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Authority Control: An Eighty-Year Review

Larry Auld

Authority control is reviewed as represented in the literature from circa 1900 to the present. Catalog codes and handbooks are examined for statements on authority files; recent efforts to develop authority files are summarized; and some consideration is given to the impact of automation on authority control. A list of recommended reading is included.

THE RECENT PUBLICATION of the long-awaited first edition of *Authorities: A MARC Format* is symptomatic of a renewed interest in authority control.¹ Once the sine qua non of all "proper" catalog departments, the authority file gradually faded into neglect and, many believed, oblivion. Yet, renewed interest suggests that authority control was simply taking "time out" waiting for a propitious moment to reawaken and prove its strengths and values.

Authority control is based on the maintenance of a file in which headings, variant forms of headings, sources, and other related data are recorded. A heading is "the authoritative form of a name, subject, uniform title, series, etc., that is used as an access point to a bibliographic record," while an authority record "gives the authoritative form of a heading selected for an institution's bibliographic records; variant and related forms of the heading can also be included and . . . other miscellaneous information can be transcribed."² A short list of definitions appears in the preliminary edition of *Authorities, a MARC Format*.³ A somewhat longer list of definitions appears in Buchinski's *Initial Considerations for a Nationwide Data Base*.⁴

Authority control is the generic term; older and more specific terms include name authority file, subject authority file, and authority list. A variant generic term is entry authority control.⁵

For an introduction to authority control, articles by Schmierer,⁶ Runkle,⁷ and Malinconico⁸ are recommended; they are best read in the order cited. Schmierer discusses how the finding and gathering func-

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tions of the catalog lead to the need for authority control. Runkle discusses the differences between a machine-produced and an online catalog and the effect of these differences on authority control procedures and mechanisms. Malinconico provides a carefully considered presentation that includes background, theory, applications, and implications—perhaps the best single statement on authority control.

In this article, an attempt will be made to review authority control as it has been represented in the literature from circa 1900 to the present. This review, limited primarily to United States and Canadian publications, looks first at the role of authority control presented in cataloging codes. Then, a few cataloging handbooks and the like are examined. This is followed by recent efforts to develop authority files. Finally, the impact of automation on authority control is considered, particularly the increased need for authority control created by automation of library records and catalogs as well as the potential for meeting that need with computer assistance and in networks.

AUTHORITY CONTROL IN CATALOG CODES

Cataloging codes include the rules for establishing the form of headings and the use of references, thereby providing instruction for determining preferred and variant forms. Beyond dictating the use of references, the codes tend to leave the implementation to the cataloger. Justification varies, as do procedural details.

Cutter recognized the need for authority control in the form of “the cataloger’s author list, kept alphabetically,” which “prevents duplication of work. It is a record of the form of name ‘in full’ which has been adopted, with a note of the authorities consulted and of their variations.”⁹ However, it is noteworthy that the primary justification he cited for such a file was the avoidance of duplication of work. Although Cutter did not specifically mention authority control elsewhere in his rules, there is an implicit need for authority control if the collocation function expressed in his second object is to be fulfilled.¹⁰ Also, authority control is implicit in the syndetic or connective structure of the catalog advocated by Cutter.

Bregzis describes Cutter’s catalog as being based on a syndetic structure of records whereas current practice is based on a syndetic structure of entries. In a record syndetic structure catalog, it is the records that are correlated or linked; in an entry syndetic structure catalog, only entries are correlated or linked, independently of bibliographic records.¹¹

The *Catalog Rules: Author and Title Entries* (1908), strongly influenced by Cutter, assumed a syndetic structure but failed to mention explicitly any form of authority record.¹² Cross-references were prescribed, but no means of keeping track of them was suggested.

In marked contrast, the 1941 *A. L. A. Catalog Rules* offered a three-page appendix on the use and construction of authority cards for headings representing personal and corporate names and uniform titles. It is interesting to note that the justification remained “for the convenience of the cataloger.”¹³

The *A.L.A. Cataloging Rules for Author and Title Entries* reverted to the 1908 rules in which cross-references were prescribed but without any suggestion for keeping a record of references used.¹⁴ AACR1 followed the same pattern.¹⁵

AACR2 provided detailed instructions including an entire chapter on the making of *see* and *see also* references; once again, the emphasis was on the references that were to be made, but without suggestions as to how a library was to keep track of those references that had been made.¹⁶

AUTHORITY CONTROL IN CATALOGING HANDBOOKS AND MANUALS

Justification for authority work is also varied in cataloging handbooks and manuals. The actual instructions for preparing authority files are largely consistent.

Akers' instructions for the preparation of name and subject authority files made it clear that convenience to the cataloger was the primary criterion; however, convenience included a listing of cross-references used in relation to each heading.¹⁷ Mann placed a different emphasis on the authority file: "to insure accuracy and uniformity in the use of names, to record variant forms of authors' names, and also to trace the necessary references."¹⁸ Cataloger convenience had given way to the actual collocating or syndetic function as a primary justification.

Tauber described a name authority file as serving "as a record of authorities consulted in establishing the form of name accepted, of references made from other forms of name, and of the name forms already in use in the catalog, thus saving time in checking for conflict, especially when the cataloger does not have quick access to either a public or official catalog."¹⁹

Osborn recommended that an authority file "should not be made . . . especially under the no-conflict regime, unless a library is ready to justify the expense of making and filing the additional records." He explained this by saying, "The principal function of the authority card today is to serve as a ready indication of what cross references have been made."²⁰

Wynar specified that "the purpose of the authority file is to keep entries uniform,"²¹ while Foster said that many libraries use main card catalogs and other tools as authority files "to maintain consistency in their catalogs" and "to prevent duplication of work."²² Piercy explained that some libraries maintain authority records so that they can "use the same form in the catalog for each personal and corporate name so that all cards for works by and about the person or body will file together."²³

Over the years, the Library of Congress has participated in a variety of cooperative cataloging projects. During the 1930s and 1940s, more than 350 participating libraries submitted both cataloging copy for agreed-upon categories of materials and authority cards for the corresponding personal and corporate names not previously established at LC. As an aid to these libraries, the Descriptive Cataloging Division of the Library of Congress published the *Cooperative Cataloging Manual for the*

Use of Contributing Libraries. Included were detailed instructions for preparing the cataloging copy and authority cards. No rationale was provided for authority control—perhaps on the assumption that the contributing research libraries already understood that aspect of the problem. The cataloging copy and authority cards were edited by LC staff for conformity to standard rules and practices.²⁴

Reflecting the fact that instructions for creating an authority file are absent from recent catalog codes, Simmons College Library decided, after creating an authority file, to prepare and publish a manual to be used for establishing and maintaining a name authority file. Their justification for preparing the manual was that they found “that Chapter 5 of AACR is not exactly a beginner’s guide to cross references.”²⁵ Their justification for creating the authority file was “to supply the users of our catalog with plentiful and accurate cross references to help them use the catalog effectively” and to “decrease wear and tear on the staff.”²⁶

The University of Texas at Austin produced an outstanding guide to name authority control for its card catalogs.²⁷ Far more than a how-to-do-it book, this guide set forth the rationale for authority control, explained past local practices, gave descriptions of the principal sources of name authority data, and listed specific instructions for the creation of name authority records. Although specific to one university’s libraries, this volume should be a primary source for other libraries setting up or modifying their authority control practices, and, while intended for use with a card catalog, much of it is applicable to authority control in other forms of catalogs.

RECENT AUTHORITY FILE EFFORTS

Most of the recent efforts to create authority files reported in the literature have relied on computer assistance. Some were actually initiated in response to needs made explicit in the course of efforts toward automation, while others simply made use of the computer as an appropriate, convenient, and efficient tool.

One of the more ambitious efforts, and one that was outside the traditional library environment, was the automated Author Index Manufacturing System (AIMS), developed in 1977 by Chemical Abstracts Service to replace a manual system. The purpose of AIMS was “to differentiate clearly between individuals with similar names and to ensure that all papers and patents associated with a specific individual or corporation are indexed at the correct name.” The AIMS file for one year contained a third of a million corporate and personal names; more than one million author entries were matched against the file in 1978.²⁸

One of the first efforts was embedded in the New York Public Library’s computer-produced book catalogs, in use since January 1971. It is still a prominent landmark in work with automated authority control. This rigorous automated bibliographic control system relied on its authority control file to provide “the fundamental utility of the system”: the form of each heading used was recorded and cross-references were systematically maintained.²⁹ The principal advances over this system in

thirteen years have involved either online systems and/or provisions for multiple files for two or more libraries or two or more vocabularies or languages.³⁰ Prime examples are *Candiana* and CAN/MARC tapes, produced by the National Library of Canada, in which extensive use of an authority file not only supports collocation and syndetic functions, but also facilitates assignment of equivalent subject terms and forms of names in French and English.³¹

In 1981, R. R. Bowker published *Authors' Names: An Authoritative Listing of Personal and Corporate Names* "based on Library of Congress cataloging of some 90,000 personal and corporate names found in 140,000 *Books in Print 1980-1981* entries."³² The effect of this list was to associate personal and corporate authors' names found in *Books in Print* with the forms of those names established by the Library of Congress.

The Library of Congress has slowly but systematically pursued authority control as a goal for many years. For most of a century, other libraries have been able to rely on LC as a de facto source of authority file data by adopting the entries and cross-references determined by LC and distributed on printed cards, through the printed volumes of the National Union Catalog, and through the distribution of MARC tapes. (Of course, the LC list of subject headings forms an authority file in its own right.) Thus, while libraries had the use of authoritative headings dispersed throughout other files, the authority file itself was not accessible, being housed within the Library of Congress.

Because of efforts by the Library of Congress and other organizations, it is becoming possible for other libraries to have access to and, in some cases, participate in the creation and maintenance of the Library of Congress' authority files. Only a few of the highlights of this process are cited here.

In 1974, the Library of Congress began issuing *Library of Congress Name Headings with References* in which appeared newly established and newly revised name headings together with references; headings without references were excluded.³³ *Name Authorities, Cumulative Microform Edition*, a COM publication, listed all name authorities from the computerized master file at the Library of Congress, including both headings with and without references.³⁴

The appearance in 1976 of the preliminary edition of *Authorities, a MARC Format* unlocked the door to a new era in authority control by setting a national baseline for automated authority records and their communication. While this preliminary implementation of the ANSI standard for the communication of authority records by means of magnetic tapes established a format only, it carried an implicit standard for quality as well, with specifications and content designators for name, uniform title, and subject authorities. This preliminary edition is now a historical document, having been superseded by the first edition; however, the "Introduction," particularly the detailed and concise definitions, remains useful.

The Library of Congress began creating machine-readable name authority records in 1977 for English-language materials. This program

was widened to include most currently established name headings, and was further supplemented by retrospective conversion of older records for headings needed on records currently being cataloged.³⁵

The Northwestern Africana Project at Northwestern University Library examined the feasibility of having decentralized creation and input of authority data. At the conclusion of the project, it had been demonstrated that authority data of a quality acceptable for inclusion in Library of Congress files could be developed at a remote site provided that adequate guidance was given and that a rapid (preferably online) communication link was established between the Library of Congress and the site.³⁶

By the end of 1979, the U.S. Government Printing Office Library and the Texas State Library were submitting name authorities to the Library of Congress, and the libraries at the University of Texas at Austin, Northwestern University, and the University of Wisconsin at Madison were being prepared to submit name authority data also. The Library of Congress trained staff members from the libraries; data were sent to the Library of Congress by telecopier or mail with telephone confirmation back to the participating libraries.³⁷

Each of the three major bibliographic utilities has responded to the need for authority control in its own way. OCLC incorporated the LC authority data into its database and provided "read only" access by means of a specially flagged author search; authority and bibliographic records were not linked other than by provision for the terminal operator to return to the bibliographic record displayed immediately prior to the display of an authority record. A detailed and useful manual was made available.³⁸

The Council on Library Resources awarded a grant to the Research Libraries Group and the Washington Library Network as one step toward a nationwide, shared authority file system. The Library of Congress participated in planning and coordinating the project. The Research Libraries Group planned to use a portion of the grant for the implementation of an authority control subsystem. The Washington Library Network, which had developed its authority file subsystem prior to the establishment of the MARC format for authorities, planned to use a portion of the grant to revise its system in order to be able to use MARC authority data. Consideration was also to be given to rationalizing the process by which new authority records are created and entered into a system.³⁹

In 1981, the Library of Congress published the first edition of *Authorities: A MARC Format*, replacing the 1976 preliminary edition. The major difference, other than technical detail, was the addition of series authority and series treatment information; the preliminary edition had included specifications and content designators for name, uniform title, and subject authorities only. Unfortunately, the preliminary edition's "Introduction," with its definitions, was not carried forward into the new edition. The principal import of this publication was that a full-fledged national standard was available for the recording, structuring, and sharing of authorities for names (both personal and corporate), uni-

form titles, subjects, and series. While individual users might prefer certain variants over those adopted, a recognized benchmark was now available; it would be foolish for any new system to be developed that could not receive and send authority data in the MARC format.

AUTOMATION AND AUTHORITY CONTROL

In the overview presented in the first part of this paper, authority control was described largely in terms of name authority files within single libraries where authority work was designed to make catalogers more efficient in their work and to support the gathering function of the catalog. As catalogs grew larger and as ready-made catalog copy became more available, many libraries came to rely on outside sources for authority and reduced the internal, directly accountable overhead for cataloging by doing away with their authority files; cataloging productivity was perceived as being increased while concern for collocation in the catalog was set aside. The creation and maintenance of authority files was considered too expensive for the perceived product within the local library.

With the introduction of the computer, the automated library need not be isolated, but can effectively work with other libraries, sharing data and resources. Further, the maintenance associated with authority files, a significant work-load factor in a manual catalog, can be reduced substantially in a computer-prepared or online catalog. For example, the Washington Library Network reported revising 4,873 bibliographic records for subject heading changes in twenty and one-half hours; in a manual system, this project would have involved pulling, correcting, and refileing nearly ten thousand cards.⁴⁰ An authority record established by one library can be shared with and used by many other libraries. Revision in an authority record can be entered once with the computer applying the change(s) to the appropriate point(s) throughout the file(s). Thus, while the creation of an authority record may be no less expensive than before, through sharing it can be used by many libraries at little additional cost, and the related clerical routines may be reassigned to the computer at a much lower unit cost.

The MARC format for authorities referred to previously is a basic tool in authority control, since it provides a recognized file structure for the communication of authority data and because it contains an implicit standard for the quality of authority data that are to be communicated.

So long as an authority file was the internal record of a single library, it was perceived as a convenience for that library and a matter of concern to that library only. Automation permits a realistic expectation of authority control at the regional, national, and international levels; authority control is a necessary element of universal bibliographic control.

The literature dealing with automated authority control can be categorized into two primary groups: the practical and the philosophical. The practical is dominated by descriptions of file structures, programs for working with these files, and both real and envisioned products. Several of the papers cited in the section on recent authority file efforts fall into this practical group. The theoretical papers, a minority, examine

the function of authority control and consider idealized systems of authority control for the future. The previously cited articles by Malinconico and Bregzic are particularly strong examinations of the theoretical bases of authority control.

The IFLA sections on Cataloguing and Mechanization jointly collected data from various national bibliographic agencies regarding their authority files. The results of this survey were published in 1978 under the title *A Survey of Authority Files and Authority Control Systems for Catalogue Headings: First Report*. A joint Working Group on an International Authority System was then established "to discuss and formulate the specifications for an international authority system to satisfy the bibliographic needs of libraries" and to work toward the implementation of those specifications. In 1979, the Working Group began to "define the functions, bibliographic activities and medium of exchange that an international authority system would support."⁴¹ Four levels at which an international authority system might operate were described in a working paper: (1) an agreement on the content of an authority record so that such records could be transmitted from one national agency to another, (2) exchange of these authority data in machine-readable form, (3) unique identification of headings by means of International Standard Authority Numbers (ISAN), and (4) an interactive system in which data could be collected as a part of the cataloging process and made available to other users.⁴² The primary importance of this Working Group's report was the recognition that effective universal (i.e., international) bibliographic control requires international authority control as a prerequisite.

Buchinski, a prolific author on authority control, deserves special mention. In addition to describing authority control work at the National Library of Canada,⁴³ he has examined authority control as it may develop in the future. In 1976, he was asked by the Library of Congress to consider the role of authority control in a national bibliographic network. The final report, one of a series of Network Planning Papers, includes chapters on "The Library Catalog" (including the objectives of a catalog), "The Authority File," "National Library Network Participants," "National Library Network Resources," "Authorities: A MARC Format," and "The National Library Network Authority File."⁴⁴ Drawing on the material that went into this report, Buchinski also attempted a look at the future of network authority control.⁴⁵

Looking further into the future, Gorman has described tomorrow's catalog in which authority control will be an integral feature; however, the presence of authority control will be transparent or invisible to the user. Any form of a heading entered by the user will lead directly to the appropriate bibliographic record without intermediary steps being required of the user. Thus, references will lead to bibliographic records rather than to authorized forms of headings.⁴⁶

SUMMARY

How might authority control ideally manifest itself in a catalog? The following characteristics seem reasonable from the point of view of both

the cataloger and the user. A bibliographic record, together with all variant forms of each associated heading, would be entered into the system. The computer would establish linkages between authority records and the variant forms of headings and between the preferred forms of headings and the bibliographic record. When a user keyed in a known form of a heading, the system would follow the internal linkages and display the requested item even though the preferred form of the heading might be quite different from the form entered. Although, technically, the computer would follow one linkage to the preferred form of the heading and then a second linkage to the bibliographic record, to the user it would appear that a direct linkage existed between the form of heading entered and the bibliographic record displayed. The authority control mechanism would be invisible so far as the user was concerned. Authority records would be displayed only on request.

Cutter would have enjoyed a catalog like that!

RECOMMENDED READING

This brief overview of the literature has traced the concept of authority control through eighty years of library publications. Much detail, particularly in the areas of computer file structure and systems design, has been omitted. For the reader wishing to pursue the topic of authority control further, the following items are recommended.

Schmierer, Helen F. "The Relationship of Authority Control to the Library Catalog," *Illinois Libraries* 62:599-603 (Sept. 1980).

A short and basic introduction to the concept of authority control.

Runkle, Martin. "Authority in On-Line Catalogs," *Illinois Libraries* 62:603-6 (Sept. 1980).

Applies the concepts of authority control to the online catalog environment.

Miller, R. Bruce. *Name Authority Control for Card Catalogs in the General Libraries*. Austin: University of Texas at Austin, General Libraries, 1981.

Detailed explanations, with examples, of all aspects of authority control work in a single large library. Largely transferable to other library and network environments.

Malinconico, S. Michael. "Bibliographic Data Base Organization and Authority File Control," *Wilson Library Bulletin* 54:36-45 (Sept. 1979). Reprinted in *Authority Control: The Key to Tomorrow's Catalog*. Ed. by Mary W. Ghikas. Phoenix, Ariz.: Oryx Pr., 1982, p.1-18.

Comprehensive and thoughtful discussion of the purposes and applications of authority control.

Buchinski, Edwin J. *Initial Considerations for a Nationwide Data Base*. (Network Planning Paper, no.3) Washington, D.C.: Library of Congress, 1978.

Identification and exploration of problems and issues to be resolved before widespread working networks can be fully implemented.

What's in a Name? Control of Catalogue Records through Automated Authority Files. Ed. and comp. by Natsuko Y. Furuya. Toronto: 1978.

Proceedings of the workshops sponsored by the National Library of Canada; the Canadian Library Association; the Office of Library Coordination, Council of Ontario Universities; and the University of Toronto Library Automation

Systems; Ottawa. December 8-9, 1977; Vancouver, May 25-26, 1978. State of the art from the Canadian point of view.

Authority Control: The Key to Tomorrow's Catalog. Ed. by Mary W. Ghikas. Phoenix, Ariz.: Oryx Pr., 1982.

Proceedings of the 1979 Library and Information Technology Association Institutes. State of the art from the North American point of view.

