes back to the late seventies, with two major centres of library automation: Lausanne with its SIBIL system and especially Zurich with its customized system ETHICS. For a period of about ten years this application was one of the leading library systems in the German speaking countries, based on earlier developments of the ETH Libraries' IT-department. During the last decade, both systems have been replaced by commercial products with the French-speaking part of Switzerland opting for VTLS and the German-speaking part choosing ExLibris' new Aleph 500 system. Unfortunately, not all holdings of special libraries are covered by these catalogues. Our experience shows that despite the advantages many smaller libraries are hesitant to participate in large library networks. From a user's, perhaps a scientist's point of view, this can be extremely unsatisfying, because some of these smaller collections may contain really important material for special interests.

Bibliographic databases

Up to now it has been the responsibility of each university or research institute to license databases and make them available to students and staff members. Only recently the Swiss Federal Government has helped to finance a large national project, called "Consortium of Swiss University Libraries" which will make it possible to negotiate consortial licenses and try to harmonise and extend the database collections of all Swiss universities, all federal research institutes, all universities for applied sciences and the National Library of Switzerland. As usual in such consortia, commercial partners are excluded from these deals.

This project has started operation in September 2000 and will end in 2004. The whole budget for this five-year-period is about 10,8 million US Dollar.

Full text journals

Several libraries offer very good collections, others are only now starting to build up their e-journal collections. The national project will help to co-ordinate these digital collections and link them to the bibliographic databases. The leading institution in this context is the ETH Zurich with online access to about 1,500 titles. This number does not seem very high, but we pursue a strategy of quality.

Electronic document delivery

In order to fulfil user requirements of industrial and also university customers the ETH-Bibliothek has implemented an electronic document delivery system. This DocUTrans system is the result of a co-operation between the TU Delft Library in the Netherlands and Minolta and is marketed commercially. This complex application allows an easy transmission of the full text of documents either electronically or as fax.

At the moment this service is only offered to a group of pilot users from industry. The ETH-Bibliothek, however, will extend this service to all other users. From October this year, all copy requests in electronic form will run over this system.

Obviously building up such an infrastructure is a large investment for any library and the ETH-Bibliothek is currently the only library in Switzerland offering these services.

Digital collections

Digital libraries are often designed to offer better access of lesser known or valuable collections to the public. A second aspect is the fact, that scanning can, of course, also be regarded as a way of preservation. The ETH-Bibliothek is involved in some very interesting projects. One of these projects is the Virtual Library Eduard Imhof. The world renowned cartographer Eduard Imhof painted many general or special maps of Switzerland and created a series of models of famous Swiss mountains. These objects are an important part of the history of Swiss cartography, and many originals are part of the library collections. The main purpose of the project is now the digitization of the most important objects and ist presentation via the library's homepage.

Another example is the digital photo archive managed by the Special Collections Department of the ETH-Bibliothek. The photo archive holds about 500,000 photos, especially to technical and scientific topics in general (engineering, bridge and railway construction etc.) and also to the history and development of the ETH Zurich. The project goal is to digitize all relevant photos of this collection and to make them accessible via the Internet. This project will run over several years. Until now, about 15,000 units are available in a digitized format. Another example are the digital dissertations of the ETH Zurich.

In 1999 the ETH-Bibliothek decided to digitize all dissertations of the university, and to make them available electronically. The aim of this project is to give easy access to the full text of about 400 papers a year. Once a user finds the bibliographic data of a dissertation in the OPAC, he or she can then click on a button to view the abstract and decide in which format he or she wants to obtain the full text: either as a printout, on a CD-ROM or in an electronic format. The project started last year and will be fully operational in 2001.

Situation in the future

Up to now, most users of library services in Switzerland appreciate to have electronic access to OPACs, to check the content lists of accessible electronic journals, to browse through hundreds and thousands of library web pages and, finally, to get the full text of scientific articles on their desktop. Most of these services are taken for granted.

All these different kinds of library services are not only very diversified and very complex, but mostly also not very user-friendly. In this context, it is rather obvious that convenience will become one of the big issues for the near future.

What can a small country in the centre of Europe hope to achieve in the digital library world? Although the financial situation of many libraries in Switzerland may not be so bad compared to other European countries, fast progress in digitization also depends on other two factors: first on qualified IT-staff in general, and particularly in libraries, and second on the availability of central funds to encourage co-operative projects.

Building up a national consortium is a good start, and can be an example for further co-operative projects and actions. The next steps which have to be taken are the digitization of vast library collections and the development of one national union catalogue or of one central gateway function for the two OPAC families (users of the VTLS system and all Aleph 500 libraries). These are much more complex and difficult tasks but absolutely necessary.

All services of the ETH-Bibliothek are provided for two main user groups: academics and students on the one hand, scientists and other persons from industry on the other. Both groups are nearly the same size. To satisfy the different needs, the library is trying to find pragmatic solutions which do not have the dimensions and the impact of projects abroad, but are designed with regard to the users to make sure they benefit directly. In this context the ETH Libraries put special emphasis on the following issues:

- one gateway to information
- integration of bibliographic databases and full text journals

- building up a document server for digital material owned by the ETH
- extension of electronic access to databases and e-journals through the national consortium
- customization of services
- electronic document delivery services to all user groups (using different technologies and services)

From the ETH-Bibliothek's point of view, this is a very ambitious programme, but we are optimistic about achieving these goals within the next five years. We are convinced that going in this direction, we will take the leading role in the development towards a digitization of the Swiss library environment. Libraries are moving to a more competitive future, where services will have to be tailored to match the requirements of different user groups. We believe that the developments within the ETH-Bibliothek over the last few years have shown that we are ready to meet the challenge.

Wolfram Neubauer
ETH-Bibliothek
Rämistasse 101
CH-8092 Zürich
Switzerland
e-mail: neubauer@library.ethz.ch