Aims and Tasks of the Documentation Department of the Technological University Library (TUL) Berlin

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AIMS AND TASKS OF THE DOCUMENTATION DEPARTMENT OF THE TECHNOLOGICAL UNIVERSITY LIBRARY (TUL) BERLIN

by DIETRICH FLEISCHER

1. Introduction. Library System. Organisational Structure and Tasks of the Documentation Department

At the Technological University of Berlin the library system has been long established and successfully developed on the basis of an integrated library system. In this system subject-oriented section libraries of the University Library take over functions and services of a library locally within the various institutions of the University and thus as close to the public as possible. At present the library system includes fourteen of these section libraries. Documentation has likewise been organised on an analogous basis which at the same time is anchored in the library system. The Department of Documentation of the University Library - besides which there are also departments for acquisition, cataloguing and library services - acts as co-ordinator of literature indexing and literature information work done within the different academic disciplines of the TU Berlin. This work is in practice carried out in close co-operation with the corresponding scientific institutions of the University. This paper will describe in detail functions and tasks of this Department.

Above all the Department of Documentation resulted from the necessity to transfer subject-oriented documentation projects - which in the beginning were set up or developed by limited-term financial support from other institutions (EKP, Deutsche Forschungsgemeinschaft Institut für Dokumentationswesen, VW-Stiftung and others) - onto the general budget, and at the same time to create convenient conditions for co-ordination in organisation and subject. These activities were taken over by the University Library in 1969, and the necessary finance for personal staff was also made available. A special co-ordination division, established in 1970, also maintains contact with relevant institutions outside the TU Berlin (e.g. Senate of Berlin, Institut für Dokumentationswesen etc.) in order to avoid work duplication and to ensure the application of rational working techniques and the utilisation of the prepared information on a broader basis.

Again, all documentation activities in the TUL Berlin are part of the integrated library and information system of the University. The nucleus of this system is the main library with its traditional tasks and working fields. There are also fourteen section libraries for principal subjects of the University which are - as special libraries - organisationally and personally incorporated in the main library. Their budgets are centrally administered by the University Library. The same applies for the Documentation Department, the third component of the system, in which at present are integrated seven different subject-oriented
documentation services. These services are just like the special libraries independent operating units working in the following fields (Fig. 1):

- **Structure of buildings:** since 1955 special literature indexing and retrieval has been done in the Faculty for Planning and Construction of Buildings concerning buildings for specialised purposes (e.g., exhibition and congress centres, libraries, public baths, etc.); the material is subdivided into general thematic topics, project studies, construction needs and demands, countries and places, building styles, architects, etc.

- **Air-transport:** literature indexing and information activities have been carried out since 1955 by the Documentation Centre for Air-Transport (which in future will belong to the Traffic Information System of the Federal Republic of Germany) in connection with the Institute for Air and Space Navigation of the TU Berlin and in co-operation with the Deutsche Lufthansa AG, Köln. The broad subject of air-transport, especially air-transport economics, law and policy, is covered.

- **Fermentation Industry and Microbiology:** literature documentation on biotechnology, brewery, distillery and yeast technology, beverages, etc., in connection with the Institut für Gärungsgewerbe und Biotechnologie, Berlin (Institute for the Fermentation Industry and Biotechnology). Co-operation with and contributions to "Food Science and Technology Abstracts" (FSTA), published by the International Food Information Service (IFIS). Thesaurus work on international level.

- **Fruit Growing:** literature information and documentation in connection with the Institute of Crop Science of the TU Berlin on the whole range of fruit growing, especially cultivation management and economics. Editing of the current bibliographic publication "Current Literature Information on Fruit Growing".

- **Landscape Planning and Garden Architecture.**

- **Electrical Engineering:** literature analysis, indexing and information on the subject of electrical engineering including control engineering by the "Elektro-Information Berlin", set up in 1964 and handled by the Department under the "Senator für Wirtschaft", Berlin, until 1973. Partner in the "Dokumentierungsring Elektro-technik" (DRE) and, together with DRE, member of the "Zentral-stelle Dokumentation Elektrotechnik" e.V., Frankfurt am Main. Berlin's local documentation and information centre on this whole subject. Co-publisher and responsible editor of the "VDE-Schnellberichte" as well as of the "Dokumentation Regelungstechnik". Computerised documentation system, microfilm storage and reproduction, information card files.