REFERENCES

1. Library of Congress, Processing Services, *Authorities: A MARC Format*, 1st ed. (Washington, D.C.: Library of Congress, 1981).
2. United States, Library of Congress, Marc Development Office, *Authorities, a MARC Format*, prelim. ed. (Washington, D.C.: Library of Congress, 1976), p.1.
3. *Ibid.*, p.1-3.
4. Edwin J. Buchinski, *Initial Considerations for a Nationwide Data Base*, Network Planning Paper, no.3 (Washington, D.C.: Library of Congress, 1978), p.6-9.
5. Ritvars Bregzis, "Integrated Access to Information and the Economic Reality," in *What's in a Name? Control of Catalogue Records through Automated Authority Files*, ed. and comp. by Natsuko Y. Furuya (Toronto, 1978), p.121-34.
6. Helen F. Schmierer, "The Relationship of Authority Control to the Library Catalog," *Illinois Libraries* 62:599-603 (Sept. 1980).
7. Martin Runkle, "Authority in On-Line Catalogs," *Illinois Libraries* 62:603-6 (Sept. 1980).
8. S. Michael Malinconico, "Bibliographic Data Base Organization and Authority File Control," *Wilson Library Bulletin* 54:36-45 (Sept. 1979).
9. Charles A. Cutter, *Rules for a Dictionary Catalog*, 4th ed., rewritten (Washington, D.C.: Govt. Print. Off., 1904), p.133.
10. *Ibid.*, p.12.
11. Ritvars Bregzis, "The Syndetic Structure of the Catalog," in Mary W. Ghikas, ed., *Authority Control: The Key to Tomorrow's Catalog* (Phoenix, Ariz.: Oryx Pr., 1982), p.19-35.
12. *Catalog Rules: Author and Title Entries*, comp. by committees of the American Library Association and the (British) Library Association, American ed. (Chicago: American Library Assn., 1908).
13. *A.L.A. Catalog Rules: Author and Title Entries*, prelim. American 2d ed. (Chicago: American Library Assn., 1941), p.339-41.
14. *A.L.A. Cataloging Rules for Author and Title Entries*, 2d ed., ed. Clara Beetle (Chicago: American Library Assn., 1949).
15. *Anglo-American Cataloging Rules*, North American text, gen. ed., C. Sumner Spalding (Chicago: American Library Assn., 1967).
16. *Anglo-American Cataloging Rules*, 2d ed., ed. Michael Gorman and Paul W. Winkler (Chicago: American Library Assn., 1978).
17. Susan Grey Akers, *Simple Library Cataloging*, 4th ed. (Chicago: American Library Assn., 1954), p.51-54.
18. Margaret Mann, *Introduction to Cataloging and the Classification of Books*, 2d ed. (Chicago: American Library Assn., 1943), p.127.
19. Maurice F. Tauber and associates, *Technical Services in Libraries*, Columbia University Studies in Library Service, no.7 (New York: Columbia Univ. Pr., 1954), p.137-38.
20. Andrew D. Osborn, *Descriptive Cataloging*, 2d prelim. ed. (Pittsburgh: University of Pittsburgh, Graduate School of Library and Information Sciences, 1965), p.78.
21. Bohdan S. Wynar, *Introduction to Cataloging and Classification*, 5th ed. (Littleton, Colo.: Libraries Unlimited, 1976), p.401.
22. Donald L. Foster, *Managing the Catalog Department*, 2d ed. (Metuchen, N.J.: Scarecrow, 1982), p.18.
23. Esther J. Piercy, *Commonsense Cataloging*, 2d ed. (New York: Wilson, 1974), p.123.
24. Library of Congress, Descriptive Cataloging Division, *Cooperative Cataloging Manual*

- for the Use of Contributing Libraries (Washington, D.C.: Govt. Print. Off., 1944).
25. Edith K. Baecker and Dorothy C. Senghas, *A Little Brief Authority* (Boston[?]: DeDoss Associates, 1978), p.7.
 26. *Ibid.*, p.7-8.
 27. R. Bruce Miller, *Name Authority Control for Card Catalogs in the General Libraries* (Austin: University of Texas at Austin, General Libraries, 1981).
 28. Richard B. Sharpe, John B. Fox, and Silas E. Hammond, "Computer-Based Editing of Personal and Corporate Author, Inventory, and Patent Assignee Names for Publication in CA Author Indexes," in American Society for Information Science, Conference, New York, 1978, *Proceedings: Information Age in Perspective* 15:303-5 (1978); Richard B. Sharpe, "An Author Name Authority File System," in Mary W. Ghikas, ed., *Authority Control: The Key to Tomorrow's Catalog* (Phoenix, Ariz.: Oryx Pr., 1982), p.119-27.
 29. S. Michael Malinconico and James A. Rizzolo, "The New York Public Library Automated Book Catalog Subsystem," *Journal of Library Automation* 6:3-36 (March 1973).
 30. For example, see the following papers in Mary W. Ghikas, ed., *Authority Control: The Key to Tomorrow's Catalog* (Phoenix, Ariz.: Oryx Pr., 1982): Gwen Miles Culp, "Authority Control within the Washington Library Network Computer System," p.62-84; Michael B. Wessells and Robert Niehoff, "Synonym Switching and Authority Control," p.97-118; Barrie A. F. Burns, "Authority Control in Two Languages," p.128-57.
 31. Hope E. A. Clement, "The Automated Authority File at the National Library of Canada, *International Cataloguing* 9:45-48 (Oct.-Dec. 1980); Cynthia J. Durance, "Automated Authority Control," paper presented to the Library Association of Australia, Cataloguers' Section, Victoria Group, Melbourne, Sept. 5, 1979; Jack Cain, "Preparing for AACR II by Using an Automated Authority System: The Canadian Experience to Date," paper presented at a joint workshop entitled "AACR 2: The Problems of Implementation." Sponsored by CASLIS and the Council of Federal Libraries and held in Ottawa on January 24-25, 1980; *What's in a Name? Control of Catalogue Records through Automated Authority Files*, ed. and comp. by Natsuko Y. Furuya (Toronto, 1978).
 32. *Authors' Names: An Authoritative Listing of Personal and Corporate Names* (New York: Bowker, 1981), p.v.
 33. *Library of Congress Name Headings with References* (Washington, D.C.: Library of Congress, 1974-).
 34. *Name Authorities, Cumulative Microform Edition* (Washington, D.C.: Library of Congress, 1979-).
 35. "Name Authority Records Put in Machine-Readable Form," *Library of Congress Information Bulletin* 37:726 (Dec. 1, 1978).
 36. Janet Swan Hill, "The Northwestern Africana Project: An Experiment in Decentralized Bibliographic and Authority Control," *College & Research Libraries* 42:326-32 (July 1981).
 37. "LC, Three University Libraries Agree on Name Authority Cooperation," *Library of Congress Information Bulletin* 39:53 (Feb. 15, 1980).
 38. *Name-Authority: User Manual* (Columbus, Ohio: OCLC, 1979).
 39. "RLG, WLN, LC Receive CLR Grants for Authority Control System," *Law Library Journal* 73:750-51 (Summer 1980).
 40. "A Working On-Line Authority Control," *Journal of Library Automation* 13:64 (March 1980).
 41. Tom Delsey, "IFLA Working Group on an International Authority System: A Progress Report," *International Cataloguing* 9:10 (Jan.-Mar. 1980).
 42. *Ibid.*
 43. Edwin Buchinski, "Authority Files at the National Library: Plans and Developments," paper presented at the CACUL Workshop on Automated Systems, Winnepeg, June 22, 1974; Edwin J. Buchinski, William L. Newman, and Mary Joan Dunn, "The Automated Authority Subsystem at the National Library of Canada," *Journal of Library Automation* 9:279-98 (Dec. 1976); Edwin J. Buchinski, William L. Newman, and Mary Joan Dunn, "The National Library of Canada Au-

- thority Subsystem: Implications," *Journal of Library Automation* 10:28-40 (March 1977).
44. Buchinski, *Initial Considerations*.
 45. Edwin J. Buchinski, "Authorities—A Look into the Future," in *What's in a Name? Control of Catalogue Records through Automated Authority Files*, ed. and comp. by Natsuko Y. Furuya (Toronto, 1978), p.203-24.
 46. Michael Gorman, "Authority Files in a Developed Machine System (with Particular Reference to AACR II)," in *What's in a Name? Control of Catalogue Records through Automated Authority Files*, ed. and comp. by Natsuko Y. Furuya (Toronto, 1978), p.179-203; and his "Authority Control in the Prospective Catalog," in Mary W. Ghikas, ed., *Authority Control: The Key to Tomorrow's Catalog* (Phoenix, Ariz.: Oryx Pr., 1982), p.166-80.

FOR YOUR INFORMATION . . .

Anglo-American Cataloguing Rules, Second Edition, Revisions, as approved by the Joint Steering Committee for Revision of AACR, is now available. The American Library Association has published the text in a format that will facilitate integration of the revisions into the original text. Priced at \$2.50 on a cost-recovery-only basis, the *Revisions* may be obtained from the Order Department, American Library Association, 50 East Huron St., Chicago, IL 60611 (ISBN: 0-8389-8277-0). The text of the revisions will be issued also as part of the Library of Congress rule interpretations in *Cataloging Service Bulletin*. According to present plans, they will appear in the Fall 1982 issue, *CSB*, no.18.

Desiderata for a National Series Authority File

Susan Matson

Plans have existed for some time to include series authority records within the national online authority system. There are many problems with series that need to be resolved before a workable system can be created. This article examines some of those problems, including the following: (1) the method by which titles might be selected for inclusion in a series or title authority file; (2) the kinds of information in addition to the title that need to be included in series authority records; (3) how series headings in the authority file might be constructed; and (4) a method for handling simultaneous minor variations in series titles through the use of uniform titles.

PLANS HAVE EXISTED for quite some time to include series authority records in an online system available to the country in the same way that name authority records are now available. A working document of the Council on Library Resources' Bibliographic Service Development Program outlines a proposed online authority service in which selected institutions would contribute authority records, including series authority records, to a system built and maintained by the Research Libraries Information Network (RLIN) with the participation of the Library of Congress.¹ The authority records created would be used for internal processing by the contributing institutions, but would not include institution-specific data, and would eventually be made available nationwide. The specific purposes of this authority service as set out in a new document, *Requirements Statement for the Name Authority File Service*, would be to collect and maintain authority data for names, titles, and series; to record and maintain relationships between and among the headings for names, titles, and series; and to accept only authority records in or compatible with the MARC authority format as specified in *Authorities: A MARC Format* and its addenda.²

While this move toward establishing a nationwide authority system is still in the developmental stages, the time is ripe to ask some questions about how series might be handled in such a system and what we might ultimately hope for in a nationwide series authority system.

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There are several fundamental differences between series and names that make the development of a series authority system more difficult than perhaps initially envisioned. One difference involves the close kinship that series have with serials, such that there is potential interchangeability of identity between the two. By and large, a name is always a name, but a series is not always a series. Within certain limits, a particular collective title may be interpreted either as a serial title or as a series title. A serial title is treated solely as a main entry within the bibliographic subsystem of a database. A series title, on the other hand, is included in the authority subsystem, which then directs its bibliographic handling not as a main entry but as an element of description and secondary access in bibliographic records that bear some other main entry.

The identification of a collective title as serial or series involves decisions that relate to accepted definitions as detailed in cataloging rules, and also to local handling decisions that may override the accepted definitions to meet local exigencies. These decisions may also result in treating the title both as the main entry of a serial record and also as a series in related monographic records. The extent to which an authority file can work to identify series as such is unclear within a national context.

Series titles also share with serial titles all the fluidity involved in title changes and the consequent necessity to establish whether or not a change has in fact taken place, and to interlink former and later titles. While this fluidity is somewhat akin to the changes that can occur with corporate body names, different or additional information may be required for series in the authority file than is currently provided for names in order to enable users to identify and handle such changes successfully.

Another difference between series and names is that a different fundamental assumption underlies the bibliographic handling of series from that which underlies the bibliographic handling of names. When a heading form for a personal or corporate name is established in an authority file, the general understanding is that *if it is deemed appropriate* to use that name on the bibliographic record for a new work, the name should take the form indicated by the heading in the authority record. However, if the name occurs in the new work in a context in which it is inappropriate to bring it out as a heading, it may or may not appear in even the descriptive part of the record. Such should be the case, for instance, of a coauthor listed fourth in a list of personal authors, or of a body mentioned as having been the least of many involved in the sponsorship of a symposium. There is no implication that these names, even though they may appear in the chief source of the work, and even though they may exist as established headings in the name authority file, must appear in the bibliographic description of the work, let alone as access points to the work.

With series, the current conventions are different. The general understanding is that if a series appears on a piece, it *must* appear in the descriptive part of the bibliographic record. Moreover, it must also appear as an access point if it is a traced series or, alternatively, it *must not* appear as a heading if it is an untraced series. The handling of series is such that, once certain decisions have been made, there is to be no discretionary bibliographic treatment of the series in the same sense that there is

discretionary use of a name. These strictures are implied in rules 1.6B1 and 21.30L of the *Anglo-American Cataloguing Rules*, second edition, and underlie the very concept of a series authority file.³ Given that understanding, it is clear that series authority records may need to differ in some respects from name authority records to make such decisions clear.

HOW SHOULD SERIES BE DEFINED FOR INCLUSION IN AN AUTHORITY FILE?

While the standard function of a series authority system is to control the bibliographic handling of series, a secondary, or perhaps precursory, function is to identify those titles for which that handling is appropriate. In a local library, the finding of a collective title in the series authority file certifies that the title is handled locally as a series, just as the finding of the title in the local serial file would certify that the title is handled locally as a serial. These two files need not be mutually exclusive. In the case of an analyzed serial, the record for the title in the serial file may direct the classification and disposition of the individual pieces ("class together and analyze," "catalog separately," etc.), and the series authority file may then direct how the title is to appear as a series on the bibliographic records for each analyzed or separately cataloged piece.

One way that a series authority file, either local or national, can serve to identify collective titles as series is by conforming to the convention that the presence of a title in the series authority file constitutes the signal that the title in question is a series. The trouble with such a convention is that while the positive signaling device of presence in the file carries a clear meaning, absence from the file is ambiguous. It might signal that (1) the collective title in question is not that of a series but of an unanalyzed serial, or (2) the title is not in fact a collective title, or (3) the title is indeed a collective title of sorts but should be handled neither as a series nor as a serial but in some other way, or (4) the file is incomplete and does not yet include the title in question.

As defined in the *Requirements Statement*, the purpose of the Name Authority File Service would be the collection and maintenance of authority data for "names, titles, and series." If "titles" is narrowly meant as only the kind of collective title traditionally assigned to literary and musical works under the old definition of uniform title, then we may conclude that the rest of the titles in the authority file will, by default, constitute a series authority subset within the overall authority system. If this conclusion is correct, this series authority subset appears to be designed to conform to the convention that presence in the file will identify a title as a series, with the corollary that absence from the file will constitute an ambiguous signal.

We would not expect such collective titles as *Field and Stream* or the *Annual Report* of the Illinois Department of Agriculture to appear in such a file. We would expect general agreement among the contributing libraries that these titles represent unanalyzed and unanalyzable serials for which the occasion to provide bibliographic description *as series* will not arise. On the other hand, we will expect *Recent Researches in the Music of the Baroque Era* and *Acta Zoologica Fennica* to appear because we will ex-

pect that the contributing libraries, whether they class these titles together or not, will provide analytics for the monographic works that constitute the issues of these series and consequently will enter the series titles into the authority file.

Even though some of the contributing libraries may have chosen to class such titles together without analytics, we will expect that at least one library will treat each of them as a series. We can thus expect that the limitations of the local processing conventions of the contributing libraries will be overridden by the effect of differing policies among them and that most titles that could legitimately be seen as series will be caught and entered in the file through the contribution of at least one library.

However, because absence from the file may signal various possibilities other than that the file is incomplete, such an authority service may be only partially successful in encompassing the full range of possible series for users. Suppose we have in hand a publication that falls into the gray area between pure serial and possible monographic series, and we do not find the title in the national authority file. Consider such titles as *New Directions in Testing and Measurement* or *Daedalus*, a journal of the American Academy of Arts and Sciences. These are quarterly publications, each issue of which bears a title indicating the focus of the issue, but which is not monographic in nature. It is easy to defend local treatment of such collective titles as unanalyzed serials. Subject and class-number access might be substantially the same for each issue. Sufficient indexing may exist in bibliographic resources other than catalog records to provide access to the contents. Ultimately, it may simply be decided that the individual issue titles do not provide sufficiently compelling access points to warrant burdening a card file or archive tape with records for each piece. If such a collective title is absent from the national authority file, will we not be nearly as likely to infer that the contributing libraries have jointly concluded not to analyze it, and therefore not to provide a series authority record for it, as we are to infer that the title has simply not yet been entered into the authority system?

We will be faced with a different but analogous problem with those titles not included in the authority system because they have been defined out of the series category by recent Library of Congress rule interpretations. These interpretations have specified a number of serieslike statements that are no longer regarded by the Library of Congress as series, but rather are to be encoded or otherwise handled as report numbers or quote notes. They include sequences of numbers, letters, or combinations of numbers and letters that cannot be associated with a series title, as well as certain phrases that are essentially a statement of the name of an issuing body ("An American Astronautical Society publication"), or the name of a division or official of a publishing firm ("A Spectrum book," "A Helen and Curt Wolff book").⁴

In the recent past these serieslike statements were in fact treated as series, and many libraries have existing authority records for them. Excluding these from a national authority file would not serve those whose catalogs are not closed and whose local series authority files still control

both old and new records. How many of us have series authority records for, and consequently subfiles of series added entries in our catalogs for, publications such as *WMO* [publication]? How many of us have *A Spectrum book* in our authority files, albeit untraced, but directing its descriptive handling as a series rather than as a note?

The new edition of *Authorities: A MARC Format* in fact makes provision for handling such non-series. A "Type of Series Code" in the fixed fields provides the ability to specify whether the entry is a monographic series, a multipart item, a "series-like phrase not to be considered a series," or other.⁵ The presence of this field should encourage the contributing libraries to enter authority records for all the former series that are now non-series, as well as new ones that arise. Such records will perform a very useful function in enabling us to define the parameters of the new rule interpretations in addition to their primary function of controlling the appropriate use of series fields.

An alternative way that titles could be handled in an authority system would be to define the system to include all collective titles, regardless of whether they are traditional uniform titles, series titles, serial titles, or quasi-collective titles, rather than to attempt to confine the system to only the first two categories. Creation of such a system nationally would mean loading serial titles into the authority file, as well as inputting series and serieslike titles. While no mean task, the inclusion of such data is not outside the bounds of appropriate authority functions. Serial and periodical titles, for instance, are often needed for purposes other than serial cataloging. If there were a book entitled *Pictures from Life*, for example, consisting of photographs from the old *Life* magazine, an added entry would be needed for the periodical title. It is reasonable to expect the authority file to provide the correct form for the added entry (is it *Life*? *Life magazine*? *Life (Chicago)*?) without forcing a search of the bibliographic database for a good serial record to give the heading.

The necessity would still remain in such a collective-title file to differentiate those titles appropriately handled in series statements from those that should not be so handled, but such a file would accomplish the important aim of signaling by absence from the file only a narrow range of options—that the title in question is not yet in the file or is unquestionably not a collective title by either current or older definitions.

HOW SHOULD SERIES BE ENTERED IN AN AUTHORITY FILE?

Let us put aside for a moment the problems of defining series and examine the kinds of information that are necessary in an authority record to identify a particular series and to direct its handling on bibliographic records.

Suppose a local librarian is handling a monographic work with a series title in addition to its title proper. The librarian will first compare the data with the local series authority file to establish whether or not the

series is already known to the local system. The matching task may result in any of the following:

1. The series title on the work in hand exactly matches a title on an existing authority record and there is no doubt whatever that the piece in hand represents a work in the same series. (Often, to erase all doubt, clues such as imprint or numbering information must be used.)
2. The title matches a title on an existing authority record, but the form of the series heading on the local authority record represents pre-AACR2 practice. (For instance, the authority record shows an author/title entry that should, according to current practice, be structured as a uniform title.)
3. The title matches an existing authority record in some but not in all respects. (There are slight changes in wording or in other details which seem to indicate that the work in hand is a piece of the same series but that the title, identifying body, or issuing pattern has changed.)
4. The title does not match an existing authority record in any compelling respect, or it matches an authority record, but clues in addition to the title indicate that the match is highly suspicious, and suggest that there are two series with the same title, one of which will have to be qualified to distinguish it from the other.

All this matching activity requires more information on an authority record than a bare rendering of the title in heading form. In addition to extensive cross-referencing from issuing bodies, alternative title formulations, and acceptable variants of the title, it is frequently important to have numbering or date information, publication/distribution information, continues/continued by information, ISSN number, and, in fact, something approaching the information available on a serial record to establish a match. The authority record should help to distinguish, for instance, between a title such as *Studies in Economics* issued in London by Allen & Unwin beginning with number 1 in 1970, and *Studies in Economics* issued in India by the Department of Economics of Sardar Patel University, of which number 5 was published in 1966. As soon as a unique identifier is added to one of the titles, the problem of differentiation is at least partially solved. However, it is necessary to have sufficient information recorded on every authority record to prevent a second identical title from being confused with the first and to trigger the formulation of the uniform title for the second.

The MARC authority format provides subfielding in the title heading field (130) for the recording of title information only. The preliminary edition of the format defined no additional fields or subfields in which to record the necessary auxiliary information about a series. The newly issued first edition, however, includes a number of fields which accommodate much of this information. These include a field for the ISSN number and a group of fields in which can be input volume and date information (640), numbering peculiarities (641), form of series numbering to be used in series added entries (642), and place/publisher information (643).⁶ These fields, together with several that link the author-

ity record to a bibliographic serial record (014, 035), should go far toward providing the information necessary to establish a match between a series in hand and the appropriate authority record.⁷

A MARC authority record might render the essential auxiliary information necessary to specify the Allen & Unwin title above as follows:

022 bb 1234-5678 [fictitious]
 130 b0 Studies in economics
 640 0b 1 (1970)-
 642 bb no. 1
 643 bb London = Allen & Unwin

The 022 field contains the ISSN and the 130 field defines the established entry for the series. The 640 field shows the starting number and date of the series in a formatted style. The 642 field indicates that the issue numbering on bibliographic records would include the abbreviation "no." The 643 field includes place and publisher information. All three 64x fields help to identify this series uniquely in the absence of an overt unique identifier in the heading field and help to prevent a different *Studies in Economics* from being confused with it.

The authority format has considerable capacity to handle such information as recognized variants of the established title, other formulations of the entry, and links to former and later titles, through the 4xx (*see from*) and 5xx (*see also from*) authority fields. A sample authority record for the following imaginary title shows some of the possibilities:

130 b0 Research report (Comparative Studies Institute)
 410 20 Comparative Studies Institute. ≠ t Research report ≠ w nna
 410 20 Comparative Studies Institute. ≠ t Rapport de recherches
 430 b0 Rapport de recherches
 430 b0 Research reports
 530 b0 Comparative studies research report ≠ w a
 530 b0 Research in comparative studies series ≠ w b
 640 0b 9 (1967)-31 (1981)
 642 bb no. 9
 643 bb Toronto, Ont. ≠ b Comparative Studies Institute

In this record, the two 410 fields provide *see from* references from the issuing body, paired first with the English title and then with a parallel French title. The two 430 fields provide *see from* references from two variants of the title—the parallel title and a variant. The 530 fields provide *see also from* references from a former and a later title (identified as such by the differing values in the *w* control subfield).

The structure of the *w* control subfield has changed considerably between the preliminary and the first edition of the format. Its use is now restricted to cross-reference fields only, and it now consists of only four characters that specify usage restrictions and types of information peculiar to those fields.⁸ One type of information it provides is the earlier or later heading status of *see also from* entries as shown above. Another very important item of information is carried in the third character of the subfield, as shown above in the first 410 field. The value *a* in the example

indicates that this *see from* reference is the form of the heading established under earlier cataloging rules.⁹ We can all welcome this clearly defined and overt signal now available to tell us that a *see from* entry in an authority record represents a formerly valid controlling entry. We need to have that information to construct useful search strategies to retrieve older individual pieces of the series in local and union catalogs and to successfully structure the relationships in our local authority files.

