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Are you trying to kill me? – the National Bibliography asks Internet

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Abstract :

This paper aims to examine the current meaning of the national bibliography and attempts to identify its outlook for the future. We are searching for answers to the question whether the national bibliography will still be needed in the future and whether it is worth working on its full transfer to the network environment. If that happens, will the current meaning of the bibliography continue to be in force? Will there be a need to provide the national bibliography in several forms (database, PDF files, etc.) when the library catalogue (containing the authoritative and comprehensive bibliographic records), well adapted to the network environment, will be able to satisfy the requirements of different users ("bibliography on demand")? Will the national bibliography become an unnecessary luxury, when similar information can be obtained by using competitive tools, created beyond national bibliographic agencies?

There are three main directions of change for the national bibliography:
- *the change of its functions and aims,*
- *the change of its subject and unit of description,*
- *the change of procedures of its creation and presentation.*

In this paper, we will present the ways in which the changes in the functions and aims of the national bibliography in current sources of information like encyclopedias, dictionaries, and in recently published professional guidelines (ICP, National Bibliographies

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in the Digital Age: Guidance and New Directions, etc.) are understood. We will also show the common understanding of the national bibliography in popular and general sources of information. Its key features and their evaluation will be identified on the basis of the collected definitions in the context of the network environment and the needs of contemporary users.

The national bibliography constantly expands the types of documents it includes (books, periodicals, audiovisual and sound recordings, cartographic resources and iconographic documents); nowadays points of interest are hybrid objects, multimedia and Internet resources. Symptomatic of the change is the fact that the term resource is quickly replacing the current term document. The national bibliography should broadly reflect the communication network of the bibliographic universe through the integration of information on all types of resources. In the conceptual models of the FRBR family where the concept of "work" is understood as a distinct intellectual or artistic creation, its content is more important than the format of the medium in which it was expressed. Therefore, works contained in a larger bibliographic resource (e.g. journal article) should be relevant to the national bibliography. A new method of describing a unit should be developed, at first taking into account metadata extracted from the content of the resource and next their medium and carrier. Consequently, it would be necessary to change the selection principles of resources listed in the national bibliography.

What added value can the national bibliography offer in comparison with any publisher websites, online bookstores, social networking service, etc.? Is the quality of authorities (controlled access points) sufficient reason for its existence? The national bibliography will probably survive, if it changes the formats of metadata and catalogue software used, in order to obtain a more complete interoperability and usage of network resources. It would be useful to produce dynamically generated bibliographic data from library catalogues, in order to limit search results according to the user's requirements and to provide for friendly navigating between resources. The future of national bibliographies and bibliographic agencies might be a network service, providing bibliographic descriptions with full resources in one place by means of special services presenting metadata of the different types of resources.

Introduction

The first decade of the 21th century was a turbulent period for bibliography. We have been observing a lot of changes in the area of both theoretical deliberations and practical bibliographic actions. In particular, a lot of new problems appear at the point of contact of bibliography with the digital and network environments. The possibility of using different Internet services is more and more popular. However, not everybody knows what the bibliography is, particularly, the national bibliography, which is the main subject of this report. We will not be able to make the bibliographic knowledge as popular as the Internet, and it is not our purpose. The character of national bibliographies is being transformed due to the use of new technologies. The subject of bibliographic interests will also be new units

of basic description. On the Internet we have some tools which deliver bibliographic data. These tools can form a kind of competition for national registers. Also, the national libraries catalogues use advanced software, which considerably improves their functionality. These catalogues can be considered a good equivalent. Here it is important to ponder over what national bibliographies are nowadays; what their functions are and should be; in what way the Internet threatens the national bibliographies; if they have a chance to win new users competing with Google tools; and finally, if the national bibliographies are still needed in the era of the Internet.

The meaning and functions of national bibliographies

Online Dictionary for Library and Information Science features a traditional understanding of national bibliographies. According to that dictionary, the book in its printed version is the main subject of interest of a national register, while digital media are treated as a marginal problem of national bibliographies[1]. It was only mentioned there that new, not printed media can be also included in NB.

Guidelines for National Bibliographies in the Electronic Age (2009) define three terms connected with the idea of NB. There we can find the definitions of: national bibliography, national bibliographic agency, and national bibliographic register. NB is defined as "a cumulation of the authoritative and comprehensive records of the national output (i.e., products of the national publishing industry) of a country, published regularly, and with the least possible delay. It is produced in accordance with international standards by the national bibliographic agency. Publication details and authorship are investigated and verified in detail"[2]. National bibliographic control is "the activities to discover, identify and record all the publications produced in a country in order to build up the national library and archival collections, satisfy the information needs of the nation, and contribute to the development of an integrated library, documentation and archival infrastructure"[3]. The role of national bibliographic agencies is to draw up the authoritative and comprehensive records for the new publications which appear in the country.

Guidelines for National Bibliographies... diverge from the classical perception of NB, as creating mainly registers of printed publications, especially books. It is important to say that the above definition does not specify either a form or a type of registered resource. According to these definitions, the bibliography allows for resources of every type, treating

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1   *Online Dictionary for Library and Information Science*. [online] http://www.abc-clio.com/ODLIS/odlis_A.aspx.
2   Guidelines for National Bibliographies in the Electronic Age. [online]. http://www.ifla.org/en/node/5226.
3   Guidelines for National Bibliographies in the Electronic Age. [online]. http://www.ifla.org/files/bibliography/glossary_terms.pdf.

digital documents equally. The purpose of the national control is the description of the whole national output, not only a particular kind of resource. The carriers of information are changing so quickly that describing only some types of publications would be insufficient. It is also important to use international standards, which give us interoperability.