- **Hospital Service:** documentation in the "Institut für Krankenhaus" (Hospital Building) of the TU Berlin in co-operation with the "Deutches Krankenhausinstitut", Dusseldorf, and with further institutions in the field of Public Health and Hospital Service. Editing and publication of "Informationsdienst Krankenhauswesen". Application of electronic data processing, and work on thesaurus.
Figure 1

Documentation and Information Services of the
Documentation Dept. of the Technological University Library Berlin

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- Main Library
- Spec. Library
- Special Library
- City and Regional Planning
- Doc.-Dept. Structure of Buildings
- Doc.-Dept. Air Transport
- Doc.-Dept. Fermentation Industry
- Doc.-Dept. Fruit Growing
- Doc.-Dept. Landscape Planning
- Doc.-Dept. Electrical Engineering
- Doc.-Dept. Hospital Services

Users from and out of TU Berlin
The documentation tasks of the different services include

1. screening and analysing a wide range of scientific publications - journal articles, books, reports, etc. - as completely as possible,

2. storage of the results in a selective, searchable file,

3. provision of bibliographic lists on special subjects, and mostly also

4. regular distribution of the latest analysed information by means of abstract journals or the like.

More than 1000 different journals are currently surveyed by the above-mentioned documentation services, as well as other publications. To avoid duplication of work nearly all documentation services are annexed to or combined with regional, national or international information systems through which the whole relevant literature is covered by means of work-sharing; however, every partner has access to the jointly produced, complete data base. Examples of the participation of our documentation departments in external services are the involvement of Air Transport with the Documentation department of the "Deutsche Lufthansa" in Cologne, of the Department for Fermentation Industry and Microbiology in the "Internation Food Information Service" (IFIS) of the Commonwealth Agricultural Bureaux and in the "European Brewery Convention" (EBC), the department for Electrical Engineering. "Elektro-Information Berlin", in the "Dokumentationsring Elektrotechnik" (DRE) and as partner of the "Zentralstelle Dokumentation Elektrotechnik" (ZDE) in Frankfurt am Main.

In many cases documentation methods, information means and technical procedures applied by the individual documentation services are still different due to tradition and relationships with bigger systems. However it is intended as far as possible to introduce uniform procedures concerning input, storage, retrieval and information dissemination. In certain cases this has been started and increasing use of EDP will assist rationalisation. These subject-oriented services are not concentrated at one place within the main building of TUL but are near the respective teaching and research institutes and - even more important - close to the respective subject-oriented special libraries. These libraries are without exception equipped with copying machines so that the last step in providing information can be performed via the library, i.e. supplying the complete text, selected and indexed by the documentation service.

Further activities of the University Library in documentation are: collecting and indexing of horticultural literature (back to 1783) in the horticultural section library; indexing of original architecture plans in the plan collection; taking charge of specific academic literature materials and the "Bibliographie veröffentlichter Arbeiten" of the TU Berlin in the University Archives. The bibliography is published in "TUB", Journal of the Technological University Berlin. In addition the "Bibliographische Reihe der Technischen Universität Berlin" is published by the University Library.

In order to intensify and further develop the different documentation activities a special division for co-ordination and central and subject-independent services carries out the following functions:-

1. Printing and distribution of publications of the Technological University Berlin.

2. Documentation of computer programs.
3. Supervising distribution of SDI-Services supplied from outside TU Berlin.

4. Advisory functions, systems development and management.

5. Preparation of machine-readable input.

6. Practical co-operation with other organisations and institutions, especially with ADP-Departments offering their services.

I will deal in more detail with publications, program-documentation, SDI-services and input preparation, and finally will try to explain the combination of different functions of the library and documentation system with reference to our documentation department for Hospital Services.

2. Printing and Distribution of Publications

Since 1969 a special department has been developed in the TUL to support printing and distribution of publications of scientific institutions of the University which - for whatever reason - could not be published commercially.

You will surely know how the so-called grey (i.e. non-conventional) literature arises: a university institute receives finance for a research study which is described by a research report. Often the institute considers its study to be fulfilled once the submitter has received a manuscript of the text. Thus in many cases at the end of protracted and expensive research work not enough care is taken that the existence of such a report is made known to the scientific public and above all that the results can be made available - perhaps via libraries - in a usable form. It could be said that the department's task is to light up the grey character of such publications - which in fact would not be publications. In order to do this a special budget is available out of which costs for printing a publication can be financed up to 50 per cent. The remainder must be paid by the institute itself.