These sample records are only brief approximations of a MARC authority record display. They lack a number of variable fields and subfields and all of the fixed fields. Nevertheless, they point out some areas of vital information, lacking in the preliminary edition of the format, that will help to make the series authority system work.

Not shown in these abbreviated sample records, but perhaps implied in the carefully structured entry of the second title, is an indication of whether or not the series is traced. The preliminary edition of the authority format lacked any provision for recording a trace decision. One of the most basic functions, if not the *raison d'être*, of a local series authority file is to provide precisely this information. The new edition of the authority format includes two fields that concern tracing policy. One of the fixed fields can be coded to reflect a global decision as to whether the series is "appropriate" for use as a series added entry.¹⁰ In addition, a variable field is available to record specifically whether or not the series is in fact traced.¹¹ The latter contains a repeatable subfield that indicates the institutions conforming to the cited tracing practice.

There are good grounds for applauding the inclusion of a trace decision in national authority records and equally good grounds for hoping that it will be used to thoughtful advantage. While extensive institution-specific data are not appropriate to a national record, some indication of at least a suggested trace policy would be welcome. It has been pointed out that series are different from names in that, once certain trace decisions have been reached, every piece of the series must be handled to conform with those decisions. To omit such an integral part of series authority from national records would leave such records performing only half the necessary authority function.

It is probable that most local libraries, in order to conform to national practice and to save local processing time, would abide by the trace decision recorded on the national authority record much of the time. Greater uniformity of cataloging would probably result so that searches of online union catalogs via indexed series fields would produce a fuller array of the items in traced series than is often the case now. Should local systems opt to abide by the national decision invariably, it could also allow the bypass of the local file when cataloging new pieces. This practice would leave local series authority systems with the tasks of merely ratifying the national decisions for local use, overriding them to meet urgent local needs, and providing the local control mechanisms necessary to relate current practice to past local practice.

Even though AACR2 appears to direct the tracing of many more series than were traced before, and to specify in a rather precise way those types of series that should not be traced, rule 21.30L still includes the

judgmental direction to trace a series "if it provides a useful collocation."¹² While such a statement legitimates our right to make local decisions, the benefits of shared cataloging are diminished to the extent that different perceptions of "usefulness" may lead to national bibliographic records which do not conform to the same standards and do not, therefore, result in full collocations of the items in a useful series, or result in unnecessary collocations of series that are not useful. If we take the need for orderly and useful collocation of series as a given, in a national as well as in a local context, then efforts to provide that orderliness through the control of a national authority file should be pursued and the mechanisms necessary to signal the trace decision should be as carefully defined as possible.

It should be pointed out that the actual structure of the entries in the authority file can be affected by tracing decisions, whether overtly or covertly indicated, and it remains to be seen how entries in the national authority file will be structured around, or in spite of, tracing decisions.

For instance, according to current practice it is necessary to create a uniform title for a monographic series entered under title if its title proper is identical to the title proper of another series in the catalog. The Library of Congress specifies that the catalog referred to is the "file against which searching and cataloging is being done."¹³ If the file against which searching and cataloging is being done is understood to be the file of bibliographic records (that is, the card catalog or online union catalog), then we might infer that it is necessary to provide unique identifiers only for those identical titles which are traced, because these will be the only such titles to appear in the catalog in the form of added entries or in searchable fields. (Untraced titles remain buried in the descriptive parts of the records in which they occur and do not "appear" in the same sense.) However, if the file against which searching and cataloging are being done is not the bibliographic but the authority file, then within that file it may be necessary to create a uniform title for every series whose title is identical to another, even though many of the uniform titles so created may never be used as headings in the bibliographic file. Consider the following alternative situations.

First, suppose that it is the bibliographic file that acts as the "file against which searching and cataloging is done" and that it is necessary to create uniform titles only for those identical titles that occur as added entries in the catalog. The authority file, either local or national, can then permit subfiles of identical entries for series that are not traced, to save the trouble of distinguishing them with unique identifiers which will never be used. The identical titles might be arranged by subordinate information such as place of publication, resulting in a subfile such as the following (using the field tags of the authority format to indicate title and imprint information):

130 Colección popular

643 Mexico City, Mexico ≠b Fondo de Cultura Económica

130 Colección popular

643 Quito, Ecuador ≠b Casa de la Cultura Ecuatoriana

130 Colección popular
 643 San José, Costa Rica ≠b Editorial Costa Rica

Because these titles are allowed to exist in the authority file without formal differentiation, it would be generally understood that they are not traced. However, this may not necessarily be so. Suppose that, for some reason, the Mexican title is in fact traced by one of the libraries contributing to the national authority file. Although it is traced by that library, it still will not need a unique identifier in terms of the local catalog because it will be the first and only one of the identical titles to appear in the local catalog as a heading, since the other two titles are not traced. Likewise, it will not need a unique identifier in either the local or the national authority file itself because the authority file permits identical entries. However, although it requires no formal differentiation, the Mexican title has a status in the local library different from the other two titles, a status important for that library's construction of future entries. The library will probably add by some overt indication in its own authority file the information that the Mexican title is traced, resulting in the following:

130 Colección popular
 643 Mexico City, Mexico ≠b Fondo de Cultura Económica (TRACED)
 130 Colección popular
 643 Quito, Ecuador ≠b Casa de la Cultura Ecuatoriana
 130 Colección popular
 643 San José, Costa Rica ≠b Editorial Costa Rica

Now, if a fourth *Colección popular*, in this case from Bolivia, is added to that local file and is also traced, that fourth title will require a unique identifier to distinguish it locally, not from *all* the others, but from the one other that also acts as a heading in the local catalog. If the library contributes the resulting new uniform title it has created to the national authority file, the national file will then appear with this addition:

130 Colección popular (Oruro, Bolivia)
 643 Oruro, Bolivia ≠b Camarlinghi

The national file would then be in some disarray because its orderly arrangement by subordinate information has been disturbed, because a covert trace decision has now been included for one title (signaled by the fact that a uniform title has been created), and because it has been purely through the accident of a local tracing policy that a uniform title was constructed for one of the titles rather than for another.

We must not be left to infer whether a series is traced or not, and what its proper form of entry is, by a system such as this, which uses form of entry as a covert signaling device and which is so dependent, in a national context, on who traced what title first.

Suppose, alternatively, that it is the authority file, not the bibliographic file, that acts as the "file against which searching and cataloging is done." Uniform titles will then have to be created to distinguish between identical series titles in the authority file itself, and subfiles of identical titles will no longer be permitted. The Library of Congress, in a

perfectly understandable effort not to overuse the uniform title device, has repeatedly urged that a uniform title be created only for the second and subsequent of a series of identical titles, and that conflict not be predicted.¹⁴ This caveat would result in subfiles of the national authority file in which one title (the first to enter the file) would remain unmarked and in which all other identical titles would be provided with unique identifiers. The only effective factor in constructing the file would then be the accident of which title enters the file first rather than which title is traced first by some library. Thus, assuming that the Mexican title in our example was entered into the file first, we may expect the subfile in the national authority system to appear as follows:

- 130 Colección popular
- 643 Mexico City, Mexico . . .
- 130 Colección popular (Oruro, Bolivia)
- 130 Colección popular (Quito, Ecuador)
- 130 Colección popular (San José, Costa Rica)

While not perfect, this way of constructing the authority file provides a much more satisfactory means of handling the form of entry for each title and, moreover, provides a unique and correctly formulated heading for each title in case a library wants to trace one or more of them. However, this form of entry could lead to ambiguity in how the series is to be handled bibliographically unless we all fully understand in the same way how the authority file is supposed to interact with the bibliographic file.

Without an indication to the contrary, the uniform titles in the above array might be understood to imply that each of these series is traced. (Why go to the trouble of providing series authority records in bibliographic heading form if the series are not to be used as headings?) However, since a field now exists in the authority format to indicate whether or not a series has in fact been traced, the uniform title structure need no longer be interpreted as a covert signal that it should be used in series added entries. Uniform titles can exist in the authority file for possible use if it is locally deemed appropriate. The question remains whether the national authority file will follow the latter convention for entries or whether it will permit subfiles of identical entries and, if it permits such subfiles, which types of series would be allowed to exist without formal differentiation.

WILL THE CONCEPT OF UNIFORM TITLE BE USED TO FULL ADVANTAGE FOR SERIES?

The traditional concept of uniform title has recently been expanded by the Library of Congress to include use with serial and series titles. The new concept arose in an effort to close certain gaps in AACR2 rules that require title entry for the majority of series and serials but that fail to specify how resulting arrays of identical titles are to be distinguished one from another.¹⁵ The Library of Congress has proposed, elaborated, and implemented a system of unique identifiers added parenthetically to otherwise identical series titles to group together the added entries for a particular series and to segregate them from groups of added entries that

belong to other series. The resulting uniform titles for series provide a needed mechanism for orderly collocation. Moreover, they focus our attention on the desirability of such orderly collocation and the possibility of achieving it by the use of uniform titles that do not necessarily have the overt, formal structure of parenthetical addenda to signal that they are uniform titles.

Consider the series that appears variously as *USDA Forest Service General Technical Report SE*, *Forest Service General Technical Report SE*, or *General Technical Report SE*, depending on the layout in the chief source of each piece. The layout varies and is uncorrelated with the numbers of the pieces in such a way that it could reasonably be said that the variants represent successive title changes. This type of title cries out for a uniform entry to collate all the pieces of what is clearly intended to be the same series. This particular title, however, does not require a unique identifier of the parenthetical sort whose presence would serve to signal that the resulting title is a uniform title; it is already unique in any and all of its manifestations. In just this sort of situation, the authority record could act to identify a uniform title, not by adding a unique identifier, but by the selection of one variant to act as the collating title, signaled as such by its occurrence in the heading field of the authority record.

The injunction to change serial (and series) records every time the title changes, an injunction that has brought some headaches but also a very great measure of uniformity to serials cataloging, might be relaxed somewhat for the handling of series. With series, the variable title acts as a secondary access point rather than the primary access point to the material on which it appears. Furthermore, the device of double recording in both series statement and series added entry is invariably present to provide the information that the title appears in one manifestation but is collocated under another. The variant title chosen to act as the heading might be the one that appeared on the first issue, the preponderant variant, the fullest variant, or some other. The criteria for selection would have to be agreed upon and shared with the country.

CONCLUSION

The preliminary edition of the MARC authority format left so much to be desired in the handling of series that it was virtually unusable as a means of providing adequate series authority control. The new edition has remedied many of the regrettable omissions. Among the desirable capabilities it provides are adequate means to:

- identify a title as a series
- specify numbering and name of parts/sections of a title
- provide publication, numerical/chronological, and ISSN information sufficient to identify each series uniquely, whether or not the heading itself includes a unique identifier
- specify numbering peculiarities and the citation of the numbering
- indicate whether or not a specific *see from* reference is a formerly valid controlling entry
- indicate whether a *see also from* reference indicates a former or later title

- provide connecting links to bibliographic serial records
- indicate whether a series is traced and/or is appropriate for tracing.

However, if we were to envision a national authority system designed to provide maximum help to the creation and maintenance of local systems and to impose a greater measure of uniformity to national bibliographic records, we might ask the following:

- that the national authority file include all collective titles and identify them for appropriate bibliographic handling on monographic records either as
 - series to be recorded in series fields
 - serieslike, but to be recorded in note fields
 - serial or periodical titles to be recorded in note and title added entry fields
 - traditional uniform titles to be recorded in title or title added entry fields
- that for those titles identified as series, the meaning of the “tracing practice” field be clarified as to the force it carries in indicating a national tracing policy
- that it be clarified as to whether it is the authority file or the bibliographic file that determines the need for a formally unique entry structure in the authority file and what, in consequence, the structure of the authority entries will be
- that the uniform title concept be exploited to its fullest to collocate capriciously variant series titles under a single heading

Those of us who work intimately with series decisions are highly interested in the development of a nationwide series authority system. We hope that it will substantially improve our ability to maintain self-consistent local systems compatible with national practice. The new edition of the MARC authority format offers a substantial step forward toward making that hope a reality. The decisions regarding its implementation by the proposed nationwide authority service will determine how genuinely useful it ultimately becomes.

REFERENCES

1. “An Integrated Consistent Authority File Service for Nationwide Use,” *Library of Congress Information Bulletin* 39:244-48 (July 11, 1980).
2. Council on Library Resources, Bibliographic Service Development Program, Task Force on a Name Authority File Service, *Requirements Statement for the Name Authority File Service* (Washington, D.C.: Council on Library Resources, 1981), p.1, 4; Library of Congress, MARC Development Office, *Authorities, a MARC Format, Specifications for Magnetic Tapes Containing Authority Records*, prelim. ed. (Washington, D.C.: Library of Congress, 1976); Library of Congress, Processing Services, *Authorities: A MARC Format*, 1st ed. (Washington, D.C.: Library of Congress, 1981).
3. *Anglo-American Cataloguing Rules*, 2d ed., ed. Michael Gorman and Paul W. Winkler (Chicago: American Library Assn., 1978; hereafter referred to as AACR2).
4. “Library of Congress Rule Interpretations (LCRI),” *Cataloging Service Bulletin* 14:10-11 (Fall 1981).
5. *Authorities: A MARC Format*, 1st ed., p.24.
6. *Ibid.*, p.37, 90-95.
7. *Ibid.*, p.35, 38.
8. *Ibid.*, p.62-67; Appendix II, p.22.

9. Ibid., p.66.
10. Ibid., p.25.
11. Ibid., p.98.
12. AACR2, p.324.
13. "Library of Congress Rule Interpretation (LCRI)," p.49.
14. The *Cataloging Service Bulletin* issued in the summer of 1979 directed the creation of a uniform title for each of two or more identical titles; the direction was somewhat narrowed in the 1981 Winter issue, which called for the creation of a uniform title for a serial if its title proper is identical to the title proper of another serial. The 1981 Spring issue added the injunction to resolve conflict by adding a uniform title to the serial being cataloged, not to the record for the serial cataloged earlier, and the 1981 Fall issue contained the further statement that conflict is not to be predicted. (*Cataloging Service Bulletin* 5:6 (Summer 1979); 11:46 (Winter 1981); 12:25 (Spring 1981); 14:49 (Fall 1981).)
15. Early discussion of the problem and the proposed solution can be found in *Cataloging Service Bulletin* 5:4-8 (Summer 1979); later and more fully elaborated information on the details of the uniform title solution appear in *Cataloging Service Bulletin* 14:10-12, 49-54 (Fall 1981).

SHARAF: The Canadian Shared Authority File Project

Helen MacIntosh

A group of users of UTLAS have cooperated with each other, the bibliographic utility, and the National Library of Canada to produce the content of an automated authority control system. This paper describes the history, operating procedures, and current activities of the group.

BORN OUT OF a bibliographic utility's proposal to meet the needs of its clients for automated authority control, adapted by the minds of a union catalogue group who had already wrestled with the problems of cooperative action, polished in a series of meetings in a hotel suite in Washington during ALA Midwinter in January 1979, and finalized in meetings at the National Library of Canada during the Canadian Library Association conference in June 1979, the Shared Authority File (SHARAF) programme has provided a workable answer to its users' requirements for automated authority control.

GENESIS OF SHARAF

As soon as a library closes its card catalogue and opts for some other means of reporting its collection to its users, the question of authority control, with its accompanying reference structure, arises. This was certainly the case for three public library clients of the University of Toronto Library Automation System (UTLAS) in 1974 as they moved into the world of book-form catalogues. The cataloguing support system they were using was still being finely tuned, and no work had yet been undertaken on an authority control system to complement it. The group met, did a literature search, had discussions with the New York Public Library about its authority system, reported the findings to UTLAS along with a request for some action, and sat back and waited.

As with all things in library automation, the wait proved to be much longer than they or UTLAS had originally expected. The rapid growth in the use of the cataloguing support system meant that much of the programming time at the utility was devoted to product profiles and system

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enhancements. However, by May of 1978 UTLAS was ready to put forward its Interim Name Source Authority File proposal as a means of creating a name authority union file for users of its system. The proposal was based on the idea that the high degree of commonality among the contents of authority files should be capitalized on through the creation of one set of files for all participating users. During May, August, and October of 1978, meetings were held to discuss the Interim Name Source Authority File proposal. Representatives from the British Columbia Union Catalogue Project, the National Library of Canada, the University of Alberta, and the UNICAT/TELECAT project (a bilingual union file project of a large group of university, public, and special libraries in Ontario and Quebec) met with UTLAS to discuss its suggestion.

As an outgrowth of these discussions, the British Columbia group put forward, on October 25, 1978, the first draft of the SHARAF proposal. It represented an expansion of the concepts in the Interim Name Source Authority File together with a suggested organizational and procedural plan for their implementation. It was this document that formed the basis for the discussions in Washington. In addition to those mentioned above, representatives of the Mississauga Public Library, the Edmonton Public Library, and the Metropolitan Toronto Library joined this and the subsequent discussions from which the SHARAF agreement arose.

The "SHARAF Development Agreement" was a recognition of the fact that there will always be a need to supplement the content of national source authority files, and that this need can be addressed most economically in a system that allows total sharing of user input while still making provision for user individuality in those few cases where this seems necessary.¹ Since files of name authority records in machine-readable form were already available from both the Library of Congress and the National Library of Canada, and since name authorities were perceived as being the most needed aspect of authority control, the SHARAF proposal began with name authorities. Subjects and, finally, series authorities were to be added as resources and stabilized MARC formats for them became available. The development agreement provided for two categories of membership in SHARAF. Charter membership was open to those libraries prepared to contribute 20,000 name authority records to the shared file or to any consortium of libraries prepared to contribute 100,000 records. To implement the program rapidly, a deadline of June 30, 1979, was placed on initial applications for charter membership, with the possibility of the addition of more charter members after the first phase of the project was completed. Charter members agreed to support SHARAF and its activities through participation on the board of directors and any committees SHARAF might form. (A Standards and Procedures Committee was the first and most obvious of these.)

In return for their contribution, charter members were deemed to be exempt from annual membership fees for the first three years of the project. As part of its contribution, UTLAS agreed that for the first year it would cover the costs of connect time to search, input, and edit

SHARAF records, the cost of active storage of SHARAF records, and the charges for search, display, and file source authority and/or SHARAF records in SHARAF accounts. The charter members were to assume communications costs and the labour costs for the creation and input of the contributed records.

For those libraries who simply wished to use the authorities facility, a regular membership in SHARAF was available. Records filed by these members would be validated against the content of the various authority files and linkages established. Where no authority record existed, and the regular member felt the need for one, a record could be created according to standards established by the Standards and Procedures Committee of SHARAF, and filed into the SHARAF file on the same financial terms as for charter members.

During the balance of 1979, a great deal of file-building activity took place. As it progressed, a number of different SHARAF files evolved. A small file was created to rectify the occasional gross error in the national source files. A much larger file was established for authority records based on Library of Congress current and past practice. (It is useful to bear in mind that in 1979 the name authority file being issued by Library of Congress was in AACR1 form, with AACR2 headings identified as such and imbedded as cross references. The file being issued by the National Library of Canada had a comparable content for Canadian headings.) To a large extent, this retrospective file represented a conversion into machine-readable form of the content of manual authority files in the participating institutions. A third file, contributed chiefly by the Mississauga Public Library, was in British AACR1 form but carried the current LC form as a cross-reference. Libraries linking their bibliographic records to authority files had the option of linking to either the first and second or the first and third of these user-contributed files in addition to the national ones. It was also possible to augment the reference structure of a national record by creating additional references in a record in one of the two user ranges and then linking that record to the corresponding one in the national file.

Once the name-file aspect of the project was well launched, SHARAF confronted the question of subject authority control. In addition to the Library of Congress subject headings list (LCSH),² Canadian libraries used a list of Canadian subject headings³ to augment the coverage for Canadian political, historical, and social topics. Some libraries also used headings from the Hennepin County subject authority list where they did not conflict with either of the established national lists.⁴ The Library of Congress had released a machine-readable form of its subject list as it stood in December 1978 but had been careful to make it quite clear that they would not be issuing updates to the file. No equivalent version of the Canadian list of subject headings existed, although the data did exist in a form ready for input.

After some discussion, it was decided to ask UTLAS to mount the 1978 version of LCSH and to divide responsibility for updating it, based on the content of the printed supplements to LCSH, among the charter members. Users were also authorized to create records for other subject

authorities on an "as needed" basis. The group decided to avoid creating series authority records if at all possible until the format for their creation had been stabilized.

Since Canada has two official languages, English and French, cataloguing routinely takes place in both of these languages, and National Library of Canada name authorities include French forms for such things as corporate names where there is a difference between the two forms. To provide subject access in French, a list of subject headings in French had been developed by Laval University over the years. This *Répertoire de vedettes-matières* included French translations of many Library of Congress subject headings as well as subject headings on Canadian topics. While Laval still maintains the content of this list, responsibility for its publication has been assumed by the National Library of Canada. As such, it was one of the source authority files available to SHARAF members and other UTLAS clients.

ORGANIZATIONAL STRUCTURE OF SHARAF

The "Development Agreement" provided for a board of directors. Permanent seats on the board were assigned to UTLAS and to the chair of the Standards and Procedures Committee. The National Library of Canada was given official observer status, with a seat at board meetings for its appointee, who cannot vote on board matters. Each charter member was given a seat on the board for an initial three-year term, and the agreement also provided for no more than two members to be elected from among the regular membership for a two-year term. Subsequent elections to the board were for two-year terms on a staggered basis. From its membership, the board elected a chairperson and a treasurer, each for a two-year term.

Under the agreement, the board is empowered to set policy and establish procedures for membership and participation. It ratifies new members and sets the conditions for withdrawal from SHARAF, should a member institution wish to transport its linked authority records to another system. The board establishes the fee structure for membership and approves policies and procedures put forward by the Standards and Procedures Committee.