In practice the department takes an author's manuscript which is ready for reproduction by offset printing, and arranges printing of a sufficient number of copies. In order that the type-written text corresponds to certain standards and especially that all references are complete and correct, the department has issued guidelines - "Instructions for the lay-out of type-written text for publications." Hints are given on formal text layout including size of type and typing area, on layout of title pages including numbering of series, ISBN and so on.

The publication is sold by the department either on order or directly by the bookshop, payments being credited to the University. However, before that - and this is important - copies are sent to the legal depository libraries, i.e. the Deutsche Bibliothek, which publishes every fortnight the Deutsche Bibliographie, and two regional libraries in Berlin as well as the corresponding special libraries in the German Federal Republic and other institutions, so that the publication is available for bibliographies or abstract journals. Moreover all new publications are announced in the list of publications of the department. The last issue dating the 1st February 1975 contains 210 titles of monographs and 22 serial titles, offered by the department as a university press. Of course, the department also distributes current information services edited by the subject-oriented documentation departments when they are not published by a commercial publisher. The same goes for dissertations of the TU Berlin, the
distribution of which, however, is governed by the usual regulations, while at the moment the doctorands themselves are responsible for delivery of 150 copies to the TUL, the cost of printing being supplied by the University, it is planned for the near future that dissertations will only be produced and supplied on microfiches. Last but not least, supplying descriptions of computer programs is part of the work of the Department of Publications.

3. Documentation of Computer Programs

Information about existing computer programs can be of high value for the user, as both the mathematical and the processing methods for a particular problem and the computer program itself usually involve very high development costs. On the other hand this sort of information is normally hard to procure and difficult to handle in the documentation process.

It is important that in this connection we do not mean what is also called program documentation, which the programmer has to provide for operators in order to clarify single steps of the program or as instructions for use. Rather it concerns information for potential users on programs containing problem analysis and solution steps as well as the program structure and program itself. Such information is very similar to literature information.

It is necessary that the producer of a program writes an informative description himself, because nobody else would be able to do it with comparable effort.

After several talks with the Institute of Chemical Engineering at the TU Berlin an agreement was made as follows:-

1. The library receives free of charge program descriptions by the authors according to the following standards:
   a. type-written text, reproducible, size DIN A4
   b. title page with all necessary specifications
   c. documentation sheet, in detail with this content (Fig. 2):
      Title of program
      Author (individual or corporate name)
      Description of program (purpose, application, method, limitations and constraints)
      Status (when first operational, other users)
      Hardware (type and configuration, storage capacity, typical running time)
      Software (operating system and language used)
      Special requirements
      Availability, Cost, Format and Documentation
      Source for additional information
   d. detailed representation of problem solution and structure of program as well as a print-out of the instruction list. The whole program description averages about 30 pages.

2. A deed of conveyance concerning the copyright is attached, signed by the author.

3. In scientific articles, e.g. in scientific journals, the program descriptions are cited.
1. Titel des Programms: Programm zum Berechnen der Strömung sowie des Stoff- und Wärmeübergangs in Wirbelschichten

2. Verfasser (persönliche(r) oder korporativer Verfasser): Heinz Brauer und Dieter Mewes

3. Kurzbeschreibung des Programms (Zweck; Anwendung; mathematische, theoretische oder empirische Methode; Einschränkungen, Grenzen):


4. Status (Verwendung seit, Erstanwendung, in Entwicklung usw.):

Verfügbar seit Januar 1972

5. Software (Betriebssystem, Programmsprache): CDC 6500, FORTRAN

6. Hardware (Anlage, Modellnummer und Konfiguration; Speicherkapazität: Kern, Platte, Band, andere; typische Laufzeit):

Core 15000 (oktal) 0,5 sec., Kartenleser, Zeilendrucker

7. Besondere Anforderungen:

8. Bezug von Kopien der Programmbeschreibung (39 Seiten) gegen Erstattung der Selbstkosten durch

Universitätsbibliothek der Technischen Universität Berlin, - Programmbibliothek - 1000 Berlin 12, Straße des 17. Juni 135

9. Zusätzliche Informationen durch (Person oder Institution mit Anschrift und Telefonnummer):

D. Mewes, Institut für Chemieingenieurtechnik (Abt.: Verfahrenstechnik) der Technischen Universität Berlin, 1 Berlin 10
Ernst-Reuter-Platz 7
4. The library provides copies of the program description and supplies them to:
   - the authors for their own disposal
   - libraries receiving their legal deposit copies, and
   - on request.
5. Moreover copies of the documentation sheets are made available to subject-oriented information services, research and program documentation services for publicity.
6. Costs for copy and dispatch are calculated on the basis of the usual book lending regulations.

The Program Library and Documentation of the TUL soon found a wide reaction by the public. In the first year of this service descriptions of about twenty complete programs were sent about 200 times to interested firms and institutions all over the world.

Occasionally we hear the argument that commercial software-firms could take over these results, gained by expenditure of public money, and sell them as their own at high prices. This, however, would be the less likely the better these descriptions become known, so that potentially interested people can receive the programs directly.

4. Selective Dissemination of Information (SDI)

Nowadays these services are increasingly provided by selection from magnetic tapes according to special profiles for current awareness information. The University Library arranges, intensifies and, if needed, also financially supports such services within its scope. One example is the SDI-service of the Chemie Information + Dokumentation Berlin, produced on the basis of "Chemical Abstracts Condensates" (CAC) tapes of Chemical Abstracts Service. Interested scientists receive once a week or a fortnight printed lists of literature references relevant to the corresponding profile. The University Library has started a project to investigate ways in which a scientific library can minimise time-lags in supplying original literature requested as a result of the SDI-services.

Preparation of machine readable input and co-operation with other institutions

Nowadays documentation data are more and more filed on computer media for the generation of EDP-processed information services. No doubt these procedures are much more expensive than conventional methods, but complex searches, SDI-services, extensive indexes as search aids, and simplified data interchange would not otherwise be feasible.

The recently published plans of the German Government for development and extension of the information and documentation scheme suggest sixteen large information systems for all scientific subject fields. Each of these systems would include a central institution, equipped with its own computer system for filing the whole data base and preparing computerised information services. Such development makes it imperative that, even in smaller and specialised documentation activities as at TUL, the problems of preparation of input data are solved. These problems largely stem from the fact that all data have to be manually typed on machine keyboards and that the results must be free of error.
Former developments, however, have shown that without co-ordination probably as many different and incompatible documentation systems would have arisen as documentation activities in all, but not all with the same speed. Each development would include more or less time-consuming learning processes, and every case would not necessarily end with the same positive success. In addition, smaller services would employ their own equipment and staff with the consequence that both would often not be used effectively. The working group of documentation services and special libraries in Berlin, the "Berliner Arbeitskreis" of the German Association for Information Science is at present considering how such difficulties and disadvantages can be overcome. The "Berliner Arbeitskreis" was set up in 1964 and pursues all activities in planning, methodology, technology and further development in science and practice which are advantageous for information and documentation in Berlin (West). The University Library participates through its Department for Documentation, an important unit in information and documentation activities at the TU Berlin. Within its responsibility the library took over special co-ordinating, advisory and administrative functions, helps to develop and carry through documentation projects (see following paragraph) and arranges (in conjunction with the Department of Library Science and Documentation in the Faculty for Social Planning Sciences of the TU Berlin, as well as with the Berlin Teaching Institute for Librarians) meetings, exhibitions, courses for the purpose of education and further training, and information practica. Examples are the 13th ASpB Conference 1971, various lectures and discussions, a series of lectures during the winter semester 1968/69 at the "Bundesanstalt für Materialprüfung", during the winter semester 1972/73 at the "Schering AG" and courses concerning data recording and bibliographical aids during the summer semester 1974 at the "Institut für technische Weiterbildung" e.V. There has also been participation in the "Deutsche Industrieausstellung Berlin" 1968, 1969 and 1971 as well as one week information practica, organised for several years especially for participants in training courses held by the "Lehrinstitut für Dokumentation", Frankfurt am Main.

Because of the close links between the documentation centres in the "Berliner Arbeitskreis" the TU Berlin has ready access to information facilities of other partners and of institutions not situated in Berlin. This means that literature inquiries and requests can be forwarded to the appropriate institutions and be handled by them. The "Berliner Arbeitskreis" has established at the TU a central service institution for documentation data input preparation. Its function is not primarily to take over and carry out orders from documentation services just for typing data; advice and help will be given to developing institutions in all matters of system structure with the purpose of achieving effective working procedures.

This means in detail:-

- clarification of organisational and technical questions concerning system development and its application;
- working out of rules for safe, rational and co-ordinated working methods;
- current supervision of such projects.