The Standards and Procedures Committee has one member from each charter member institution plus the standards librarian or equivalent representative from each consortium member of SHARAF. Two members are appointed by the board from the membership at large, and one member is nominated by UTLAS (with nonvoting resource people as appropriate). The National Library of Canada appoints an official observer (plus resource people as appropriate), and representatives from the Canadian Committee on Cataloguing (CCC) and the Canadian Committee on MARC (CCM) serve as invited observers. On a reciprocal basis, a member of the SHARAF Standards and Procedures Committee is made available to CCC and CCM for their meetings. The committee is also authorized to invite additional resource people to its meetings as required. One of the member institutions supplies personnel for a position called "deputy SHARAF," whose duties are to edit and

link SHARAF records, resolve heading conflicts, and synchronize SHARAF records with source authority file records. The terms of reference for the committee also direct it to adopt and provide for the implementation of authority record standards, to issue a coding manual and related documents reflecting these standards, to direct the activities of the deputy SHARAF, to recommend procedures for the use of SHARAF to members, submit specifications for, and recommend changes to, its products, provide UTLAS with feedback concerning the use and development of SHARAF, adopt the national standards as formulated by the National Library of Canada and its appropriate committees, and recommend to the National Library of Canada authority records requiring authentication or resolution of conflicts with national records from other sources.

GOALS AND ACCOMPLISHMENTS

With the organizational structure in place, and with charter members fulfilling their responsibility to contribute authority records, the group set out to achieve the goals of SHARAF. As stated in the development agreement of 1979 they included the following:

- A. To encourage as much as is feasible the use of a single and consistent database of name, subject, and series holdings. This goal is especially important in at least three contexts:
 1. cross-library online file searching where catalogue collocation retrieval functions are required.
 2. the generation of union catalogue products for more than one user or library data file.
 3. the standardization of headings (or access points) in the sharing of catalogue records among libraries.
- B. To reduce to a minimum the proliferation of independently established and maintained user-owned or separate library authority file databases, and the attendant high costs that such a proliferation would bring. The widespread use of SHARAF by many libraries will reduce the resource allocation of each individual library or library network user group by eliminating the many redundancies that would occur if the files were separately developed.
- C. To prepare the way for the orderly and systematic adoption of AACR2 and the closing of LC's card catalogues in 1981, and to provide the mechanism for libraries to close their own card catalogues and to make the transition to machine-readable bibliographic records and computer-produced catalogue products and services. The cost of changing to AACR2 headings that will often be in conflict to previously issued MARC records will be minimized for SHARAF participants.
- D. To achieve maximum economy for SHARAF member libraries in their implementation of name, subject, and series authority records, and hence to minimize their ongoing maintenance costs while continuing to provide high quality catalogue records and services.

It is useful to investigate to what extent SHARAF has attained these goals over the intervening three years. The contributions of the charter members, combined with the content of the source files, provided a substantial body of authority data to which bibliographic records could be linked by SHARAF members. Those who did this benefitted from the flip of national source records to the AACR2 form in early 1981, and their COM products produced subsequently reflected this painless conversion. Authority records in SHARAF and individual user files could not be flipped so automatically, but the first member working with a record was able to make the change in form for the benefit of all other users. COM products created for linked SHARAF members have displayed a full cross-referencing structure including scope and history notes, and the tendency to have more than one file for the same author because of inconsistency in data entry has been eliminated for those who use the system fully. Some members have chosen not to link bibliographic records as yet, and for them the provision is made to allow flagging of authority records contributed by the member institution or those in the files for which a matching bibliographic item is held. This procedure will allow a member to request copies of all pertinent authority records to use in inhouse automated systems of catalogue production. During 1981, a pilot project was launched by UTLAS and the Metropolitan Toronto Library to develop and demonstrate an online catalogue with authority control. This Library Catalogue Management System project was discontinued for other reasons late in 1981, but it did operate long enough to show that the linked authority system provided the control needed to maximize successful searches in an online system.

Sometime after a library becomes a member of SHARAF, it customarily requests a database walk during which its bibliographic file is run against the authority files and all of the appropriate linkages are made. This step serves to clean up a member file and to form the basis for future consistency in record creation. As a by-product of this computer run a Headings Only Product (HOP) is produced, showing the library the linkages that have been established and, by the non-appearance of a linkage, the authority records that may still have to be created. The SHARAF member can decide to create any needed authority records immediately, create them the next time the particular heading is used, or not create them at all if there is no inconsistency and it is not considered likely that one will occur in the future (usually headings for which no cross-references are needed).

The Standards and Procedures Committee has fulfilled its mandate to achieve maximum consistency in the authority files through the creation of concise but very explicit guidelines for the creation and editing of authority records. In the early stages of the project the British Columbia Union Catalogue standards group produced a coding manual for the creation of authority records, which has been the guide for all current SHARAF activity. It is expected that this guide will be replaced eventually by an authorities coding manual created and maintained by UTLAS as part of its coding manual series, but as an interim step, the current manual plus two documents produced by the Standards and

Procedures Committee on the handling of specific problems have served to resolve most questions.

NOISE

At the time that SHARAF was founded, it was recognized that some method had to be created to inform SHARAF members about certain types of changes in source authority files where the change required some action on the part of the user. UTLAS proposed a document entitled Notification and Information on Source Entries (NOISE) that would produce alerts needed for the maintenance of online authority files. Due to delays in the loading of some source file records, NOISE has yet to be produced. However, when it appears it will probably contain five sections.

The first section will report changes by source file agencies to their records. As each cycle of source authority records is integrated, the system will produce a list of user authority sequence numbers and of record sequence numbers for bibliographic records directly linked to the revised source authority records. (A user authority record is linked to a source authority record whenever it is desired to enhance the structure of the source record.) The listing will display the old and new forms of the heading being changed and the tag number of the field in the user record that contains the same text as the changed source record. While users would normally accept without question any changes in source authority records, the display allows them to decide on a case-by-case basis if they wish. If a change should prove unacceptable, the user would have to create an authority record in its private file (which ranks higher in the validation hierarchy than source files) and relink all affected bibliographic records to the new authority record.

The second section of NOISE, also produced as cycles of source authority records are integrated, will list source records that have been dropped. The authority sequence numbers will be listed and matched with the authority and bibliographic record sequence numbers linked to them. Usually a source authority record is dropped because it duplicates another source authority record or because it is being replaced with another record. However, if there are any records linked to a source authority record being dropped, an action on the part of the user will be necessary to avoid having an authority record sequence number print in place of a heading in the next product. An investigation must be made of whether or not another suitable source record exists. If so, the linkages to the dropped record may be transferred. If no suitable alternate record is found, it will be necessary to create one in the SHARAF file and transfer the linkages to it.

NOISE part III will list source authority records now available for headings that previously had only a user authority record. The listing will show the sequence number and text of the newly integrated source authority record and then list the user codes, user sequence numbers, and tag matches in existing records. The user will have the option of either dropping his record and relinking directly to the source record or, if a large number of linkages have already been established, of linking the

user authority record to the source record. In either case, the action transfers the responsibility for maintaining the record to the national agency.

If the instructions for searching authority files are followed, the incidence of inadvertently duplicating a source record in the user files should be slight. However, part IV of NOISE will report a list of user authority sequence numbers and the text of the tag where there is a matching source record. The procedures to eliminate this duplication are the same as those for Part III.

Part V of NOISE is planned to report four types of errors in user authority records. The first will report those authority records that contain no 1XX (established heading) tag. In each case, the expectation will be that the record is completed or deleted. A second listing will be of those records in which a 1XX tag matches a 4XX (*see from* heading) in the same record. This is usually the result of clerical error and will require either correction or deletion of the offending 4XX tag. The third section of part V will report invalid linkages. The report will list user authority sequence numbers linked to deleted source or other user authority records. The report will require the user to reestablish links to valid records. The final section will report the sequence numbers of user records which contain data that could not be processed by the system. Typical examples would be tags without text or with text containing characters that could not be properly indexed. Once again the required action will be a correction of the record.

That all of this effort is worthwhile can be confirmed by those SHARAF members whose products already reflect authority control. As more libraries close card catalogues and proceed to some form of computer-produced access, it is expected that many will join the ranks of SHARAF users.

REFERENCES

1. "Shared Authority File (SHARAF) Development Agreement." As agreed at the SHARAF meeting of February 26, 1979 and as revised April 25, June 15, 1979, and April 10, 1981. 18p.
2. Library of Congress, Subject Cataloging Division, *Library of Congress Subject Headings* 8th ed. (Washington, D.C.: Govt. Print. Off., 1975).
3. National Library of Canada, *Canadian Subject Headings* (Ottawa: The Library, 1978).
4. Hennepin County Library, *Hennepin County Library Authority File* (Edina, Minn.: The Library, 1976-).
5. Université Laval, Bibliothèque, Section de l'analyse documentaire, *Répertoire de vedettes-matières* 8. éd. (Québec: le Bibliothèque, 1976).

Is the OCLC Database Too Large? A Study of the Effect of Duplicate Records in the OCLC System

Patricia Dwyer Wanninger

This paper reports on a study exploring the extent to which duplicates in the OCLC database are affecting the usefulness of the system. Searching the OCLC database is becoming increasingly time-consuming and expensive, and OCLC's search enhancements are of questionable value. Eliminating duplicates and splitting the database into separate files based on format might alleviate some of the problems caused by the great size of the database.

THE OCLC ONLINE UNION CATALOG is like a fat man with a heart condition, increasingly crippled by his bulk and bad habits. The database now contains more than eight million records, and records are being added at the rate of one million per year. This growth is encouraged by OCLC: they call the millionth records "solid gold" and encourage a childish competition among member libraries to try to "capture an OCLC gold record."¹ They have in the past year added an acquisitions subsystem that allows libraries to input misleading "order level" records that remain in the system even after full cataloging is done. (See OCLC records #8002114 and #8128527, for example.) These order level records are not to be used for cataloging, yet they interfere with searches done for cataloging and interlibrary loan. Duplicate records are present in the system in large numbers and are an acknowledged source of annoyance to searchers, catalogers, and interlibrary loan personnel.

Concerned about this situation, we at the James J. Hill Reference Library instituted a small study in March 1982 to determine the difficulty of searching the union catalog and the extent of duplication in the system. We selected 100 records from the database, using seven-digit numbers to stand for the OCLC control numbers. We then searched the database for the randomly selected record and any duplicates, using the alphabetic and numeric search keys generated by the sample record. We

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entered an average of 3.6 alphabetic searches per record. We did these searches to take the pulse of the system; we feared that duplicate records were affecting the soundness of the union catalog.

We were struck by the difficulty of searching the database. No one who searches regularly will be surprised to learn that as the database grows larger, it becomes increasingly more tedious and time-consuming to exhume a particular record. Twenty-three percent of the search keys we entered resulted in the response "[search key] produces more than 50 entries." Some searches are impossible to continue, as the search key itself calls up more than 1,500 entries. It is impossible, for example, to do an author/title search of anything by the U.S. Department of Agriculture with any title beginning with the word "soil," because *agri, soil* retrieves more than 1,500 entries. Voluminous authors like Beethoven and Shakespeare are very difficult to search in the online catalog.

OCLC recently introduced "search enhancements" which can be used to limit a search to type of record (book, serial, sound recording, etc.) and date. However, the decision to enhance a search should be made with caution. The *OCLC Technical Bulletin* explaining the search enhancements warns that "successful retrieval with 'type' and 'year' qualifiers depends on accurate fixed-field information in the bibliographic records."² A searcher is faced with a Catch-22: he or she cannot know whether a record has inaccurate data in the fixed fields until the record has been found. The "dates" fixed field is particularly subject to abuse and open to various interpretations. The "date type" determines which dates go into the fixed field, and date types "c" and "r" are set up so that bibliographically insignificant dates appear in date one, which is the date that acts as the search enhancement. Serial records, which are difficult to search because they are often only accessible by short title and corporate author, are plagued with missing and incorrect dates in the fixed fields.³

Let me illustrate the process a searcher might go through during a routine check to ascertain whether a record exists for a particular edition of *Poetical Works of Thomas Moore*. (This example is taken from one of our sample searches.) The edition was published in New York by P. J. Kennedy; unfortunately, no date appears on the work.

All the alphabetic search keys retrieve more than 50 entries; the author/title key brings up the fewest unenhanced entries (148) in a group display (figure 1). A group display is an example of the OCLC system at its least user-friendly. We first search through the six "NO DATE" entries (line 14) unsuccessfully. Despite its implications, "NO DATE" does not mean a work has no date; it means there is no date in a record's fixed fields. At this point in the search, we have two choices: we can go back to the group display and wade through all 142 remaining records, or we can enhance the search. Although we are suspicious of the search enhancements because of the uncertainty of the fixed-field date, we will try limiting the search to entries with the dates 1800 to 1850 in the fixed fields. This search retrieves a collective display of 32 records (figure 2). The records in lines 4, 6, 7, and 8 must be investigated before we finally find #5699569 (figure 3). A careful and persistent searcher will find this

MOOR, POET		
1	Books	1778-1781 3
2	Books	1800-1817 16
3	Books	1827-1840 10
4	Books	1841-1852 10
5	Books	1853-1858 12
6	Books	1859-1866 10
7	Books	1867-1873 12
8	Books	1875-1878 11
9	Books	1880-1887 16
10	Books	1888-1910 10
11	Books	1915-1957 11
12	Books	1958-1972 10
13	Books	1974-1981 10
14	Books	NO DATE 6
15	Sound Recordings	1960 1

Figure 1
Group Display

record, but it shouldn't take so long or be so hard. In any case, when there is doubt about the date, the search enhancement is not a useful refinement.

A new frustration for searchers has developed since the conversion to AACR2. In searching an author whose name has been changed, the problem of mirror images of records becomes apparent. For example, a search of the database for works by Upton Sinclair gives the impression that most of his books are cataloged in duplicate. The group display for Upton Sinclair appears to call up 988 records. Actually, because of an insignificant change of name (from Sinclair, Upton Beall to Sinclair, Upton), most of the records have both the 100 (personal name) and 870 (variant form, personal name) fields. Figure 4 shows a collective display of 28 entries. The display suggests that two records (four for line 8) exist for line numbers 2 through 11. Only one record actually exists; investigating line 2 will show that OCLC record #3366990 is the only record in the database for *Clif the Naval Cadet*. It is indexed twice because it contains both personal name fields. Lines 1, 12, and 13 retrieve records that contain the 100 field only, so they are indexed only once. These mirror records appear in an author search only, making this type of search twice as tedious, time-consuming, and expensive as it needs to be.

The great size of the database has been one of OCLC's selling points, but as De Gennaro points out, "a full-service utility cannot be built on a data base that has no standards, no quality control, and no authority control."⁴ OCLC depends on its members for quality control, through a labor-intensive process of "change requests," filed voluntarily by member libraries. Johnson and Josel report that duplicate records are the most costly form of error report for OCLC to correct. OCLC is developing a program that would identify and consolidate "several thousand"

MOOR, POET/1800-1850\
 To see title for a COLLECTIVE ENTRY, type line#, DEPRESS DISPLAY RECD, SEND.

1 Moore, Edward, The poetical works of Edward Moore ; collated with the
 best editions / London : 1806

2 Moore, John Henry, Sir, The poetical works of Sir John Henry Moore,
 Bart. : collated with the best editions / London : 1808

3 Moore, Thomas, The poetical works / Chicago ; New York : 1800

4 Moore, Thomas, Poetical works / New York : 1800

5 Moore, Thomas, The poetical works / Philadelphia : 1830

6 Moore, Thomas, The poetical works N.Y., 1846

7 MOORE THOMAS POETICAL WORKS OF THE LATE THOMAS LITTLE (7)

8 MOORE THOMAS POETICAL WORKS OF THOMAS MOORE (5)

9 MOORE THOMAS POETICAL WORKS OF THOMAS MOORE (13)

10 Moore, Thomas, 1779-1852. The poetical works of Thomas Moore :
 including his melodies, ballads, etc., complete in one volume. Philadelphia :
 1833

Figure 2
 Collective Display

0CLC: 5699569 Rec stat: n Entrd: 791115 USED: 791115
Type: a Bib lvl: m Govt pub: Lang: eng Source: d Illus: a
Repr: Enc lvl: I Conf pub: 0 Ctry: nyu Dat tp: n M/F/B: 10d
Indx: 0 Mod rec: Festschr: 0 Cont:
Desc: i Int lvl: Dates: 1800,
1 010
2 040 MNT c MNT
3 045 v7w5
4 090 PR5050 b .E00a
5 090 b
6 049 MNRA
7 100 10 Moore, Thomas, d 1779-1852.
8 245 14 The poetical works of Thomas Moore / c with explanatory notes,
etc. ; Complete in one volume.
9 260 0 New York : b P. J. Kenedy, c [18--]
10 300 698 p., [6] leaves of plates : b ill. ; c 20 cm.
11 600 10 Moore, Thomas, d 1779-1852.

Figure 3
Bibliographic Record

To see title for a COLLECTIVE ENTRY, type line#, DEPRESS DISPLAY RECD, SEND.

- | | | |
|----|------------------|---|
| 1 | Sinclair, Upton, | Back to Annapolis, or, Lively times at home for |
| | Faraday / | New York : 1898 |
| 2 | SINCLAIR UPTON | CLIF THE NAVAL CADET OR EXCITING DAYS AT ANNAPOLIS (2) |
| 3 | SINCLAIR UPTON | JOURNAL OF ARTHUR STIRLING THE VALLEY OF THE SHADOW (2) |
| 4 | SINCLAIR UPTON | KING MIDAS A ROMANCE (2) |
| 5 | SINCLAIR UPTON | MANASSAS A NOVEL OF THE WAR (2) |
| 6 | SINCLAIR UPTON | OFF FOR WEST POINT OR MARK MALLORYS STRUGGLE (2) |
| 7 | SINCLAIR UPTON | PENEZOMENCI THE MONEY CHANGERS (2) |
| 8 | SINCLAIR UPTON | PRINCE HAGEN (4) |
| 9 | SINCLAIR UPTON | SPRINGTIME AND HARVEST A ROMANCE (2) |
| 10 | SINCLAIR UPTON | UPTON SINCLAIRS ATTITUDE ON CHRISTIANITY (2) |
| 11 | SINCLAIR UPTON | WEST POINT TREASURE OR MARK MALLORYS STRANGE FIND (2) |
| 12 | SINCLAIR UPTON | BEALL (3) |
| 13 | SINCLAIR UPTON | BEALL T (2) |

Figure 4
Collective Display

pairs of duplicate records, so they are currently acting on only a few duplicate records reported.⁵ OCLC now uses a program called Master Data Base Update, which compares new MARC records to existing records in the database and eliminates duplicates.⁶ Member libraries must depend on their own manual searching abilities to avoid inputting duplicate records, but an improved search algorithm, developed by Thomas Hickey and David Rypka, would operate online. The algorithm would identify duplicates that the current program misses, such as variations in the form of the publisher's name or in the style of pagination.⁷

Hickey and Rypka determined that "the percentage of monographic records that are duplicates and should be eliminated in the OCLC Online Union Catalog is 7 percent to 9 percent. To the user, the apparent rate is double this, since this is the percentage of records that could be eliminated without loss from the Online Union Catalog, and each of these records has a corresponding record that will remain. The percentage of records that have a duplicate is roughly twice the number that could be eliminated, 14 percent to 18 percent."⁸ In our sample of 100 records, we found 17 that were duplicated and a total of 40 duplicate records. In other words, 19 percent of the records we investigated are surplus; a single bibliographic item is represented by two, three, or more records. Hickey and Rypka's 1979 estimate of 7 to 9 percent duplication might be low; our estimate of 19 percent high, but it is not unreasonable to estimate that the number of duplicate records in the database is approaching the million mark. These extra records are putting a great strain on the system as evidenced by the ever increasing difficulty in searching and decreasing response time and in costs for staff time for libraries using the system. OCLC is also incurring extra costs, both for storage of these unnecessary records and for computer power required to search these duplicates.

It is difficult to tell just why member libraries input duplicate records. Careless searching, difficulty in searching, desire to input the "perfect" record, difficulty in editing and updating, desire to escape first-time use charges; all of these might be reasons for the existence of duplicate records. It will be difficult to eliminate duplicate records from the database entirely. It is probably better for the machine to miss pairs of duplicates than to mismatch records for separate bibliographic items. If non-LC records are to be consolidated, who will decide which records will remain in the database and which will be deleted? Will any cataloging variations be consolidated into the remaining record? The machine will not be able to make these decisions; computers, after all, are "exquisitely stupid."⁹ The very question of what actually constitutes a duplicate record will always spark a lively debate.

We believe it is bad practice to input a new record when the only variation in description is an insignificant copyright or printing date. The Library of Congress has decided that a new copyright date is not enough evidence to constitute a new edition, and they have chosen not to reproduce these "insignificant and misleading copyright dates, but only those that are known to indicate a new edition (because of other evidence)."¹⁰

Another practice that adds needless duplication in the database is the

directive to code photographic and microfilm reproductions date type "r."¹¹ These photocopies and microfilms are produced on demand by such depositories as University Microfilms International (UMI) and National Technical Information Service (NTIS). Coding these items "r" forces one to put the bibliographically insignificant date of the reproduction in date one, which is the date that will serve as the search enhancement. The date of the original is shunted to date two.

This practice is apparently based on AACR2 rule 11, which calls for description of the facsimile, with details on the original in a note. The Library of Congress is currently "interpreting" this rule to mean exactly the opposite, perhaps because they recognize the folly inherent in inputting a new record each year an item is requested from a depository like UMI or NTIS. Surely one record in the database for the original thesis or monograph is sufficient or two records if one is a paper copy and the other a microform.

Coding these records "r" has the additional disadvantage of scattering records for the same bibliographic original throughout a search. Two records for the paper photocopy of *The Code of Hammurabi, King of Babylon*, edited by Robert Francis Harper, 1904 edition, appear in the database, both date type "r"; one has 1904, 1979 in dates one and two, the other has 1981, 1904 in the dates field. 1904 and 1981 are the dates that act as the search enhancement. A searcher also must distinguish between the record for the microfilm (dates 1979, 1904) and three records for the 1904 original. This duplication is unnecessary and could be eased by putting the date of the original in date one, and adjusting the date of reproduction locally.