In addition, the division takes over service functions and keeps in contact with EDP departments which are taking up further data processing. It also monitors continuously - in contact with corresponding institutions both in Berlin and elsewhere - methodological and technical development in the whole field of data handling and takes part actively in further development work. Examples of the
work and services being undertaken are:

- organisation and recording of data in connection with the publication of the "Thesaurus Krankenhauswesen" together with the Institute for Hospital Building of the TU Berlin;

- data recording for the different editions of the cumulative journal list of the University Library;

- current data recording for statistics relating to additions to the University Library and to its section libraries;

- data recording and control on behalf of the Institute of Documentation for the intended German edition of the "Thesaurus of Engineering and Scientific Terms" (TEST);

- development and preparation as well as data recording for automatic production of indexes for the information service "Packing" of the "Rationalisierungsverpackung" in RKW;

- co-operation for development and carrying-out of practical work for an electronic cataloguing system. Partner in this project is the Arbeitsstelle für Bibliothekstechnik, ABT (Institute for Library Techniques) at the "Staatsbibliothek Preussischer Kulturbesitz". On the basis of present developments (DFG-Data Recording structure) and with bibliographical data from the University Library of the TU Berlin an economic production method for the catalogues of the University Library is being developed together with the department mentioned above. At the moment this project is applied to library collections of the section library for physics;

- data organisation and recording for control, compilation and printing of the "Thesaurus for Economic and Social Development".

I would like to deal in a little more detail with the technological aspects. The management of input data generally proves to be the most important bottleneck in the whole field of data processing. This applies even more to documentation data, which must be prepared according to standardised structure and format regulations as well as in uniform orthography. Since such text data - at least if destined for information services in our country - originate in many languages, errors frequently occur at the input stage based in misinterpretations, mistakes in typing or faulty transmission, which have to be corrected before transfer to computer media. Therefore a concept had to be found which could guarantee at input typing a minimum possible error rate and a simple correction procedure. We believe we have found such a procedure by applying the Datapoint System.

Datapoint is a small general purpose computer consisting of an alphanumeric keyboard in ASCII-Set for data entry, a CRT screen for display in twelve lines with eighty characters each and two digital cassette recorders for bulk data storage. Memory size is 4, 8 or 16 K bytes, and the price of a typical machine is about 25,000 DM. Interfacing with external devices, such as a line printer or electric typewriter, industry-compatible tape drives, disc etc. is easily arranged. Our main system is connected with a 9 channel tape drive and a selectric typewriter. A two megabyte removable cartridge disc is to be installed.

We have written a set of programs, including:

- program for first typing of data input;
Arbeitsablauf in der Datenerfassungsstelle

1. Ausgefüllte Formblätter mit Dokumentationsdaten

2. Erstdatenerfassung (strukturiert) auf Magnetbandkassetten unter programmierten Formalprüfungen

3. Schreibprotokoll der Erstdatenerfassung

4. Schreibprotokoll mit Fehlerkorrekturen

5. Korrektur des Datenträgers der Ersterfassung

6. Titellisten oder Titelkarten

7. Herstellen von
   a) Titellisten oder Titelkarten,
   b) selektierbaren Daten auf Computer-Magnetband

8. Korrespondenz zwischen Titellisten oder Titelkarten und Register-Daten

9. Zur Computer-Verarbeitung
- program for correction of data, i.e. for cancelling, inserting or changing of characters, words, lines, fields or blocks (bibliographic units);
- program for printing input data in a special format; and
- program for conversion of data from cassette to computer tape with generation of special computer-oriented or interchange tape format.

Thus it is possible to treat and carry out the important step of data keyboarding to produce a clean result on computer tape. The essential advantage is minimisation of the costs and delays which would arise if every single documentation service had to prepare and code its correction data for batch-wise corrections in bigger computer systems. The present 3 Datapoint equipment can be used with full load. Essential steps of the working process are as follows (Fig. 3):-

1. Completed forms containing bibliographic and indexing data as well as an abstract are given to the input preparation department.
2. Initial input is done at the Datapoint. Constants and variables which are incremented uniformly (for example the identification numbers) are generated automatically. Validation checks are carried out where possible and some information is inserted by calling up prestored text. The complete text is then checked visually and corrected on the screen.
3. Input data is stored on a cassette tape. The capacity of one tape is about 3000 bibliographic descriptions of medium size, i.e. about one week's production.
4. At the same time or by an extra run a copy is printed which is given to the authors.
5. The corrected copy is returned to the department so that the tape stored data can be amended.
6. Correction is done by means of the correction program. The result is written on a new cassette tape, which can then be regarded as clean of errors.
7. With the formatted printing program a bibliographical list can be printed or title cards can be furnished.
8. With the conversion program data are converted into standard input or interchange format on computer tape for further processing, i.e. sorting and output of searchable indexes, storing for completion of the data base with the aim of processing SDI-Services or running retrospective searches.