Eighty-four percent of the records in our sample were for monographs. This compares well with Dennis Reynolds' estimate of 85 percent in the entire database.¹² We suggest that splitting the database into separate files based on type of format would ease the problem of unwieldy size and poor response time. Serial records (12 percent of our sample) are more difficult to search than monographs. Dividing the Online Union Catalog into separate files based on format would make the whole catalog more accessible. Serials, scores, sound recordings, and audiovisual materials would be easier to find in smaller files, and the monographic file would be smaller by more than a million records. Each file could be accessed by a presearch code, as the equal sign is currently used for a corporate author search. The relatively few records that could arguably be cataloged on two formats (most likely monograph or serial) would have to be handled by more stringent input guidelines than presently exist, or some duplication would have to be tolerated.

OCLC should expand the alphabetic search keys. The keys are too short to sift through the massive database, and depending on the post-search enhancements is risky.

Responding to criticisms that OCLC is out of touch with its constituent libraries, President Rowland Brown said OCLC "continues to exercise leadership in preparing libraries for the technological opportunities of the 80's."¹³ OCLC's biggest success to date has been its national union catalog. We hope every opportunity, technological or otherwise, will

be seized to keep the Online Union Catalog a healthy, useful tool. But mere technology is not enough; it seems inevitable that at some point it will become necessary for OCLC to provide human intervention in eliminating the duplicates from the database. This will be costly. However, we are all already paying the price.

REFERENCES

1. "ILLINET—Network of Champions," *OCLC Newsletter* 139:2 (Jan. 1982).
2. "Search/Retrieval Enhancements," *OCLC Technical Bulletin* 95:9 (Aug. 29, 1980).
3. Michael Roughton, "OCLC Serial Records: Errors, Omissions, and Dependability," *Journal of Academic Librarianship* 5:321 (Jan. 1980).
4. Richard De Gennaro, "Libraries and Networks in Transition; Problems and Prospects for the 1980's," *Library Journal* 106:1046 (May 15, 1981).
5. Judith J. Johnson and Clair S. Josel, "Quality Control and the OCLC Database," *Library Resources & Technical Services* 25:44-45 (Jan./Mar. 1981).
6. Thomas B. Hickey and David J. Rypka, "Automatic Detection of Duplicate Monographic Records," *Journal of Library Automation* 12:128 (June 1979).
7. *Ibid.*, p.135.
8. *Ibid.*, p.141.
9. Gene A. Streitmatter, *Microprocessor Software: Programming Concepts and Techniques* (Reston, Va.: Reston Publishing Co., 1981), p.12.
10. Memo from MINITEX, regarding Jan. 14, 1981 memo from Ben Tucker of LC, to the ALA Committee on Cataloging: Description and Access.
11. Julia C. Blixrud, *MINITEX/OCLC User Documentation* (Minneapolis, Minn.: MINITEX/OCLC Office, 1981), Cataloging subsystem, section on fixed fields, p. 4.
12. Dennis Reynolds, "Characteristics of the OCLC Database," *Action for Libraries* 7:6 (April 1982).
13. "OCLC is not a 'Dinosaur', but Will Set the Pace," *Library Journal* 107:493 (March 1, 1982).

An Archive Tape Processing System for the Triangle Research Libraries Network

Jeanne Sawyer

The archive tape processing system described in this article is designed to process tapes received through the OCLC-MARC Subscription Service, thereby constructing and maintaining a master database of bibliographic records for the libraries of each of the three participating institutions: Duke University, North Carolina State University at Raleigh, and the University of North Carolina at Chapel Hill. The problems addressed by the Triangle Research Libraries Network tape processing system and the manner in which they were resolved are discussed.

TO USE OCLC ARCHIVE TAPES as a source of machine-readable bibliographic records for an individual library, the records must first be processed to form a master database, which represents the holdings of one of the participating libraries. The solutions to the problems inherent in this procedure that have been devised by the Triangle Research Libraries Network (TRLN) are described in this article.

The research libraries at North Carolina State University at Raleigh, Duke University in Durham, and the University of North Carolina at Chapel Hill, through close coordination of selection policies and direct borrowing privileges for the patrons of all three institutions, have made the collections of the three libraries a single resource. An online catalog seemed a desirable method of providing timely access to this resource.

Funding to develop an online catalog network was obtained in 1979 in the form of a two-year grant for \$554,000 under Title II-C of the Higher Education Act. The plan for the network called for a computer located in each library to support the online catalog for that library. These catalogs would be operated in a distributed network of the compatible computers so that users at any of the three libraries would be able to consult any of the three catalogs. If desired, the network could later be expanded to include other libraries in the area or could be replicated in other areas.

The first step toward the online network was the joint development of the archive tape processing system. Since the online network would be

distributed, separate master databases were required, each representing the holdings of one of the participating libraries. However, the same tape processing system would create all three databases. *TRLN* philosophy requires that the individual policies and practices of the three libraries be accommodated by the system. The libraries attempt to adopt uniform practices to the extent possible, but the individual library has the ultimate right to determine when it can accept a uniform policy and when a local policy is necessary. The archive tape processing system was developed to allow this flexibility. In fact, however, very few areas of conflicting policies were found.

USING OCLC ARCHIVE TAPES

Before they can be used by a local library, the machine-readable cataloging records on the archive tapes must first be processed to change the collection of archive records into a local master database. Although the basic concept of what is required is quite simple, large research libraries must solve several problems with using the *OCLC* system in the manner expected by *OCLC*, i.e., the most recently created archive record becomes the new local master record for an item, completely replacing any previously existing local master record. Since the archive records appear on the archive tape in order of creation, recognizing new master records and replacing old master records with updated versions are very straightforward and are the primary tasks any archive tape processing system must accomplish. The *TRLN* system addresses several problems caused by creating local master records in this way. These include the need for a method of allowing multiple copies of records in the local database under certain circumstances, the problems of finding errors in the records, and the difficulties of making corrections and changes to existing local records. Although not directly related to the task of creating machine-readable master databases, the *TRLN* Archive Tape Processing System also addresses the possibilities for collecting cataloging-activity and collection-size statistics automatically.

The *TRLN* Archive Tape Processing System is a batch system, using *OCLC* archive tapes and the existing master database as input and producing an updated master database of bibliographic records as the primary output. A variety of printed reports, mainly of exceptions and statistics, is also produced.

Archive tapes containing approximately 13,500 records are received every four weeks for the three libraries. Of these, approximately 18 percent represent updates to previously existing records. The local master databases include a total of 59,500 records for Duke, 278,225 records for North Carolina State University, and 183,900 records for the University of North Carolina at Chapel Hill. (Duke joined *OCLC* recently and North Carolina State University has been engaged in an extensive project to convert existing records to machine-readable form.)

Design of the tape processing system began with several constraints already present. (1) The libraries were committed to continuing their membership in *OCLC* or another bibliographic utility. Specifically, since the archive tapes are received from *OCLC*, the local system had to

deal with OCLC system characteristics; (2) local master records had to be maintained in accordance with national standards for bibliographic records, i. e., it was necessary to maintain the full MARC record with all formats (monographs, serials, maps, sound recordings, etc.) included; (3) maintaining a separate master database for each of the TRLN libraries was required.

Four specific problems addressed by the TRLN system and the ways in which they were resolved are discussed below.

NEED FOR MULTIPLE RECORDS

THE PROBLEM

There are two situations where a library might require multiple records that are not accommodated by the usual methods of handling archive records. The first is caused by the OCLC system assumption that all holding libraries within an institution are able to use exactly the same bibliographic data and that holdings statements for the entire institution can be constructed. It is neither possible nor desirable for separate, specialized collections within an institution, such as rare book collections, to have to conform to the needs of the main collection in complex research libraries. Separate shelflists, created independently of each other and of the main library, may be maintained by such special collections. Holdings of these collections may not be reflected in other shelflists in the institution; therefore, as a practical matter, holdings statements for the entire institution cannot be constructed. This is the situation at the University of North Carolina at Chapel Hill.

Although this may not be an ideal situation in an automated environment where the computer could selectively retrieve records for a given collection, if separate card shelflists have traditionally been maintained, it is generally not practical to combine them retrospectively. Special collections also have special requirements for bibliographic data, e.g., more detailed information about an item than is generally required, or specialized subject headings may be needed. Logically, each such independent collection, or cataloging center, maintains all of its own bibliographic records, regardless of whether or not other cataloging centers also have records for any of the same items.

The other situation where multiple records may be required is a result of differing definitions of the criteria for distinguishing separate bibliographic entities. OCLC has established standards as to the conditions that justify creating separate records for two items in its database. For example, British and American editions of a work justify separate records, but reprintings of the same edition do not. Creation of OCLC master records must conform to these standards. However, special collections sometimes need finer distinctions than the OCLC standards allow. Thus, for example, although different printings of the same edition do not ordinarily require separate records, if the different printings were of an original edition of a significant work, such as a Dickens novel, then separate records would be justified for a rare book collection. In this case, multiple versions of a record within a cataloging center are re-

quired. These are called multi-use records. From the local library point of view, multi-use records are entirely different records, representing related but not identical titles.

THE SOLUTION

The archive tape processing system handles the problem of different requirements within an institution by maintaining physically separate local master records for each cataloging center or separately administered library. It did not seem productive in a batch-mode system using magnetic tape storage to attempt to eliminate data redundancy by merging records where so many differences would still have to be maintained. Similarly, complete, separate multi-use records are maintained where a cataloging center has determined the need for fine distinctions among records.

The tape processing system automatically sets a cataloging center code as part of the record identification key based on the holding library code. These codes, assigned by OCLC, are already entered in the record for other purposes, i.e., to indicate precise locations of items and to order cards for the appropriate catalogs. Thus, cataloging staff are not required to input special codes to signal to the tape processing system that complementary records for different cataloging centers should be created. However, an additional transaction code is necessary to allow a cataloging center to delete its record from the local master database.

Unlike complementary records for different cataloging centers, the system cannot determine automatically when multi-use records should be maintained. Therefore, an explicit multi-use number is necessary to indicate that an incoming record is a new multi-use record rather than an update of an already existing local master record. Multi-use numbers are assigned sequentially with a separate sequence for each cataloging center's group of multi-use records. The first version of a record has an implicit multi-use number. When a second version of a record is required, the next multi-use number must be explicitly entered. Thus, for the majority of records, which are the first version of a record, no special action is required from cataloging staff.

DETECTING ERRORS

THE PROBLEM

Although proofreading is the only method for detecting errors in the actual data, automated methods can be used to detect some tagging and coding errors. Without automated validation, such as can be provided by an archive tape processing system, it is impossible to detect errors in the nonprinting portions of the record. Although OCLC does some validation of tags, no consistency checks are made.

Adequate error detection and correction are especially significant because the problems in records stem not only from ordinary mistakes but also from changes in the MARC format over the years. For example, many fields now require filing indicators to show the number of characters to be disregarded in sorting, as for initial articles. Since these indica-

tors formerly were not allowed, older records do not contain them. It is necessary to correct out-of-date records so that the entire database is brought up to current standards.

THE SOLUTION

The archive tape processing system includes extensive validation routines to check for errors in the catalog records. Of course, errors in the noncoded cataloging data cannot be detected automatically, but codes that are not filled in at all and inconsistencies in tagging can usually be detected by the system.

The archive tape processing system detects two types of errors that can be identified but not corrected automatically: (1) *processing errors* that prevent the system from determining the appropriate action to take with a specific archive record and (2) *logic errors* in the cataloging data that should be brought to the attention of cataloging staff but that do not prevent proper processing of the record. There are two types of logic errors: *bibliographic errors* and *warnings*.

Processing Errors. Processing errors are caused either by OCLC or local transaction code errors or by problems with the record key (which consists of the OCLC number, cataloging center code, and multi-use number). They include such problems as attempting to cancel a record that does not exist in the master file or using an invalid multi-use number. Generally, records with processing errors must be corrected by re-editing the OCLC master record. Under TRLN procedures, cataloging staff are notified of the occurrence of processing errors through printed exception reports.

Logic Errors. Logic errors are grouped into two categories according to the severity of the error. The more severe category, called "bibliographic errors," consists of such errors as the omission of the title or call number. Records that have bibliographic errors are added to the local master databases because the system must be able to process subsequent archive records, but are flagged since the error is so severe as to render the record useless to library users. These records are not printed in COM catalogs or other listings. Cataloging staff are notified by exception reports; their correction must always be made through OCLC.

The second category of logic error is not severe enough to prevent use of the record. Therefore, this category causes "warnings" to be generated in the exception reports, although the record is added to the master databases and is used in all products derived from the master databases. Warnings are caused by such inconsistencies and errors as leaving coded information blank or indicating multiple dates while supplying only a single date. Records that cause warnings must also be corrected by re-editing the OCLC master record.

CHANGING AND CORRECTING RECORDS

THE PROBLEM

Since the OCLC system always copies the entire record onto the archive tape, updating the master requires completely replacing the rec-

ord. All changes to records, no matter how minor, necessitate the recreation of the entire record, including both the bibliographic data and the holdings information. Whenever a record must be corrected, the same process that created the original local record must be repeated.

OCLC does not retain the local form of the record online, so reconstructing the local version of the data is difficult and time-consuming. The bibliographic record that appears printed on catalog cards does not include all of the data that must be included in the local machine-readable record. Thus the cataloger cannot see the complete record as it was originally created and must attempt to reconstruct the information from the partial information that is on the card and from memory. Data not printed on the cards include information in highly coded form, e.g., the language and country of publication, and coded cataloging information such as whether a name is personal or corporate or whether an initial article is present in a title. These data are not important for maintaining a card catalog but are vital for an accurate catalog in an automated environment. Generally the item represented by the record is no longer in hand and the complete original local record cannot be read, so the reconstruction involves some guesswork. Trained catalogers are required to correct even minor typographical errors. In addition to the time required to reconstruct the cataloging data, large amounts of staff time are required to key changes and rekey local variations to the OCLC record. As a result, it is virtually impossible for a large library to have all desired or needed changes reflected in a local database by using the OCLC system. In many cases, the changes are made manually in the card files but are simply never made in the machine-readable files.

THE SOLUTION

The optimal method for maintaining local records would be an editing system that would allow cataloging staff to examine local master records and make changes in an online environment. The TRLN libraries anticipate developing such a system, but it was decided that a simpler system that could be used immediately would also be worthwhile. Therefore, a system of local transaction codes was developed to allow holdings data to be treated separately from bibliographic data.

The system developed requires that each type of data be considered in its entirety, e.g., if a change to any bibliographic data element is required, all bibliographic fields must be edited again. It was decided not to develop a system of transaction codes that would allow editing of specific fields since such a system operating in batch mode would be extremely complex. Since the online system for editing local records will ultimately eliminate the need for the transaction code system, the goal of the transaction code system is merely to provide some relief to cataloging staff responsible for maintaining the databases as promptly but inexpensively as possible.

The system works as follows. Mnemonic codes are entered by the cataloger into one of the local use fields when a record in the OCLC system is being edited. The local codes are interpreted by the archive tape processing system to produce a specific action. They are used only when

changing a record that already exists in the local master database. For a specific record, if only the bibliographic data should be replaced, a prescribed transaction code must occur in the archive record. If only the holdings data should be replaced, a different transaction code must occur. Use of these codes is optional since records can continue to be completely re-edited. If the entire archive record, including both holdings and bibliographic data, either should be added to the master database or should entirely replace an existing record, no transaction code is necessary.

In addition to easing the difficulties of correcting errors manually, the tape processing system automatically attempts to correct individual records where the appropriate correction can be determined with reasonable certainty. In most cases, for example, the system supplies missing filing indicators. These indicators are supplied in accordance with a language code that also appears in the record by using a table of language codes, initial articles, and the associated filing indicators. Since the language code does not always match the actual languages in the fields, all records with automatically supplied filing indicators are printed for manual review of the indicators. For example, an analysis in English of *Les Misérables* could simply be titled *Les Misérables*. However, since the text is in English, the record would be coded as English. In this case, since "Les" is not an initial article in English, the system would incorrectly supply zero as the filing indicator.

COLLECTING STATISTICS

THE PROBLEM

A wide variety of statistics is collected in a large library to monitor collection growth and cataloging activity. Statistics of collection growth in the TRLN libraries include the number of titles and physical volumes in each library and each departmental library and indicate if the copy is new to the institution as a whole, new to the department, or an additional copy at a location. Separate totals are maintained by type of material. Cataloging-activity statistics report the source of cataloging copy, the type of cataloging being done (new items, recataloging, or transferring items from one location to another, etc.), and the production and type of cataloging done by individual catalogers.

The effort to collect these statistics manually is tedious and cumbersome, and the data are probably inaccurate. Incoming archive records, when compared to previously existing local master records, include most of the data necessary to produce these statistics. Thus, an archive tape processing system can logically address the problem of compiling statistics.

THE SOLUTION

Collection-size and cataloging-activity statistics are compiled from data about the item cataloged or recataloged and its relationship to the existing collections. The counts that should be increased and the amount of the increment are determined by comparing the holdings in the ar-

chive record with any previously existing record for the item. Cataloging staff must provide information about the nature of the cataloging transaction.

The indicators associated with the holdings data field have been designated by OCLC as available for local use, and, since this field is the basis for gathering statistics, these indicators are appropriate to use for providing the necessary relationship information.

The archive tape processing system will compare the holdings statement of the incoming archive record with the holdings statement in the previously existing master record, if necessary, and increase the appropriate totals on the basis of the comparison and the indicator values. For example, when a new record is added to the master database with no special indicators, the number of new titles will be increased by one. If another copy is added, the holdings statement in the new archive record will show both copies, but comparison of the holdings statements of the new archive record and the old master record will indicate that one copy was already counted and that the total for added copies should be increased by one. (Note: Although functional requirements for the statistical reporting module of the archive tape processing system are complete, the module has not yet been implemented.)

CONCLUSION

The TRLN libraries have made substantial progress toward effectively using computers to share bibliographic information, maintain catalog records that represent the holdings of each library in the network, and selectively retrieve bibliographic records in response to individual queries. By using the OCLC Cataloging System, the libraries share bibliographic data and create local catalog records in machine-readable form. The TRLN Archive Tape Processing System accomplishes its primary goal of building and maintaining master databases of bibliographic records for the TRLN libraries as well as the secondary goals of alleviating some of the difficulties with using the OCLC system. As long as local machine-readable cataloging records are received through the OCLC-MARC subscription service, the TRLN Archive Tape Processing System will remain a reasonable approach to creating and maintaining local master databases. It is hoped that in the future direct transmission of records from OCLC to the local computer will make the archive tape processing system obsolete.

Cataloging Loose-Leaf Publications

Byron Cooper

Current practices in the cataloging of loose-leaf publications have created numerous problems for both librarians and users. Many of these problems result from the effort to fit loose-leaf publications into a monographic cataloging format. It is argued that library needs demand, and AACR2 perhaps permits, the treatment of several types of loose-leaf publications as serials.

MANY PUBLICATIONS appear in loose-leaf binders. Often this format is preferred for economic reasons over a stitched or glued binding for a simple monograph and offers no cataloging challenge. But the treatment of loose-leaf publications designed to be updated is one of the more intractable problems of descriptive cataloging. The conceptual approach to loose-leaf publications is a theoretical question with serious practical consequences.

Every year more loose-leaf works are published with accompanying updating services. Since this format is expensive, loose-leaf services have generally been available in the past only for subjects of interest both to academia and to large, affluent professions, notably law, business, and medicine. Rapid changes, especially those brought about by technological developments, have led to the growing use of the updated loose-leaf format in many areas, including library cataloging itself.

CATALOGING QUESTIONS

Many of the problems of cataloging a loose-leaf publication will be apparent even to those who have never seen such a work. When it is updated, it gets new pages. The old pages may be superseded and discarded, or the new pages may simply be added to the end of the work. If the present binders become too crowded, new binders are added and old binders replaced. A new title page may be among the new pages provided every year or more frequently. A change in the title, the statement of responsibility, the edition, the place of publication, and the name of the publisher may create a "new manifestation" of the item.¹ Certainly the text of the work and the date in the chief source of information will

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have changed. Furthermore, one "loose-leaf service" can consist of a variety of publications. A periodical, a monographic series, several non-periodical serial sets, and as many as fifteen loose-leaf volumes, each performing a different function, may all be sent to those subscribing to the service.

THE DEFINITION OF LOOSE-LEAF PUBLICATION

The second edition of the *Anglo-American Cataloguing Rules* (AACR2) refers to "all loose-leaf publications that are designed to receive additions," but offers no further definition of *loose-leaf publication*.² This term, like many others in descriptive cataloging, is difficult to define. The binder itself distinguishes the loose-leaf publication from most monographs. Many loose-leaf publications, however, are published in pamphlets usually filed at the end of the previously published pamphlets. They become almost indistinguishable from a periodical for which the publisher supplies a storage binder.

At least three characteristics, however, seem to be found among those works commonly called loose-leaf publications. First, such works are published in pages or pamphlets that are filed in a binder, usually supplied before or at the same time as the pages or pamphlets. Second, the set is updated with pages or pamphlets that replace or add to the previous material. Third, the set as a whole is integrated, at least by a digest system or an index that is supplied or cumulated nearly as often as updating pages or pamphlets are provided. The essence of a loose-leaf publication is the integration of the updates with the previously published material.

TYPES OF LOOSE-LEAF PUBLICATIONS

Loose-leaf publications can be divided into three types: sequential, interpaginated, and mixed. Sequential loose-leaf publications are those in which new material, except for the index, is added by pages or pamphlets filed at the end of the existing material. These publications cause few problems and are routinely handled by the Library of Congress and most other libraries as serials.

Interpaginated loose-leaf publications are those in which the new pages or pamphlets are interfiled within the existing work, sometimes superseding the existing material, sometimes adding to it. Of these there are also two types: (1) those intended to be continued indefinitely (or at least until the need for revision is so substantial as to warrant reissuing the basic volumes) and (2) those that are superseded at regular intervals. In something of a paradox, as explained below, those intended to be continued indefinitely are treated by the Library of Congress as monographs, and those regularly superseded are treated as serials.