The programs are applied to the production of a published information service with six different EDP-processed indexes developed with the "Bundesinstitut für Berufsbildungsforschung", Berlin. They are also used for data recording and correction of all documentation data, for automation of the Hospital Service Information System and for the production of a bibliography with indexes published from 1974. This bibliography covers the worldwide monograph
literature in the field of sugar technology and economy, and is prepared in co-operation with the "Institut für Zuckerindustrie/Versuchsanstalt für Zuckertechnologie", Berlin. More applications are intended. Thus for the first time in the Federal Republic of Germany the concept of magnetic-tape data recording with an "intelligent" screen terminal has been applied to documentation activities.

We have calculated that the costs for input preparation up to the clean magnetic tape - without amortisation of the equipment - amount to 5 to 6 DM per 1000 characters, depending on the difficulty of the material (foreign-language, transliterated, and so on).

5. Training of Documentalists

At the beginning of 1971 the University Library with its Department of Documentation was recognised by the "Institut für Dokumentationswesen", the "Deutsche Gesellschaft für Dokumentation" and the "Verein Deutscher Dokumentare" as a training centre for documentalists - so far the only one in Berlin. The training consists of two years of practical work in documentation centres and one year theoretical training at the "Lehrinstitut für Dokumentation" in Frankfurt am Main. At the moment five staff are on the practical training, with financial support from the "Institut für Dokumentationswesen". During the practical work they get to know the different fields of documentation within the TU Berlin with its various technical extensions, documentation and information methods, EDP application, printing techniques, etc. Moreover, acquisition, cataloguing and user services at the University Library are included in the training. The students also have the chance to attend all relevant lectures of the TU Berlin. For example lectures on "Structure and Organisation of Documentation Systems", "Methods of Literature Indexing" and "Working Process for Computer-Supported Information Services" are given by the staff of the Department of Documentation. They can also take part, together with student librarians, in practical information courses and meetings.

6. Activities and Functions of the Documentation Department for Hospital Services

This documentation service was established in 1963 owing to the necessity for comprehensive information on the literature in this new, expanding field. Articles in national and international journals are the most important feature because of their topicality, but also reports, conference papers and relevant laws and decrees are of special interest. At present about 250 journals in this subject field are surveyed. This is done by work sharing with the documentation department of the "Deutsches Krankenhausinstitut", Dusseldorf, so that each of the two partners deals with about half of the serial titles. Efforts are also being made to exchange data with international services. Both institutions - in Berlin and Dusseldorf - are closely connected with the corresponding special libraries. Each of these libraries has standing orders for the serials to be analysed and the TU tries to hold all the journals covered. The monograph acquisitions are immediately notified to the partner department in order to avoid duplicate entries. Since 1969 the two partners have been editing the Informationsdienst Krankenhauswesen, published every three months and consisting of abstracts and author, subject, geographical and architects indexes.
**Figure 4**

Beispiele für Thesaurus-Eintragenungen

### ALPHABETISCHER TEIL

| 0. Sachgruppe u. Deskriptor | **AMBULATORIUM**  
| 1. Deskriptor | *FAHRBARE KLINIK*  
| 2. Oberbegriff | OB KRANKENHAUS  
| 3. Unterbegriff | UB ARZTPRAKten  
| 4. Einschluß | EIN GESUNDHEITSZENTRUM  
| 5. Ausschluß | AUS AMBULANZ  
| 6. Siehe auch | SA NOTFALLVERSORGUNG  
| 7. Begriffe in Klammern | (DIAGNOSTIKZENTRUM) (AMBULANTE KRANKENVERSORGUNG)  

| 8. Verweisungswort | GEMEINDEPFLEGESTATION  
| 9. Verwende | VERW AMBULATORIUM  
| 10. Siehe ebenfalls | SE GEMEINDEPFLEGE  

| **DIAGNOSE** | OB KRANKENVERSORGUNG  
| 8. Verweisungswort | GEMEINDEPFLEGESTATION  
| 9. Verwende | VERW AMBULATORIUM  
| 10. Siehe ebenfalls | SE GEMEINDEPFLEGE  

| **DIAGNOSTIKZENTRUM** | VERW +DIAGNOSE  
| 8. Verweisungswort | GEMEINDEPFLEGESTATION  
| 9. Verwende | VERW AMBULATORIUM  
| 10. Siehe ebenfalls | SE GEMEINDEPFLEGE  

| **TEACHING HOSPITAL** | VERW UNIVERSITÄTSKLINIK  
| 8. Verweisungswort | GEMEINDEPFLEGESTATION  
| 9. Verwende | VERW AMBULATORIUM  
| 10. Siehe ebenfalls | SE GEMEINDEPFLEGE  