Mixed publications are those in which part of the loose-leaf service or treatise is filed sequentially and part is interpaginated. If the only part that is interpaginated is the index or digest, then there seems to be no problem with regarding the whole as a "serial" under current practice. If more than the index or digest is interpaginated, then the Library of Congress tends to regard the whole as an interpaginated monograph. If

each part has its own title or subtitle, then each part can be given a bibliographic record appropriate to its type.

THE CONSEQUENCES OF CURRENT PRACTICES

The fundamental problem in the descriptive cataloging of loose-leaf publications of the interpaginated and mixed types has been the attempt to force them into formats established for monographs. The consequences of forcing an infinitely changing work into a format designed for a fixed, finite entity have been felt by both patrons and librarians.

Cataloging records for loose-leaf publications frequently mislead patrons looking for a particular "edition" of a loose-leaf service or treatise. Interlibrary loan requests are sent for loose-leaf works that no longer exist in any library, because the works have been updated with new title pages. The treatment of loose-leaf publications has failed dramatically to meet one of Cutter's objectives for cataloging records, which is to assist in the choice of a book as to its edition.³

Cataloging loose-leaf publications as monographs consumes inordinate amounts of staff time in constant revision of volume numbers, dates, and other information on cataloging records. Complete sets often must be recataloged and relabeled because of changes in title pages. The key figure in this process becomes the serials check-in clerk, who must be sufficiently aware of cataloging rules and practices to recognize significant changes, but not so sensitive that the catalogers are flooded with every update to a loose-leaf service or treatise. The chief purpose of such a work is severely undermined if the updates are backlogged in the cataloging department.

Updates for a loose-leaf service cataloged as a monograph usually cannot be controlled through an automated serials control system that is dependent upon a cataloging system, unless a separate serials cataloging record is constructed for the updates. To construct such a record is the philosophy of *OCLC Technical Bulletin* 104.⁴ But the guidelines in this bulletin do not directly answer the problem of what to do with updates that do not have their own titles distinct from the works in which they are interfiled. Furthermore, it is troubling to find separate cataloging records for both the basic service and the updates, neither of which has any fixed reality. The updates cease to exist as an entity when they are filed, and the service as a whole is nothing more than the sum of the updates.

According to its stated policy, *New Serial Titles (NST)* does not include loose-leaf publications.⁵ In fact, a large number of interpaginated loose-leaf works are included.⁶ But because the Library of Congress and *NST* guidelines exclude loose-leaf publications from serials treatment, other union listings of serials routinely omit them as well. The continuing costs of most loose-leaf publications are very high, and it is unfortunate that current practices are inhibiting interlibrary control and sharing of loose-leaf resources.

The International Standard Serial Number (ISSN) has proved very useful in controlling and identifying serial publications. Through cooperation between the Library of Congress and the U.S. Postal Service (USPS), the latter has adopted the ISSN as the preferred method of serial identification. The National Serials Data Program (NSDP) rou-

tinely assigns an ISSN to a sequential loose-leaf work or to the updates of an interpaginated one if the updates have a title different from that of the publication as a whole. Otherwise, the NSDP is reluctant to create a registry entry and no ISSN is assigned. The publisher must then use the USPS number assigned by the post office, and the latter number is nearly useless for control and automated searching and check-in procedures.

SERIAL OR MONOGRAPH?

Librarians' conception of what constitutes a "serial" unfortunately became fixed before loose-leaf services were widely used. The first loose-leaf services in law were not developed until 1907.⁷ Business services were developed at the same time. Oxford University Press claims to have developed the first medical loose-leaf service in 1920.⁸

On the other hand, by 1904 Cutter had already defined a serial as a "publication issued in successive parts, usually at regular intervals, and continued indefinitely."⁹ Cutter need not have defined *serial* as he did. He clearly formulated a definition based not on ordinary usage or lexical considerations but on the usefulness of the definition to librarians. This definition has, however, been strictly construed. Functional utility has been disregarded. After all, the purpose of special rules to describe serials was not to suggest the need for considerable shelf space but to create a format capable of describing something incomplete that is undergoing frequent change.

Cutter's definition was essentially retained in the 1908 and 1941 cataloging rules. By 1941 the Library of Congress had in practice already begun to describe interpaginated loose-leaf publications as monographs. There was some inconsistency in the treatment of individual items in the description, but the monographic format was often employed. This practice was codified in the 1949 *Rules for Descriptive Cataloging in the Library of Congress*, which was adopted by the American Library Association. Specific rules for describing loose-leaf publications were included in the chapter on "separately published monographs."¹⁰ The inclusion of loose-leaf rules in the chapter for monographs was continued in AACR1, in the revision of chapter 6, and in AACR2.¹¹ The definition gradually evolved so that it now states that a serial is a "publication in any medium issued in successive parts bearing numerical or chronological designations and intended to be continued indefinitely."¹²

Actually it has never been clear why the traditional definition cannot apply to interpaginated loose-leaf publications. They are *issued* in successive parts, even if they are not filed or bound successively. At the time they are issued, they almost invariably bear both chronological designations and numerical designations (Release 219, Release 220, etc.), even though these designations may be lost at the time of filing. But many loose-leaf services do retain such designations, and in fact the standard legal citation format in some cases requires citation by the date on the cited page, if there is one.¹³

In addition, the application of the principle that a loose-leaf publication be intended to be continued indefinitely in order to be considered a serial has been somewhat paradoxical. In Library of Congress practice,

serial treatment has been denied to a loose-leaf publication that may perhaps be superseded by a new edition at some undetermined and uncertain future time. If the present binders become too full or if new developments warrant, the publisher may prefer to reissue the entire set rather than try to update each page of the existing set. Otherwise the publisher will continue merely to update the current set indefinitely. In fact, many loose-leaf works have never been reissued since they were first begun, some of them more than forty years ago. This kind of publication has been regarded as failing to meet the criterion of indefinite continuation. If, on the other hand, the publisher does decide to supersede the current sets at regular fixed times, then they are "intended to be continued indefinitely" and become serials, as in the cases of the *Congressional Index* and the *Standard Federal Tax Reporter*.

A case can be made, however, that AACR2 requires interpaginated loose-leaf publications to be treated as serials. The rules in themselves may indicate that the editors of AACR2 consider "all loose-leaf publications that are designed to receive additions" as monographs since a rule for their description is given in chapter 2. All such publications are to be described as "1 v. (loose-leaf), 2 v. (loose-leaf), etc."¹⁴ No exception is stated for open-volume descriptions of sequential loose-leaf publications. A literal application of this rule to all loose-leaf publications would require librarians to state and then constantly revise the number of volumes for both sequential and interpaginated loose-leaf works. But the reason for the absence of any exception is apparent. There is no need to make an exception for loose-leaf serials in the chapter on monographs. So it must first be determined from the definitions that a loose-leaf publication is a monograph before the cataloger turns to chapter 2.

From the definitions in AACR2, it appears that a significant change has occurred. In AACR1, a monograph was defined as a "work, collection, or other writing that is not a serial."¹⁵ AACR2, however, has defined a monograph as a "nonserial item, i.e., an item either complete in one part or complete, or intended to be completed, in a finite number of separate parts."¹⁶ This definition clearly excludes interpaginated loose-leaf publications. Nothing is finite or complete about the number of parts of a loose-leaf publication. The number of pages, the number of volumes, the binders, the title pages, text, and indexes change constantly. The parts of an interpaginated loose-leaf publication are not separate but interwoven. AACR2's elucidation of what constitutes a monograph strongly suggests that an interpaginated loose-leaf publication should be regarded as a serial. Chapter 2 is to be used only for monographs that are published in loose-leaf binders to facilitate storage of any additional, separate, finite monographs related to the original.

Functionally, loose-leaf publications have always been treated as serials for acquisitions, for check-in procedures, and for accounting and budgeting records.¹⁷ It is only for cataloging purposes that they have been regarded as monographs.

Handling interpaginated loose-leaf publications as serials would facilitate the establishment of automated check-in records. It would improve control through union listings and the routine assignment of ISSNs. In the cataloging record itself, the serials format would give greater promi-

nence to chronological designations and would enable catalogers to take advantage of the opportunities offered by the serials format to avoid some of the frequent changes now required.

CONCLUSION

Loose-leaf publication is a superb format for a serial. Viewed functionally, it is in fact nothing more than a highly developed form of serial that allows augmentation by subject rather than in simple chronological sequence. The utility of such a format is very great, but has been limited in important respects by the cataloging treatment accorded to it.

The best interests of patrons and librarians would be served by treating the updated loose-leaf publication as a serial. Such treatment would foster standardization, interlibrary cooperation, and perhaps substantial economies in library operations. Merely recognizing the serial nature of an interpaginated loose-leaf publication does not solve all of the problems, but it is a necessary first step.

REFERENCES

1. For "new manifestation," see "Library of Congress Rule Interpretations," *Cataloging Service Bulletin* 12:3 (Spring 1981).
2. *Anglo-American Cataloguing Rules*, 2d ed., ed. Michael Gorman and Paul W. Winkler (Chicago: American Library Assn., 1978), p.65.
3. Charles A. Cutter, *Rules for a Printed Dictionary Catalog* (Washington, D.C.: Govt. Print. Off., 1876), p.10.
4. OCLC, Inc., *OCLC Technical Bulletin*, no.104 (March 31, 1981).
5. *New Serial Titles: A Union List of Serials Commencing Publication after December 31, 1949, 1950-1970* cumulative ed. (Washington, D.C.: Library of Congress, 1973), 1:vii.
6. *Ibid.* See, e.g., entries on p.952, 1420-22.
7. Peyton R. Neal, Jr., "Looseleaf Reporting Services," *Law Library Journal* 62:153 (May 1969).
8. Peter Sutcliffe, *The Oxford University Press: An Informal History* (Oxford: Clarendon Press, 1978), p.147-48.
9. Charles A. Cutter, *Rules for a Dictionary Catalog*, 4th ed., rewritten (Washington, D.C.: Govt. Print. Off., 1904), p.22.
10. Library of Congress, Descriptive Cataloging Division, *Rules for Descriptive Cataloging in the Library of Congress* (Washington, D.C.: Library of Congress, 1949), p.20, 22.
11. *Anglo-American Cataloguing Rules*, North American Text, gen. ed., C. Sumner Spalding (Chicago: American Library Assn., 1967), p.204, 207, 208; *Anglo-American Cataloguing Rules: Chapter 6, Separately Published Monographs*, North American Text (Chicago: American Library Assn., 1974), p.44, 53; *Anglo-American Cataloguing Rules*, 2d ed., p.65.
12. *Anglo-American Cataloguing Rules*, 2d ed., p.570.
13. *A Uniform System of Citation*, 13th ed. (Cambridge, Mass.: Harvard Law Review Assn., 1981), p.108.
14. *Anglo-American Cataloguing Rules*, 2d ed., p.65.
15. *Anglo-American Cataloguing Rules*, p.345.
16. *Anglo-American Cataloguing Rules*, 2d ed., p.568.
17. See Clara D. Brown and Lynn S. Smith, *Serials: Past, Present and Future*, 2d rev. ed. (Birmingham, Ala.: EBSCO Industries, 1980), p.91, 118, 172; Andrew D. Osborn, *Serial Publications: Their Place and Treatment in Libraries*, 3d ed. (Chicago: American Library Assn., 1980), p.136. Even the general editor of AACR1 has referred to loose-leaf publications in a discussion of the problems of serials control. C. Sumner Spalding, "Building, Controlling and Cataloging the Serials Collection," in A.A.L.L. Institute for Law Librarians, *Proceedings: Cutting Costs in Acquisitions and Cataloging*, AALL Publications series no.1 (South Hackensack, N.J.: Fred B. Rothman & Co., 1960), p.18.

Margaret Mann Citation, 1982: Elizabeth R. Baughman

The Margaret Mann Citation in Cataloging and Classification for 1982 is awarded to Elizabeth R. Baughman in recognition of her outstanding contribution to library education in the field of cataloging and classification, her devotion to library education, and her continuation of the tradition of Margaret Mann, the teacher, in combining practicality and excellence, vision and instruction.



Elizabeth R. Baughman

Michael Gorman

Elizabeth Baughman is, in the opinion of many, the finest teacher of cataloging in the United States today. The award of this year's Margaret Mann Citation recognizes her excellence in library education and serves to commemorate Margaret Mann by conferring the citation named after her upon a woman who embodies the best of Ms. Mann's ideals and the best of her enduring practical contribution to our profession. For more than two decades, with love, humanity, and commitment, Elizabeth Baughman has taught young librarians well and, thus, made a lasting impression on a multitude of our colleagues and on their libraries. The impact of a single gifted and dedicated teacher may be difficult to quantify exactly but is, nevertheless, real and enduring. As Henry Adams said, "a teacher affects eternity" and never knows the true extent of his or her influence.

Elizabeth Ruth Baughman, a native of Effingham, Illinois, is currently a senior lecturer in the Graduate School of Library and Information Science at the University of California, Los Angeles. She has a bachelor's degree in education from Eastern Illinois University, a master's degree in history from the University of Illinois, and master's degree in library science from the University of California. Ms. Baughman was the head reference librarian at the Chicago Historical Society for some years before going to the UCLA Library School in 1959. When she joined the faculty of UCLA she found both a mentor and her life's work. The mentor was none other than Professor Seymour Lubetzky (Margaret Mann Citation, 1955), the most distinguished living teacher and exponent of cataloging theory and practice. The life's work that Ms. Baughman took on, with the support and encouragement of Professor Lubetzky, was the study and teaching of cataloging. That she excelled in this endeavor is most eloquently testified to by the fact that upon Professor Lubetzky's retirement in 1969, Ms. Baughman was appointed to succeed him as UCLA's principal teacher in the field of cataloging. This was upon Professor Lubetzky's recommendation. To succeed the most eminent thinker and teacher in the most intellectually rigorous field of librarianship was a daunting prospect for Ms. Baughman, but proved to be a step that was well within her compass. Professor Lubetzky's belief in Ms. Baughman's excellence as a teacher is evidenced by (among many others) the fact that when, in 1964, he was selected for the Beta Phi Mu Award for Good Teaching, he wrote to the Beta Phi Mu committee informing them that the award should have been made to him and Ms. Baughman jointly. This letter was read at the award ceremony.

Professionally, Ms. Baughman's life for more than two decades has

Michael Gorman is director, General Services Departments, and professor of library administration, University of Illinois at Urbana-Champaign.

been devoted to the scrupulous and comprehensive study of the complex and constantly changing field of cataloging and to the teaching of that area of librarianship. Despite the all-consuming nature of her avocation, Betty Baughman has found time to play a part in professional and alumni associations. She has been the chair of the California Library Association Publications Committee and the president (in 1967) of the University of California Library School's Alumni Association.

Ms. Baughman uses the full range of teaching formats—formal lectures, seminars, informal small-group discussions, and directed individual study, and is an outstanding exponent of each. That her effect on her students is far from transitory can be seen by the respect and affection for her that they retain for many years after graduation, by the various important positions that they hold across the U.S. library world, and by the fact that “Baughman students” are much prized by knowledgeable employers of catalogers. The importance of this contribution cannot be overestimated. In order to remain vital, our profession needs a continuous supply of intelligent, informed, and well-motivated students.

Betty Baughman has never enjoyed good health. That her physical frailty is matched by a strong spirit and a keen intellect is obvious to anyone who has met her. In light of her physical resources, she made a conscious decision to concentrate on the teaching role. This virtual eschewing of the research facets of library education in no way represents a lack of respect on her part for such research. There can be few persons who keep up with the published fruits of research with more assiduity than Betty Baughman. I know of no one who is better at distilling and communicating those results to students than she.

Betty Baughman is an engagingly witty woman with great warmth and capacity for friendship. She brings these personal qualities to social discussion and (from the professional point of view) more importantly, to her teaching and to professional discussion. She has succeeded in overturning the stereotypical view of cataloging, catalogers, and cataloging teachers. Her teaching is thought-provoking, thorough, and exciting. She transforms the superficially arid topic of cataloging into the intellectual and practical challenge that it really is by the application of her teaching skills and her devotion to her students.

Ms. Baughman is an outstanding educator, a dedicated librarian, and a good and kind person. I (with thousands of others) am proud of her friendship and proud to belong to the profession that she adorns.

Esther J. Piercy Award, 1982: Nancy R. John

The Esther J. Piercy Award for 1982 is presented to Nancy R. John in recognition of her leadership in the field of technical processing, her contributions to the effective and rational implementation of AACR2, and her promise for continuing service to the profession.



Nancy R. John

Julie Nilson

Nancy R. John, the recipient of the 1982 Esther J. Piercy Award, is an exemplary role model for new librarians. With her graduate library degree and a certificate of specialization in art librarianship from the University of California at Los Angeles and several years of technical service experience as both a student and support staff at Stanford and UCLA, she embarked on her professional career as a cataloger at the National Gallery of Art Library. She soon became active in the Art Libraries Society of North America (ARLIS/NA) serving as both member and chair of a variety of committees. Many of her committee responsibilities concerned establishing positions and guidelines for cataloging art materials. As chair of the ARLIS/NA Committee on Cataloging, she was responsible for directing the formulation of the cataloging policy position for the society and represented the society to ALA's Catalog Code Revision Committee. Her leadership and her ability to articulate issues and negotiate solutions earned her the support of her colleagues, and in 1976 they elected her vice-chair of ARLIS/NA. Upon becoming chair in 1977, she was asked to manage the society's headquarters also, while a search for a permanent executive was conducted.

In 1978, Ms. John became the catalog librarian at the University of Illinois-Chicago Circle. She assumed the responsibilities for directing a broadly based cataloging operation and for retrospective conversion. The responsibilities of her new position led her to seek a more encompassing role in participating in national cataloging activities. She helped prepare the introductory program for AACR2 at the 1979 ALA Conference, where she served as a discussion leader. She appeared in a videotape presentation on AACR2 that was used throughout the country in preparing technical services librarians for the new code. At the same time, she helped organize, establish, and lead the ALA RTSD Heads of Cataloging Discussion Group. Her effectiveness as a trainer, her ability to explain and illustrate the new rules, and her articulate presence was quickly recognized by librarians in her home region. She was invited to present AACR2 workshops and training sessions for meetings of the Wisconsin Library Association, the MIDLNET OCLC Users Group, the Illinois Library Association, the Indiana Library Association, INCOLSA, ARLIS/NA, and for various research libraries. She is viewed as a valuable resource in her state and in the region where she provided more than her fair share of the effort to prepare catalogers for the new code.

Ms. John was promoted to assistant university librarian at UICC with responsibilities for Collection Control and Delivery Services in 1980. At the same time, she was asked to chair the RTSD CCS Commit-

Julie Nilson is head, Acquisitions Department, University Libraries, Indiana University.

tee on Cataloging: Description and Access. Both these advancements were solid recognition of her achievements in Illinois and in the national library community. As assistant university librarian, she has participated in the redesign of automation in the Circulation Department, has integrated automation into the operations of the Catalog Department, has established a data conversion process that will provide the basis of a future online catalog, and is designing the automation requirements for the Acquisitions Department. But it is as chair of CC:DA, the committee assigned the responsibility for ALA's position on AACR2, its maintenance, revision, and implementation, where Ms. John has been most cited for her levelheaded, evenhanded leadership. In an atmosphere charged with emotion and among individuals committed to represent highly divergent points of view from various groups and organizations, Ms. John has provided a forum for discussion, analysis, and resolution that has been universally judged as fair and efficient.

Ms. John has many other credentials that support her selection as the Piercy Award librarian including a substantial list of publications. All these factors have been instrumental in the jury's decision to present the award "in recognition of her leadership in the field of technical processing, her contributions to the effective and rational implementation of AACR2, and her promise of continuing service to the profession."

In the spirit of the intention of this award, one of the letters supporting Ms. John's nomination quoted Edwin Castagna's comments on Esther J. Piercy and stated that they applied equally to Ms. John. "If there was ever a stereotype of the cataloger . . . Esther helped destroy the stereotype. We who worked with her from day to day . . . are also richer for having had her personal friendship, her close professional association and her invigorating example."

Resources Section Blackwell North America Scholarship Award, 1982:

Library Collections: Their Origin, Selection & Development, by Richard K. Gardner

Library Collections: Their Origin, Selection & Development ably fills a long-felt need for a publication that instructs the beginning librarian about the collection process from the creation of a work to its integration into a library collection. Library Collections describes the production and marketing of library materials, covers bibliography and reviews of book and nonbook materials, presents the theory and practice of selection, and examines such issues as weeding and storage, evaluation, and censorship. This well-written text offers practical insights into the collection process and provides information not usually covered in introductory acquisition courses, as exemplified in the sections on publishing and resource sharing. For these reasons it has been awarded the Resources Section Blackwell North America Scholarship Award for 1982.

The author, Richard K. Gardner, is a professor at the Graduate School of Library and Information Science, University of California, Los Angeles, which will be the beneficiary of the \$1,000 scholarship award provided through the generosity of Blackwell North America.

Members of the 1982 jury were Richard J. Ericson, Administrative Office of the U.S. Courts, Ruth A. Fraley, Graduate Library for Public Affairs and Policy, State University of New York at Albany, and Fred C. Lynden, Brown University Library (chair).



Richard K. Gardner (left) and 1982 jury chair, Fred C. Lynden.

***NOMINATIONS FOR 1983
MARGARET MANN CITATION***

Nominations for the 1983 Margaret Mann Citation are now being accepted. They should be submitted by December 15, 1982, to Elizabeth Herman, Chair, 701 Tigertail Rd., Los Angeles, CA 90049.

The Margaret Mann Citation is awarded annually for outstanding achievement in cataloging or classification through:

- publication of significant professional literature;
- contributions to activities of professional cataloging organizations;
- technical improvements and/or introduction of new techniques of recognized importance;
- distinguished teaching in the area of cataloging and classification.

Renominations of nonrecipients are acceptable.