### SYSTEMATISCHER TEIL

| KRANKENHAUSWESEN | Fieldbegriff  
| 1. Begriffsunterebene | 1 - KRANKENHAUS  
| 2. Begriffsunterebene | 2 - ALLG. KRANKENHAUS  
| 3. Begriffsunterebene | 3 - AMBULATORIUM  
| 4. Begriffsunterebene | 4 - GRUPPENPRAXIS  
| 5. Begriffsunterebene | 5 - ARZTPRAKten  
| 6. Begriffsunterebene | 6 - FACHPRAXIS  
| 7. Begriffsunterebene | 7 - FACHKLINIK  
| 8. Begriffsunterebene | 8 - UNIVERSITÄTSKLINIK  
| 9. Begriffsunterebene | 9 - UNIVERSITÄTSKLINIK  
| 10. Begriffsunterebene | 10 - ZENTRALKLINIK  
| 11. Begriffsunterebene | 11 - KLINIK  
| 12. Begriffsunterebene | 12 - ABTEILUNG  
| 13. Begriffsunterebene | 13 - DEPARTAMENT  
| 14. Begriffsunterebene | 14 - ABTEILUNG  
| 15. Begriffsunterebene | 15 - DEPARTAMENT  
| 16. Begriffsunterebene | 16 - ABTEILUNG  
| 17. Begriffsunterebene | 17 - DEPARTAMENT  
| 18. Begriffsunterebene | 18 - ABTEILUNG  

| AMBULATORIUM | Deskriptor  
| 11. Begriffsfeld | S. KRANKENHAUSWESEN  
| 12. Deskriptor an Alphabetstelle | 12 - AMBULATORIUM  
| 13. Feldfreier Begriff | BERICHT  

Eingeschlossenes Quasi-Synonym, das durch mehrere Deskriptoren darzustellen ist.
Titel auf Seite

Bemerkungen

Hygienische Prüfung und Überwachung von lüftungstechnischen Anlagen in Krankenhäusern.

Übersetzung & Rückseite

Zusammenfassung von Titeln

BIBL.ANG. 40

Das öffentliche Gesundheitswesen: 37 (1975) No. 3,

Seiten 131-137.

SPRACHE 41

deutsch

BEIGABEN 50

(bei mehr als 8 = ZAHLR.)

Landkarte(n) Ansicht( ) graph. Darst.

Dia( ) scher. Darst.

Vordr. Schnitt(e) Modell(e) Lit. Hinw.

SACHGR. 60

Betriebstechnik

ARCH 80

Nachdruck

REFERAT 70

Bemerkungen


ARCH 80

Nachdruck

STANDORTE

Kontrolle

in / neu

-27-


Ablage
The indexes of the last issue of the year are cumulated with all the indexes of
the same volume. At present about 4,000 articles per year are covered by the
"Informationsdienst Krankenhauswesen".

Indexing of the publications is done on the basis of the "Thesaurus Kranken-
hauswesen", developed in 1969-1971 by both partner institutions with co-
operation of scientists and other experts, and published in 1971. The EJC-
Thesaurus was taken as a model. In 1972 the first English edition appeared, and
in 1973 an updated and corrected German edition was published with a supplement
arranged according to concept fields. The Thesaurus contains about 3,500 words,
1,500 of which are descriptors (Fig. 4). The remainder are forbidden words as,
for example, item 9 - verweisungswort - in Fig. 4. Certain broader concepts,
indicated in the Thesaurus with two stars, serve as subject-headings in the
abstracts part of the abstract journal, e.g. AMBULATORIUM. The descriptors are
related to broader (OB) and narrower (UB), associated (SA), and use-for terms
(EIN). We also use the reference 'excluding' (AUS), indicating that an apparently
applicable term is not meant.

The content of a document is indexed with between five and fifteen descriptors
using co-ordinate indexing. Whenever necessary-and convenient certain descriptors
are also connected by links, which maintain the connection in the search file
for index preparation. In addition to the indexing in most cases also abstracts
are acquired. The author's abstract will be used if it is available and
informative.