***NOMINATIONS FOR 1983
ESTHER J. PIERCY AWARD***

Nominations for the 1983 Esther J. Piercy Award are now being accepted. They should be submitted by December 15, 1982, to Marcia Tuttle, Chair, University of North Carolina—Chapel Hill, Wilson Library 024-A, Chapel Hill, NC 27514.

The Piercy Award was first presented in 1969. Its purpose is to recognize contributions to librarianship in the field of technical services by a younger librarian—one who has no more than ten years of professional experience and who has shown outstanding promise for continuing contributions and leadership.

The award may be granted for:

- leadership in professional associations at local, state, regional, or national levels;
- contributions to the development, application, or utilization of new or improved methods, techniques, and routines;
- a significant contribution to professional literature;
- conduct of studies or research in the field of technical services.

Renominations of nonrecipients are acceptable.

***NOMINATIONS FOR 1983 RESOURCES SECTION
BLACKWELL NORTH AMERICA
SCHOLARSHIP AWARD***

Nominations for the 1983 Resources Section Blackwell North America Scholarship Award are now being accepted. They should be submitted by December 15, 1982, to Ruth Fraley, Chair, 29 Roslyn Dr., Ballston Lake, NY 12019.

This award is presented to honor the author or authors of the outstanding 1982 monograph, article, or original paper in the field of acquisitions, collection development, and related areas of resources development in libraries. Blackwell North America will donate a \$1,000 scholarship to the U.S. or Canadian library school of the winning author's choice. The school will select a student concentrating in the acquisitions or collection development areas to receive the scholarship.

RTSD

Annual Reports, 1981/82

Report of the President

Charlotta C. Hensley

The Resources and Technical Services Division (RTSD), in its twenty-sixth year as a unit of the American Library Association (ALA), is the largest type-of-activity division and the second largest in size (5,874 members) and budget (\$222,077) of the eleven association divisions. RTSD has responsibility for ALA activities concerning the development, coordination, and preservation of library resources, as well as the acquisition, identification, cataloging, and classification of library materials. The division's goals are (1) to implement the goals of ALA, (2) to advance the professional interests of librarians engaged in the development of library resources and technical services, (3) to promote research and publication in areas of divisional interest, (4) to provide forums for the discussion of issues in the development of library resources and in technical services, and (5) to cooperate with other units of ALA and with other national and international organizations in areas of mutual interest. In 1981/1982, approximately 550 members served as RTSD officers, committee members, discussion group leaders, and representatives. Twenty-one divisional committees, twenty-three discussion groups, five sections with fifty-four committees, and the Council of Regional Groups (CRG) accomplished the work of the division summarized here. The activities of the sections, Serials (SS), Resources (RS), Reproduction of Library Materials (RLMS), Preservation of Library Materials (PLMS), and Cataloging and Classification (CCS), are reported separately.

RTSD awards were presented at the 1982 annual membership meeting. Nancy R. John received the Esther J. Piercy Award, which recognizes outstanding promise for continuing contributions and leadership in technical services by a librarian with not more than ten years of professional experience. The CCS awarded its Margaret Mann Citation to Elizabeth Baughman for her achievement in cataloging/classification. The RS/Blackwell North America Scholarship Award for the best publication of the year in acquisitions, collection development, and related areas of resources development in libraries was presented to Richard K. Gardner for *Library Collections: Their Origin, Selection, and Development* (McGraw-Hill).

The division's eighteen-month conference program planning cycle,

which requires contact with potential cosponsors and no-conflict scheduling, was successful in 1982. Of the division's eight programs, seven had cosponsors, including three outside RTSD.

The RTSD/RASD/LITA Preconference, "Prospects for the Online Catalog," featured Isaac Asimov. Nine other speakers discussed catalog access mechanisms, technology in libraries, experiments in online catalogs, choosing an online catalog, and catalog use studies. The planning committee was chaired by Helen Schmierer.

The division's major program was a one-day conference-within-a-conference, "Research by and for Librarians: The Needs, the Methods, the Opportunities," which was sponsored by all RTSD sections and seven other ALA units. The planning committee, chaired by Richard Johnson, presented a program that focused on research in all areas of division responsibility. Other 1982 conference programs were:

1. "The Physical Quality of the Books We Buy: Problems and Solutions" (RTSD/Association of American Publishers Committee, PLMS, RS Bookdealer-Library Relations Committee).
2. "Subject Analysis in an Online Environment" (CCS Subject Analysis Committee, the Reference and Adult Services Division Catalog Use Committee, and the Public Library Association Cataloging Needs of Public Libraries Committee).
3. "Current Uses of Video and Optical Digital Discs" (RLMS Technology Committee).
4. "Education for Library Preservation" (RTSD Education Committee and PLMS).
5. "Collection Management Decisions in a Resource Sharing Environment" (RS Collection Management and Development Committee and SS).
6. "News of Improved Microform Services" (RLMS and RS).

During 1981/1982, RTSD members began planning seventeen regional institutes for 1982-1985 in order to provide programs for librarians who cannot always attend national conferences. Collection Management and Development Institutes are coordinated by a subcommittee, chaired first by Paul H. Mosher and subsequently by Jutta Reed-Scott, of the RS Collection Management and Development Committee. Local committees have responsibility for institutes in Washington, D.C., Cambridge, Mass., the Southwest, the Southeast, the Pacific Northwest, and the Midwest. Authorities Institutes are scheduled for San Francisco, New Orleans, New York City, St. Louis, Albuquerque, and Fort Lauderdale. The planning committee is chaired by Jennifer Younger and the faculty will include Library of Congress staff. Subject Headings Institutes are being planned by a committee chaired by Mary K. Pietris and will also feature Library of Congress staff. The first will occur in October 1982 as a preconference to an Illinois Library Association meeting. Others are tentatively scheduled for San Antonio, Los Angeles, Washington, D.C., and Boston. At the 1982 Annual Conference, the RTSD Board approved a series of library preservation institutes that had been developed by a subcommittee (Merrily A. Smith, chair) of the PLMS Education Committee. Programs extending from April 1983 to

August 1985 will focus first on top-level library management, then preservation program administrators, and finally on preservation practitioners. Institutes about integrated online library systems and micrographics are also being considered by the division.

The CRG provides for the exchange of program ideas and information about national and regional activities in resources and technical services among its thirty-one affiliates, many of which are units of regional or state library associations. During 1981/82, David Remington, chair, coordinated the testing of an electronic mail service for its value in facilitating communication among selected regional group chairs and among division officers and staff. The service will be continued in 1982/83. In acknowledgment of the 1982 ALA/PaLA Annual Conference cosponsorship, the CRG conference program featured activities of its affiliate, the Pennsylvania Library Association Technical Services Round Table, at its program meeting.

All of the twenty-one division-level committees were active during 1981/82. Included here are comments about the work of several of them. The Audiovisual Committee, chaired by Nancy Olson, reestablished liaison with related groups, including the Library of Congress, the Joint Advisory Committee on Nonbook Materials, and the ALA Online Audiovisual Catalogers. Because interest in audiovisual materials is high, the committee was expanded to nine members in 1982. The Duplicates Exchange Union (DEU) had 514 library members in 1981/82. The DEU Committee, chaired by Christina Feick, produced a new brochure describing membership requirements and services. The committee has been meeting in the spring via telephone conference calls, rather than at the Midwinter Meeting, for two years. This has been a reasonable alternative for members who are from small libraries and have difficulty attending two meetings each year.

Chaired by E. Dale Cluff, the new International Relations Committee drafted statements outlining the responsibilities of RTSD representatives to international organizations and the criteria for identifying candidates to represent RTSD in international activities. It discussed methods of publicizing RTSD's international activities and is pursuing liaison relationships with other ALA groups concerned with international library issues.

Divisional membership continued to receive attention in 1981/82. The RTSD Board instructed the Membership Committee, chaired by Murray Martin, to develop a long-term divisional membership promotion plan that includes coordinated funding and recruitment and standard formats and distribution plans for brochures or promotional materials used by sections. The Planning and Research Committee, chaired by Susan Vita, constructed a membership survey concerning members' program priorities. It will be published in the *Newsletter* for voluntary reply by division members.

The Technical Services Costs Committee, chaired by Barry Baker, drafted guideline questions to be answered by any group proposing changes or additions to existing library standards. The committee was expanded to eleven members in 1982.

RTSD's publishing program is an important membership service. Elizabeth Tate, editor of *Library Resources & Technical Services (LRTS)*, the division's respected quarterly journal, maintained high standards in selecting research and other national and international developments in resources and technical services for presentation in 1981/82. To have a more cost-effective charge for nonmember subscriptions, annual rates will be raised from \$15 to \$20 with volume 27; this is the first increase in *LRTS* subscription rates since 1975. The *RTSD Newsletter* is in its sixth year of publication and its second year of appearing bimonthly. Editor Arnold Hirshon provided detailed information about division activities and items about research, AACR2 implementation, library-materials price indexes, online catalogs, regional institutes, microforms cataloging, binding standards, and union catalogs during 1981/82. The H. W. Wilson Company has agreed to index the *Newsletter* because of its substantive content. Other publication projects include an updated *Preservation Education Directory* (PLMS), several pamphlets on binding (PLMS), a monograph about union lists of serials (SS), a guide to selection tools (RS), and a book about technical services costs (Technical Services Costs Committee).

During 1981/82, RTSD displayed its commitment to ALA priorities and activities and to cooperation with other units of the association in several forums. Of primary concern was the continuing debate over various "Operating Agreement(s) between ALA and its Divisions." RTSD also considered items referred to it from other ALA units and sent representatives to the Freedom to Read Foundation, the Government Documents Round Table, the Legislation Assembly, the Membership Promotion Task Force, and the Publishing Forum. Elizabeth Herman, RTSD councilor, attended the Committee on Professional Ethics working sessions about strategies for implementing the 1981 "Statement on Professional Ethics." The *RTSD Newsletter* will publish several articles by Pamela Darling concerning its application to resources and technical services librarians.

The interdivisional Catalog Form, Function, and Use Committee, chaired by Dorothy McGarry (RTSD), had its organizational meeting at the 1982 Midwinter Meeting. Its members include representatives from the American Association of School Librarians, Association for Library Service to Children, Association of College and Research Libraries, Association of Specialized and Cooperative Library Agencies, Library Administration and Management Association, Library and Information Technology Association, and the Reference and Adult Services Division. The committee discussed standards for online catalogs, user education, and the Council on Library Resources public access catalog survey.

To maintain an active role in matters relating to the interchange of machine-readable bibliographic data, the division supported the attendance of one RTSD member of the Representation in Machine-Readable Form of Bibliographic Information (MARBI) Committee during fall and spring meetings at the Library of Congress. MARBI was chaired in 1981/82 by RTSD appointee Gretchen Redfield.

To facilitate regular communication about issues of mutual concern, the RTSD and LITA boards met jointly for the second time at the 1982 Midwinter Meeting. Agenda items included electronic mail services, the Electronic Library Association Membership Interest Group, the interdivisional Catalog Form, Function, and Use Committee, the effectiveness of division liaisons, the proposed "Operating Agreement," and overlapping discussion groups. The results of the very productive meeting (in large part because of the cooperation of B. Kenney, LITA president) were agreement to meet again next Midwinter, to continue the LITA/RTSD liaisons, to present a cooperative statement to COPES at Midwinter about the "Operating Agreement," and to merge the retrospective conversion discussion groups within RTSD and LITA.

RTSD has strong commitment to influencing national and international developments in areas of divisional responsibility. It has representatives to the Universal Serials and Book Exchange, the National Micrographics Association, the CONSER Advisory Group, and the Decimal Classification Editorial Policy Committee.

A special division interest is in standards, guidelines, and codes for resources and technical services. RTSD has representatives to the American National Standards Institute committees on Micrographic Reproduction (PH5) and Library and Information Science and Related Publishing Practices (Z39). The ALA/RTSD representative to the international Joint Steering Committee for Revision of the *Anglo-American Cataloguing Rules*, Frances Hinton, is its current chairperson. The division has also been represented in the work of the International Federation of Library Associations (IFLA) Office for Universal Bibliographic Control's five-year review of the International Standards for Bibliographic Description texts, the IFLA Working Group on Union Lists of Serials, and the International Standards Organization Micrographics Committee.

In its twenty-sixth year, the Resources and Technical Services Division is a strong unit of ALA. Its services and programs are designed to meet its goals and to cover its areas of responsibility within the American Library Association. For the division to remain vital, it must institute a planning process which accurately predicts the developments that will face RTSD and ALA members in the future, which allows goals to be reviewed periodically, which acknowledges priorities, and which evaluates program effectiveness. Membership commitment to RTSD activities and involvement in national and international developments of concern to resources and technical services librarians are also essential to divisional well-being.

In a personal conclusion, I thank RTSD Board members, committee chairpersons, and committee members for their many contributions to the programs of the division during 1981/82. I am grateful to Karen Horny, past-president, for her valuable guidance and wisdom, and to Norman Shaffer, president-elect, for his support throughout the year. I acknowledge particularly William Bunnell, executive director, and William Drewett, deputy executive director, for their impressive work in ensuring that the division operates efficiently. The Resources and Tech-

nical Services Division is unusual among ALA units in the extent of member interest and involvement in its programs. It is the concern and expertise of these members that keep the division operating. I thank all RTSD members for the privilege and pleasure of serving as president during 1981/1982.

Cataloging and Classification Section

D. Kaye Gapen, Chair

For CCS and its members, 1981-82 continued not only to emphasize quality programs, but also dedicated committee work resulting in the completion and forwarding of major committee reports. CCS, along with the RASD Catalog Use Committee/PLA Cataloging Needs of Public Libraries Committee cosponsored a program, "Subject Analysis in the Online Environment," designed to address the needs and/or problems of accessing materials by subject in an online catalog. The emphasis was on the scholarly and theoretical underpinnings of subject control—revealed to be of increasing importance in the online environment by recent findings of CLR-sponsored research reported in another ALA program. Robert Holley spoke on the constraints of the three-by-five card, Jessica Milstead on the state of the art in subject access indexing, Elaine Svenonius on classification in the online environment, Phyllis Richmond on ideal subject access, and Anne Lipow on what might develop given the practical considerations facing us. More than 800 people attended the two-and-one-half-hour session and hailed it as one of the best programs of the conference. Nancy Williamson spoke on the educator's need for research, Jerome Yavarkowsky on the value of cost research in cataloging, and Alan Veaner on the administrator's view of research. CCS' other major contribution to programming this year were the three papers presented during the "conference within a conference."

Major committee reports produced during the year included that of the Subject Analysis Committee (ably chaired by Robert Holley), "LC Subject Authority Control: Scope, Format, Distribution: A Final Report." The report is especially significant since LC is working on its subject authority system, and a number of the recommendations were thought to be important at this time: that there be a machine-readable subject authority file to be distributed on a timely basis with periodic updates (in conjunction with a merging mechanism), and that this file be potentially richer than the printed list. A second Subject Analysis Committee report submitted at the Midwinter Meeting was titled "Report to the RTSD CCS Subject Analysis Committee on Filing Conventions for Period Subdivisions," which would have some effect upon Sears subject headings, and possibly on LC.

SAC is continuing its cooperative work with the Dewey Classification Editorial Policy Committee by agreeing to sponsor a hearing in Los Angeles on proposed Dewey changes in the 560s-590s, 700s-770s, and 350s.

The second major committee report came from the Cataloging of Children's Materials Committee under the chairpersonship of Betty Grebey titled "Guidelines for the Cataloging of Children's Materials." Produced with assistance from the Library of Congress, the guidelines establish standards to be followed in the cataloging of children's materials. The guidelines were approved by the CCS Executive Committee and forwarded to the RTSD Board with a recom-

mendation for acceptance and appropriate publication and distribution.

The Committee on Cataloging: Description and Access (CC:DA), chaired by Nancy John, continued its very active and vital work debating AACR2 matters, often with intensity and emotion. Two task forces completed their work; the first, the CC:DA Uniform Titles Task Force, concluded that there were no serious problems with uniform titles. Two actions were taken: (1) refer to CCAAM the question of uniform titles for constitutions in foreign languages; (2) recommend that examples be added to AACR2 to illustrate the use of uniform titles to differentiate between two works. The second subgroup reporting to CC:DA made recommendations on machine-readable data files, and approximately thirty-five recommendations will be sent forward to the Joint Steering Committee. Two further CC:DA task forces were appointed—one to work on a glossary of AACR2 terms, and the second to consider the Music Library Association report on suggested rule revisions for the cataloging of music.

CC:DA is faced at each meeting of the committee with a variety of concerns, the resolution of which affects the procedures and cost-effectiveness of almost all libraries in the United States. Not only must the committee approach these concerns, but it does so in the public forum of ALA, inviting the discussion of visitors to committee sessions. It is a credit to the forum and to the committee members that active and full debate has resulted in so much fruitful action.

The Committee on Cataloging: Asian and African Materials, under the chair of Thomas Lee, continued its exhaustive work of reviewing and approving romanization tables presented by LC, with the most recent being Japanese. The task force established last year to compile a list of foreign vernacular terms for constitutions in uniform titles continued its work and should be reporting back at the next Midwinter Meeting. The committee also discussed the RLIN Chinese/Japanese/Korean cataloging project and LC's decision to discontinue the production of catalog cards in the vernacular for these items once the project begins. CCAAM is recommending that LC continue to provide catalog cards to research libraries if at all possible. Under the leadership of Elizabeth Dickinson, the work of the Policy and Research Committee is being revived. The committee prepared a resolution relating to the proposed federal standards for librarians recommending that the CCS Executive Committee support efforts by ALA and all of its units to review and comment on "Tentative Standards for Bibliographic Information Analysis . . ." Kathleen Bales agreed to coordinate any comments CCS members would make, synthesize them, and forward them to ALA's Office for Library Personnel Resources for their use in formulating an ALA statement with examples, and that work was completed during this year. The committee is undertaking the task of preparing a research-topic survey to identify areas in which research might be profitably undertaken.

Another facet for CCS activities takes place in the discussion groups. In CCS such groups have been organized in the areas of cataloging norms, copy cataloging, catalog maintenance, and heads of cataloging. The forum for communication and interaction of cataloging matters at the grass-roots level is an important one. With AACR2 now in use, discussion topics have been substantial, interest has been lively, and attendance large in all cases. In some groups a formal structure continues to provide speakers. The groups are fulfilling a need that other committees, as working units, are unable to provide.

CCS also continues to maintain its formal contact with other committees and organizations with similar interests including the Dewey Classification Editorial Policy Committee and with units of ALA including the RASD Catalog Use Committee, the PLA Cataloging Needs of Public Libraries Committee, and the newly formed International Relations and Preservation Microfilming Committees.

In keeping with the long tradition of honoring persons who have made outstanding professional contributions in cataloging and classification, the Margaret Mann Citation was presented to Elizabeth Baughman in recognition of her contribution to library education in the field of cataloging and classification. Her devotion to library education is evidenced by the gratitude of her students; the success of those students in many areas of librarianship; and Baughman's continuation of the tradition of Margaret Mann, the teacher, in combining practicality and excellence, vision and instruction.

The CCS Nominating Committee, under chairperson Doris Clack, produced a slate of six candidates for three vacant positions in the CCS Executive Committee for 1982-83. Elected were Lizbeth Bishoff as vice-chairperson/chairperson-elect, and Arnold Wajenberg and Jennifer Younger as members-at-large.

During 1981-82 the CCS Executive Committee continued to coordinate the activities of the section and its units and to support and sustain the work of those units. The "Manual on Procedures" was completed and will be made available to committee chairs shortly. Program planning and organization were expedited by the appointment of a subcommittee, with Judith Cannan as chairperson, to develop and plan an ambitious video teleconference for the Los Angeles meeting. The title will be "Blood, Toil, Tears, and Sweat: Rules and Formats." The topics will be AACR2 and the ISBDs, MARC formats, and filing rules. The program will be undertaken before a live audience with an anticipated attendance of 1,200 and will be beamed to more than a hundred drop sites with one-way video and two-way audio. In addition, CCS will present (with LITA's cosponsorship) a one-day preconference on microcomputers and their applications in technical services.

Members of the CCS Executive Committee for 1980-81 were Kaye Gapen, chairperson; Judith Cannan, vice-chairperson; Marilyn McClaskey, secretary; and Kathleen Bales, Barbara Gates, Robert Holley, Judith Hopkins, and Patricia Oyler, members-at-large. Their work contributed greatly to another year of progress in CCS. For CCS the year 1982-83 will be a year of significant transition into the electronic age under the dynamic and capable leadership of Judith Cannan and Liz Bishoff as they assume the offices of chairperson and vice-chairperson, respectively.

Preservation of Library Materials Section

Pamela W. Darling, Chair

The second full year of the Preservation of Library Materials Section (PLMS) was characterized by the same vigorous and enthusiastic activity that marked its first, with both steady growth in membership participation and expanded programming efforts.

Among the highlights of the year was the rich menu of preservation conference activities in Philadelphia.

PLMS cosponsored three important programs: one on the "Physical Quality of the Books We Buy" with the RTSD/AAP Joint Committee; another on "Education for Preservation" with the RTSD Education Committee; and third, the division-wide conference-within-a-conference on research, which included

morning and afternoon sessions on preservation research activities. Section members were active in the planning for all three, appeared on the speaker's platforms, and filled the audiences.

PLMS again set up and staffed the RTSD booth in the exhibit area, providing conference-goers with an opportunity to examine a mini-library on preservation, handing out a preservation bibliography and several other informational brochures, dispensing the now-famous RTSD lollipops and taking orders for the new RTSD T-shirts. The booth also proved to be a valuable congregating spot where newcomers and old-timers could get acquainted, messages could be left, and appointments kept. "Meet me at the PLMS booth" was heard more than once, and by the end of the conference, section members were generally agreed that the considerable labor involved in running the booth had been amply rewarded.

PLMS also maintained its tradition of arranging tours for conference-goers, this time to the Conservation Center for Artistic and Historic Artifacts in downtown Philadelphia and to the nearby Library Bindery Company. In the past few years PLMS and its predecessor, the RTSD Preservation Committee, have made it possible for conference-goers to visit more than a dozen different conservation labs, binders, and library preservation programs around the country.