The format used when preparing material for input is shown in Fig. 5. The
bibliographical description shows:-

- whether an item is of general or national importance, or of no value
  for the information service
- up to three author names; otherwise first author followed by et al.
- title and translation of title if in an uncommon language
- language
- additional data e.g. tables, diagrams, preprint, maps, models, references,
  etc.
- subject heading
- descriptors
- geographical names
- abstract
- architects' names
- stock number or signature for the regional publication
- whether full text has been microfilmed

Precise directions for indexing have also been worked out and printed.

All descriptive data are entered on forms, which are passed in weekly batches
to the Input Preparation Department, where according to the described procedure
the material is first stored on cassette tapes. After correction based on a
preliminary printout, eight file cards are printed out. They serve the two
Institutions for:–

1 + 2 Filing as title cards according to current numbers
3 + 4 Circulating for the information of scientists and students
5 to 8 Forwarding to foreign partner institutes in Argentina, The Netherlands, Switzerland and Poland

At three monthly intervals the computer tapes are converted. These tapes with clean data are sent by the Input Preparation Department to the Computer Centre of the University of Dusseldorf, where sorting and output of the printed abstract journal is accomplished. The publication department uses an external printing firm to prepare the published edition, based on the computer printout. Subsequently this department takes over the distribution of the abstract journal to about 450 subscribers at home and abroad. Annual accounting is carried out in conjunction with the editors. In addition the data are electronically filed in a data pool in Dusseldorf, which can be searched on-line by application of the Retrieval Program GOLEM of the Siemens AG.

For the last six months both partner institutions have had CRT-terminals at their disposal, which can be linked via telephone lines with the GOLEM-Pool. Literature searches are therefore mostly performed on the GOLEM-Pool, which can be accessed daily between 10 and 12 o’clock. A line printer is connected with the terminal and relevant displayed references can be printed out. The searches are formulated in the usual way using the logical operators AND, OR, AND NOT. GOLEM has the advantage that not only descriptors but also author names, title words, even numbers of pages and so on can be employed as search words.

A long-established peek-a-boo search file, which can be used for retrieval, is also kept up-to-date. Both partner institutes have the same peek-a-boo files available. Thus either of the two institutes can use these files or the GOLEM terminal to carry out retrospective searches. In reply to requests copies of the corresponding title cards out of the card file according to current numbers are usually listed and forwarded.

Where the original text of an article is required copies can also be prepared and sent off within a short time. The Special Library for City and Regional Planning, being located in the same building as the documentation service Krankenhauswesen, deals with this aspect. As already said, in agreement with the documentation department care is taken that all serials covered in the abstract journal as well as the monograph literature are permanently available.

7. Conclusion

With my contribution I wanted to present to you documentation activities of the Department of Documentation of the TUL. As shown, the Department of Documentation is, on the one hand, concerned with a series of subject-oriented information and documentation activities which have an important place in the network of the German documentation scene, and are playing a considerable part in international documentation systems. On the other hand the Department also makes available subject-independent services. So far the structure and organisation of the Documentation Department have proved successful, and facilitated the introduction of methodological and technological innovation.
DISCUSSION

G. A. HAMEL: What is meant by grey literature? Does this include final reports written by students to obtain their grades or diplomas?

D. FLEISCHER: Some research reports are published based on diploma texts by groups of students. The main sources are the research publications of individual institutions within and external to the University.

P. J. PINXTER: I would like to make a distinction between (a) information centres (information retrieval activities) and (b) documentation centres (information storage activities). Libraries have always done what might be called 'refined' information retrieval, while their information storage activities have been relatively crude. Libraries are therefore information centres although they may carry out refined storage in some areas. Documentation centres act as commercial editors: one can buy the stored information just as one buys books.

D. FLEISCHER: I agree that the whole process can be divided between documentation (input) and information (output). On the other hand, it is also true that information gained by retrospective searches or by computerised profiles is related (a) to specialised subject areas and (b) often to specialised retrieval methods and systems. In my opinion the documentalist can only use sophisticated retrieval methods in special subjects if he is also involved in analysis and evaluation, a necessary combination which also has psychological aspects.

V. WEHEFRITZ: Some libraries have sections dealing with patent information and translations. What is the position in your library?

D. FLEISCHER: Although the information department of the German Patent Office is in Berlin it was decided that our library should have its own collection. Translations are handled for us by the Technological University of Hanover.

P. KAGBEIN: A number of libraries are involved with documentation work. Regional libraries, for example, are responsible for regional bibliographies, while libraries with special collections often contribute to documentation activities in the area of specialisation. The work on hospital sciences was undertaken because of need - there was no existing bibliography and since the Technological University Library possessed a special collection it was appropriate for them to compile the bibliography.