Committee accomplishments during the year have been equally satisfying.

The Education Committee produced another bibliography, coordinated several of the Philadelphia activities, and is at work on a new edition of the *Preservation Education Directory*. An important new activity began with the appointment of a subcommittee to plan a series of regional workshops in cooperation with the Library of Congress Preservation Office. Preliminary plans were approved by the RTSD Board and the first workshop is scheduled to take place in April 1983 in Washington, D.C.

The Library/Binders Relations Committee is continuing its work on a new series of technical leaflets on binding, the first three of which should be ready for publication in the coming year. It is also engaged in a valuable examination of the relationships and distinctions among "standards," "specifications," and "guidelines" relating to library binding. This committee also has a busy new subcommittee that is planning a preconference on library binding to be held in Los Angeles in June 1983 and a regular conference program session on the same subject.

The Physical Quality of Library Materials Committee has been investigating a wide range of preservation supplies and materials, testing, and advertising practices. Members' reports on various topics have proven highly informative and discussion provoking, and the committee is now exploring means for disseminating them to a wider audience. The Committee's "Support Statement for Use of Permanent Paper in Printed Library Materials" was endorsed by the PLMS Executive Committee and the RTSD Board of Directors at Midwinter and distributed to the library press in the spring of 1982. It calls attention to the valuable work of the Council on Library Resources Committee on Production Guidelines for Book Longevity and the ANSI Z39 Subcommittee S: Standard for Permanent Paper for Printed Library Materials.

The PLMS Policy and Research Committee has flourished despite continuing problems with some no-show members. By involving many visitors and ignoring the lack of a quorum, it has managed to initiate investigations of topics such as comparative costs of conservation techniques and the permanence of photocopies; developed a recommendation supporting the Library Technology Project's work toward production of less destructive library photocopy equipment, which was endorsed by the PLMS Executive Committee and the RTSD Board before forwarding to LTP; and formally encouraged the Association of

Research Libraries in its exploration of methods for developing comparative statistics about library preservation work.

PLMS' commitment to spreading the preservation word through conference activities will continue in Los Angeles. In addition to the binding preconference and program, the section expects to cosponsor a program on preservation filming with the RTSD Preservation Microfilming Committee and a program on "preservation as a pre-requisite in library building or remodelling" with the Building and Equipment Section of the Library Administration and Management Association; hopes to have another preservation booth in the exhibit area; and will probably organize another round of tours.

The section now has formal liaisons with the RTSD Serials Section and Reproduction of Library Materials Section, and most recently with the Junior Members Round Table of ALA. These active relationships across organizational boundaries, like the cooperative development of conference programs, are manifestations of two complementary attitudes that seem to be shaping the section's early growth: first, that the preservation of library materials is an activity that cuts across traditional divisions among library operations; and second, that advancing the cause within the ever-increasing complexity of ALA can best be done through active cooperation with existing ALA units, not through competition. In its first two years, PLMS has provided an organizational base and focus for preservation people, strengthening the association by attracting new members, contributing to the profession's awareness of preservation needs, and enhancing our collective capability to respond to them through educational programs, the development of valuable professional relationships, and the encouragement of substantive work on a variety of practical problems.

PLMS is young, strong, eager—and maybe a little cocky. The latter can be forgiven, I think, so long as the energy and dedication of its members continues to produce such good fruits.

Reproduction of Library Materials Section

Robert Grey Cole, Chair

This was a very active year for the Reproduction of Library Materials Section. The section developed and presented two fine programs at the ALA Philadelphia Conference. The first, "Current Uses of Video and Optical Digital Discs," was prepared by the RLMS Technology Committee. Richard Boss spoke on "Research in Progress on Optical Digital Discs," David Remington provided an "Update on the Use of Optical Digital Discs at the Library of Congress," and Judith Paris reviewed "Videodiscs in Education and Training." The second program was jointly sponsored by the Resources Section and was titled, "At Your Service: Managing and Marketing Library Microforms." Jack E. Pontius spoke on the "Knowledgeable Microform Consumer," Margaret Byrnes described "Marketing the Microform Collection," and Katherine Mawdsley described the importance of "The Inviting Setting."

During the year, Deborah Raikes has been chairing an ad hoc Committee to Develop Regional Institutes on Micrographics. These institutes will be held in conjunction with state and/or regional library association conferences and will introduce attendees to the most recent developments in the marketing, use, and

preservation of library microforms. It is anticipated that the first of these institutes will be held in the fall of 1983.

The ad hoc Committee to Develop Guidelines for Operating a Library Microform Facility has been making excellent progress under the fine leadership of Margaret Byrnes. The drafting of the document will be completed by the Mid-winter Meeting and publication should follow shortly thereafter.

The Technology Committee is preparing publications on recent advances in telefacsimile and on optical disc utilization in libraries. These titles will be published by the RLMS Publication Committee in 1983.

Resources Section

William J. Myrick, Chair

The Resources Section serves its membership and librarianship in general through continuing education, publications, the exchange of ideas and procedures, conference programs, and consumer advocacy in areas relating to collection development and management, including the selection, acquisition, and evaluation of library materials in all types of institutions.

The mission and goals of the section are accomplished through the work of its committees and discussion groups. The committees and their chairpersons for 1981-82 were the Bookdealer-Library Relations Committee (Sara Heitshu); the Collection Management and Development Committee (Jutta Reed-Scott); the Library Materials Price Index Committee (Nelson Piper); the Micropublishing Committee (Jack Pontius); the Policy and Research Committee (John Kaiser); and the Resources Section Blackwell North America Scholarship Award (Fred Lynden). The Nominating Committee, chaired by Edna Laughrey, provided continuity to the work of the section by nominating an excellent slate of candidates for office. The section's discussion groups continue to be excellent vehicles for information and procedure exchange. These groups, and their chairs, were the Acquisition of Library Materials (Gail Kennedy); Booksellers (Edward J. Lockman); Chief Collection Development Officers of Large Research Libraries (Juanita Doares); and Chief Collection Development Officers of Medium-Sized Research Libraries (Binnie Braunstein). Finally, the section sponsored the provisional Gifts and Exchanges Discussion Group, chaired by Denise Ridard.

As usual, the section's program activities constituted its most visible aspect. The second in a series of regional Collection Management and Development Institutes was given in Washington, D.C., immediately after the 1982 Annual Conference in Philadelphia. Subsequent institutes are planned for Boston in fall 1982, and for New York (sponsored by METRO) in spring 1983. Future plans call for institutes to be given in the Midwest, the Southwest, the Pacific Northwest, and the Southeast.

The section also sponsored or cosponsored a variety of other programs during the Philadelphia Conference, namely, "Collection Management Decisions in a Resource Sharing Environment," "Resources of German-Speaking Europe: Publishing Patterns and Bibliographic Strategies for the 80's," and "At Your Service: Managing and Marketing Library Microforms." RS also participated in the successful conference within a conference, which focused on research in all aspects of resources and technical services.

Through the generosity and interest of Blackwell North America, Inc., the section once more obtained funding for the Resources Section Scholarship Award. This award, given annually to the best publication in the field of library resources, was made to Richard K. Gardner's *Library Collections: Their Origin, Selection & Development*, published by McGraw-Hill. A \$1,000 scholarship will be given to a student in librarianship at UCLA.

The Bookdealer-Library Relations Committee continued its vigorous program of consumer advocacy, alerting librarians to serious as well as questionable activity on the part of certain publishers, including members of the infamous Gille family. (However, the chairperson did indicate that, with more members of this family convicted, the work load of the committee has somewhat lessened over the past year.)

The Collection Management and Development Committee is responsible for the development of the above-mentioned RTSD Regional Collection Management and Development Institutes, the goal of which is to upgrade practices and to carry on a program of continuing education in the areas of collection management and development. The committee also has three ALA guidelines in preparation. The guidelines will focus on coordinated collection development, use and user studies, and vendor performance studies.

The Library Materials Price Index Committee progressed on its academic book price index as well as a price index for commercial microforms. During the course of the year, the preliminary survey of the 1982 U.S. periodicals and serials subscription prices compiled by Norman Brown and Jane Phillips was published in the *RTSD Newsletter*; the annual report was subsequently published in *Library Journal*, and will be republished in the *Bowker Annual*. An index of German and British books compiled by Tom Leonhardt was published in the *RTSD Newsletter*.

The Micropublishing Committee continued its vigilant oversight of microform standards and of microform publishing. The committee, in conjunction with RLMS, continues to develop guidelines for the use and service of microforms.

The Policy and Research Committee made recommendations to the Executive Committee on a number of issues important to the section, including suggested policies on the establishment of discussion groups, cosponsorship of programs, and the role of consultants and interns. It also put the final touches on a membership brochure initiated through the generosity of Jennifer Cargill, and made suggestions on an RTSD Clearinghouse for Documents on Collection Evaluation, and the formation of an Acquisitions Committee.

The various discussion groups continued to discuss timely topics and to provide an important link between the grass roots of the profession and the activities of the more formally structured committees.

Serials Section

John R. James, Chair

The Serials Section serves the information community and contributes to librarianship by providing a forum for the exchange of information on all aspects of serials management. Through its organizational structure of committees and discussion groups, the section provides discussions, meetings, and programs on

both general and specific aspects of serials management, including bibliographic control, acquisitions, automation, and collection management, and contributes to specialized training for librarians in the field of serials. In addition, the section facilitates the distribution of information concerning serials through its publications.

The topic of resource sharing and collection development is receiving increasing attention in the library and information community due to the present economic climate. The Serials Section ad hoc Committee on Union Lists of Serials continues to provide a forum for the exchange and dissemination of information on the bibliographic means for resource sharing of serial publications. This year the committee will complete drafts of its publication on the creation, production, and maintenance of union lists of serials to be published in the ALA Guidelines series. Union listing is a topic of international interest, particularly in terms of standardization. This year Marjorie Bloss, chairperson of the committee, was appointed to the IFLA Working Group on Union Catalogues of Serials, insuring RTSD/SS participation in international developments. The ad hoc Committee to Study the Feasibility of Creating Dynamic Lists of Core Serials, chaired by Sally Williams through January 1982 and by Suzanne Stiedeck since that time, has been engaged in selecting a subject area for testing the methodology for compiling core lists and assessing their utility.

The implementation of the *Anglo-American Cataloguing Rules*, 2d edition, for serials has been a major topic throughout the year, generating lively discussion and debate. The Committee to Study Serials Cataloging, chaired by Rex Bross, has provided an excellent means for the discussion of this topic at a very specific level. In order to insure that the deliberations of the Cataloging and Classification Section's Committee on Cataloging: Description and Access (CC:DA) are available to the Serials Cataloging Committee and that SS concerns are made known to CC:DA, the Serials Section representative to CC:DA had been made an ex officio member of the Serials Cataloging Committee.

The management of serials collections depends on more than bibliographic control. The Committee to Study Serials Records, chaired by Jean Farrington, deals with all types of serials records. This year the committee has worked on designing a checklist that can be used in planning for the transition from a manual to an automated serials operation. The checklist covers such topics as system selection, functions, and organization. When completed, the checklist will be published, filling an important need at a time when local and cooperative automated serials control systems are proliferating, whether offered by both individual companies and not-for-profit networks.

During 1981/82, the section has continued its support of education and training for serials librarians through its Regional Serials Workshops Committee and Library School Education Committee. Chaired by Deana Astle, the Regional Serials Workshops Committee has prepared a list of journals that will publish announcements of workshops and is examining, with the Council of Regional Groups, a means for updating and disseminating the list. In addition, the committee is updating the *Directory of Speakers for Serials Workshops*. Concentrating on the formal course content needs of serials librarians, the Library School Education Committee, chaired by Betty Hanson, has compiled a syllabus on the teaching of serials in library schools and has completed a survey of library school courses on serials. An article has been written for publication in *Journal of Library School Education*, and *Serials Review* will publish the committee's bibliography of materials relating to serials. The committee has undertaken a new project to investigate the requirements for hiring librarians for serials positions.

In a lighter vein, the Worst Serial Title Changes of the Year ad hoc Committee, chaired by Miriam Palm, is carrying on the continuing education of the

creators and suppliers of serials, which was previously coordinated by the staff of *Title Varies*. Notices for nominations for the worst serial title changes for the year have been placed in several journals and the committee presented the awards at the annual RTSD Membership Meeting in Philadelphia.

Reflecting the high interest in collection management, the Policy and Research Committee presented two resolutions concerning aspects of resource sharing and collection development. The committee, chaired by Jean Cook, expressed support for CONSER participants who are not presently participating in OCLC to participate actively through direct input and upgrading of bibliographic records in the CONSER database. The committee also expressed support for the ARL/NFAIS proposal to enrich CONSER records with abstracting and indexing information. Both resolutions were endorsed by the SS Executive Committee. The committee also discussed the problem of discriminatory rate structures for periodical subscriptions and, as requested by the ALA Council, is investigating this problem to determine whether such practices are unjustified and, if so, to recommend a course of action. The SS Executive Committee will make a final report on this issue at the 1983 Midwinter Meeting.

The Large and Medium-Sized Research Library discussion groups met jointly in Denver for a lively and well-attended discussion of NSDP activities and individual experience in the usage of the ANSC standard for summary holdings. The two groups agreed to merge and will henceforth meet as the SS Research Libraries Discussion Group.

At the ALA Annual Conference in Philadelphia, the Serials Section participated in the conference within a conference, "Research by and for Librarians: The Needs, The Methods, The Opportunities," which brought to light some new directions for the section. Much of 1981/82 was spent completing projects and programs. Under the able leadership of Dorothy Glasby, 1982/83 will be a year for exploring and participating in the changing role of serials to meet the information and economic requirements of the eighties.

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Letters to the Editor



From: *José Luis Peniza, manager, Technical Information Center, Intevep, S.A., Caracas, Venezuela.*—After reading the April/June 1982 issue of *LRTS*, I should like to elaborate on some of the assertions made by Thomas P. McGinn in his article on automation of technical services at the Venezuelan National Library, in regard to automated systems in Latin American libraries.

Mr. McGinn does not refer at any moment to RIPPET, Red de Información Petrolera y Petroquímica (Petroleum and Petrochemical Information Network), which implemented an automated system for managing its information in 1980. This system uses a Data General Eclipse 130 computer and is written in MIIIS standard language. At the present time, it includes cataloging, circulation and information retrieval functions. Hopefully, by the end of this year, development of an acquisitions and holdings check-in system for serial publications will be completed.

This computer support allows the interchange of diverse units of information in real time, thus taking the maximum advantage of existing resources in the country.

Already contacts have been initiated with the National Library to integrate both computers, which would result in the establishment of a more complete information network at the national level.

I appreciate your attention and hope that by the publication of this complementary information, your readers will have a more complete idea of what is happening in Venezuela.

From: *Marjorie Kirchgasser, head of Catalog Section, Amherst College Library.*—I agree with Douglas A. Cargille ("Variant Edition Cataloging on OCLC: Input or Adapt?" *LRTS* 26:47-51 (Jan./March 1982)) that a new record should be input for a variant edition rather than modifying existing copy. I am concerned, however, that his description of the NEW command will lead to a misunderstanding of the use of this function.

The record created by a NEW command must be verified in the same manner as a record created from a workform. I disagree that "the changes are usu-

Editor's note: Letters sent to the editor for publication in this column cannot be acknowledged, answered individually, or returned to the authors. Whenever space is available in an issue, selected letters will be published, with little or no editing, though abridgment may be required. Letters intended for publication should be typed double-spaced.

ally limited to three areas of description, the 245, 260, and 300 fields." Because many of the records used are pre-AACR2 it is no longer possible to assume that forms of names in an LC record are correct; they may need to be changed to AACR2 form. Subject headings must be checked against the most recent *LCSH*; although correct at the time the original record was input they may since have changed. The form of the series may have changed under AACR2. It has never been possible to assume that access points in contributed cataloging are correct. See Judith Hudson, "Revisions to Contributed Cataloging in a Cooperative Cataloging Database," *Journal of Library Automation*, 14:116-20 (June 1981). To use contributed cataloging in a NEW command as Mr. Cargille describes could lead to the proliferation of errors through numerous editions of a work.

Other fields also need scrutiny. I have seen records that were obviously input using the NEW command with 500 and 504 notes left over from the original records but having no relevance to the item in hand.

Given the possibility of errors inherent in the NEW command I have considered recommending the elimination of this function. Therefore, I was alarmed by Mr. Cargille's cavalier approach to it.

Response from: *Douglas A. Cargille, senior assistant librarian, San Diego State University.* — Ms. Kirchgasser appears to make three main points: (1) The imposition of AACR2 means that name access points must now be checked. (2) All access points of contributed cataloging can be unreliable and must be verified. (3) Changes in variant editions are not limited to fields 245, 260 and 300.

(1) I certainly agree with this point but it was impossible to take it into account in an article prepared, written and submitted before the imposition to AACR2 (as was clear from the article). It poses, however, no insurmountable problems as LC's Name Authority File is now quickly accessible on-line.

(2) I also agree here as the footnote on p. 49 of the article makes clear. Perhaps I was in error in relegating the information to a footnote where, evidently, it can be missed in a cursory reading of the article.

(3) This I feel is unfair. As was clear from the context in the article, the statement referred only to those fields requiring changes due to needed ISBD punctuation. Other types of changes obviously can occur anywhere in the record.

In her insistence that all input cataloging must be subject to strict verification Ms. Kirchgasser has my strongest support.

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Compiled by Edward Swanson

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The following types of entries are included:

- a. authors—of articles and letters
- b. titles—of articles and of articles about which letters were published
- c. subjects of articles

Subject entries for individuals are identified by “(about)”; letters are identified by “(c).”

Entries are arranged word by word following the “file-as-spelled” principle. Numbers are arranged before alphabetical characters; acronyms without internal punctuation are arranged as words.

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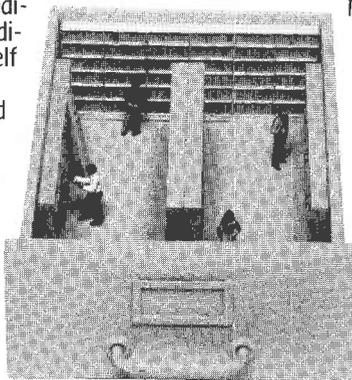
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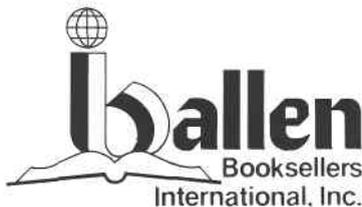
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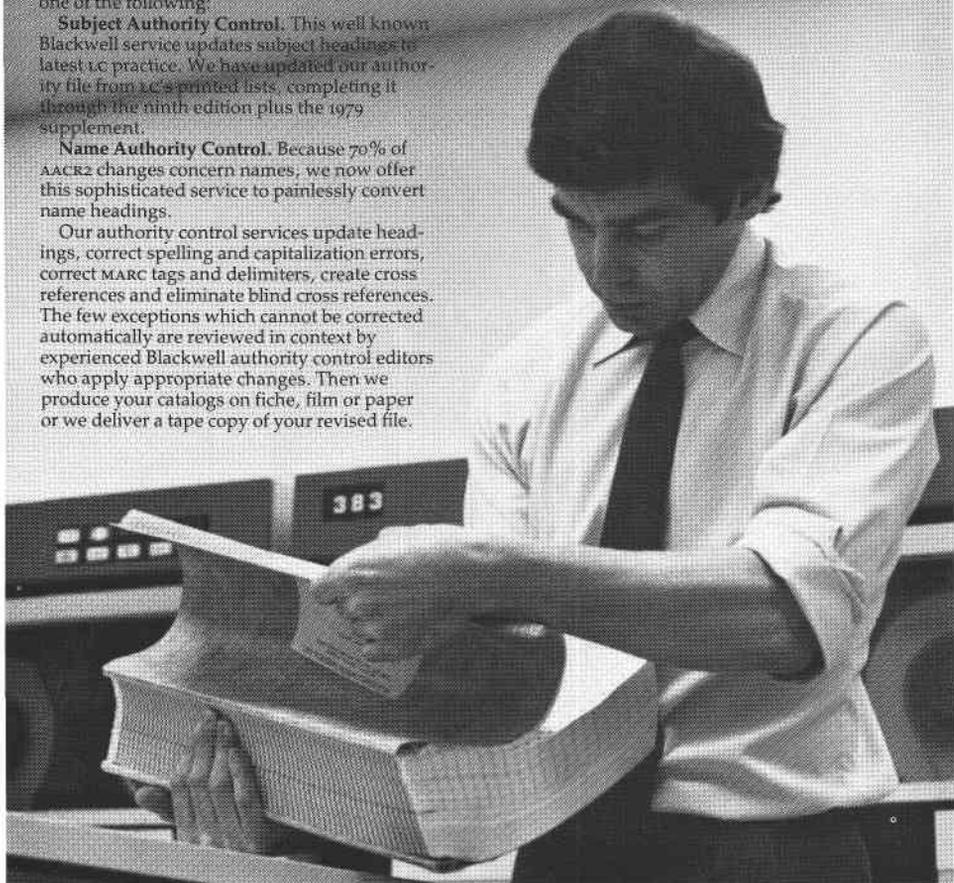
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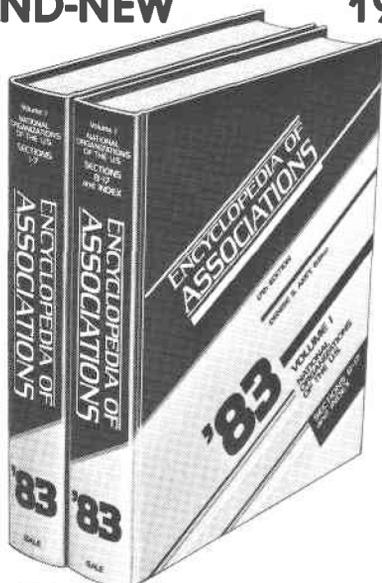
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