Encyclopedia of Library and Information Science (2010) unfortunately does not include an NB entry. The questions of NB are discussed within other entries. Ian McGowan, in his article *National Libraries* pointed out that the global character of the Internet makes it difficult to establish the origins of digital publications, which appear beyond the national domain. National libraries go beyond their standard roles and services. They look for new methods of making digital and analogue sources available[4].

On account of the huge popularity of Internet sources, including Wikipedia, it is worthwhile to use them to popularize the notion of NB. Unfortunately, the Polish version of Wikipedia does not include a definition of NB, therefore we are working on it now. However, the French and German versions include this entry (in the French version we can find the retrospective national bibliography) with a short explanation by which we can learn that NB is understood traditionally as an imprint register, drawn up according to scientific discipline, covering a nation, a country or a language. For a few years now NBs have existed as online databases. The term NB can appear in other entries in Wikipedia, and if it does, it is understood in a more traditional context. Little information about NBs in Wikipedia means little popularity of their tools, moreover, the bibliographers are not active enough to popularize their work.

The perspectives of national bibliographies

Nowadays the rules for selection of material, some elements of formal description, and the methods of making NBs available are verified. The modern information technologies influence today's NBs. We can observe the convergence of bibliographic sources. Many agencies create services whose role is to present different records in one place. In the modern libraries services the FRBR model is becoming more and more popular. A new technology of Semantic Web with Linked Data can also be helpful. Searching in these services is performed by means of one simple dialog box. It is a result of the preferences of today's users, who are used to that model of heuristics thanks to Google's search engine. The audience do not often realize what source they are using, if it is a catalogue, bibliography, digital library, archives or outer search engines, if the data come from one or many institutes. This knowledge is usually less important for them than the possibility of quick access to information. There is no reason to present NB and data about sources

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4   Ian McGowan: National Libraries. In: Encyclopedia of Library and Information Science. Third Edition. 2010. Vol. 5, p. 3850-3863.

existing in national libraries storerooms separately. It is more important for the users to choose information sources themselves, and to get the information about the differences in content and purpose. Professionals expect information about which databases they are searching, to prepare diligent analysis. Sometimes it is very difficult.

Bibliography vs. catalogue

The user's information needs concerning the collection of the national library is satisfied by a catalogue. It contains bibliographic records, which are adopted by NB according to the rules of selection. This process can only partially be automated. It should be emphasized that the national library catalogue and NB are not the same. Some national library catalogues have a similar content to NBs but not identical. They are different collections. National libraries are often connected with other institutions (i.e. universities, parliament) and it means that they have foreign publications in stock.

The catalogue is constantly changing, its collections being updated and modified. The basic functions and purposes of NB are permanent. We must remember that NB accomplishes a historic mission. NB is necessary to document the information about national output and knowledge of human creativity on a global scale. NBs give us the possibility to make diligent analysis and generate statistical data showing the tendencies in literature, culture and art in different periods of history, e.g. what national and foreign authors were published, what languages texts were translated from, what translators were active, how many scientific publications there were (in different disciplines), what books were written for children, what publishers were active in the publishing market and what they specialized in, etc.

A comfortable and common access to NBs is needed, because they should contain high quality metadata. The records of NBs are verified thoroughly in relation to subject and formal description, intellectual and artistic content. Owing to this fact, NB delivers authoritative access points to authors' and co-authors' names, publishers and to content of sources, etc. In this field NB is better than other Internet tools, where credibility and usefulness for further scientific processes requires verification.

Probably the best chance for NBs will be in specialization in delivering subject information. Therefore, it is crucial to save the possibility of browsing subject orders also in databases. Similar recommendations are listed in IFLA *Guidelines for Subject Access in National Bibliographies*, for example: using a universal verbal indexing scheme, covering all subjects and fields of knowledge; making controlled as well as uncontrolled indexing available to the users; using an international classification scheme; providing content enriched data as a supplement to other subject access tools; arranging NB records by subjects, using either broad categories or classification top hierarchies; displaying headings and classification

numbers in the bibliographic records; providing full and user-friendly subject search functionalities[5].

To sum up, we can state that the purpose of a catalogue is and will be delivering information about the existence of particular items in a library collection in a quick way. That collection can be broader than the NB coverage. However, creation of NB is necessary for diligent reflection on national culture. NBs serve the documentation and historic functions, as we have mentioned above. Perhaps it means elitism. Nevertheless, making high quality metadata available is competitive. NBs can reach the recipients who demand a lot from the quality of the data. Thanks to this, NBs have a chance to survive. NBs should still use subject indexing tools, for example: subject and classification arrangement. Because of that NBs will be able to offer users wide knowledge about national output in a particular field.

Using the possibilities of the digital environment

Currently, national bibliography is in a transitional stage. It departs from the printed form, but often it is presented in a typographic form related to the way in which a document has been printed, by means of text files. In this way NB takes advantage of the printed version and groups records in subject fields. Printed bibliographies often presented material by subject arrangement. It was possible to **browse** information grouped in thematic sections. In printed bibliographies indexes were only an additional tool to search. In the bibliographic databases the situation has reversed, the indexes have become essential tools. However, the effectiveness of the subject **search** by using indexes often requires the knowledge of information languages. Bibliographers rarely remember to implement the possibility to browse materials by thematic sections in the databases. Therefore, it is still worthwhile to share NBs in the typographic form. The Polish NB is no longer in print, records are available in upgraded databases and PDF files. It is a converged form of the bibliography. It has a typical layout for printing, and value added in the form of hyperlinks, which accelerate the use of the bibliography.

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5   Guidelines for Subject Access in National Bibliographies. [online].
http://www.ifla.org/files/classification-and-indexing/subject-access-by-national-bibliographic-agencies/nba_guidelines_draft_2011-05.pdf.
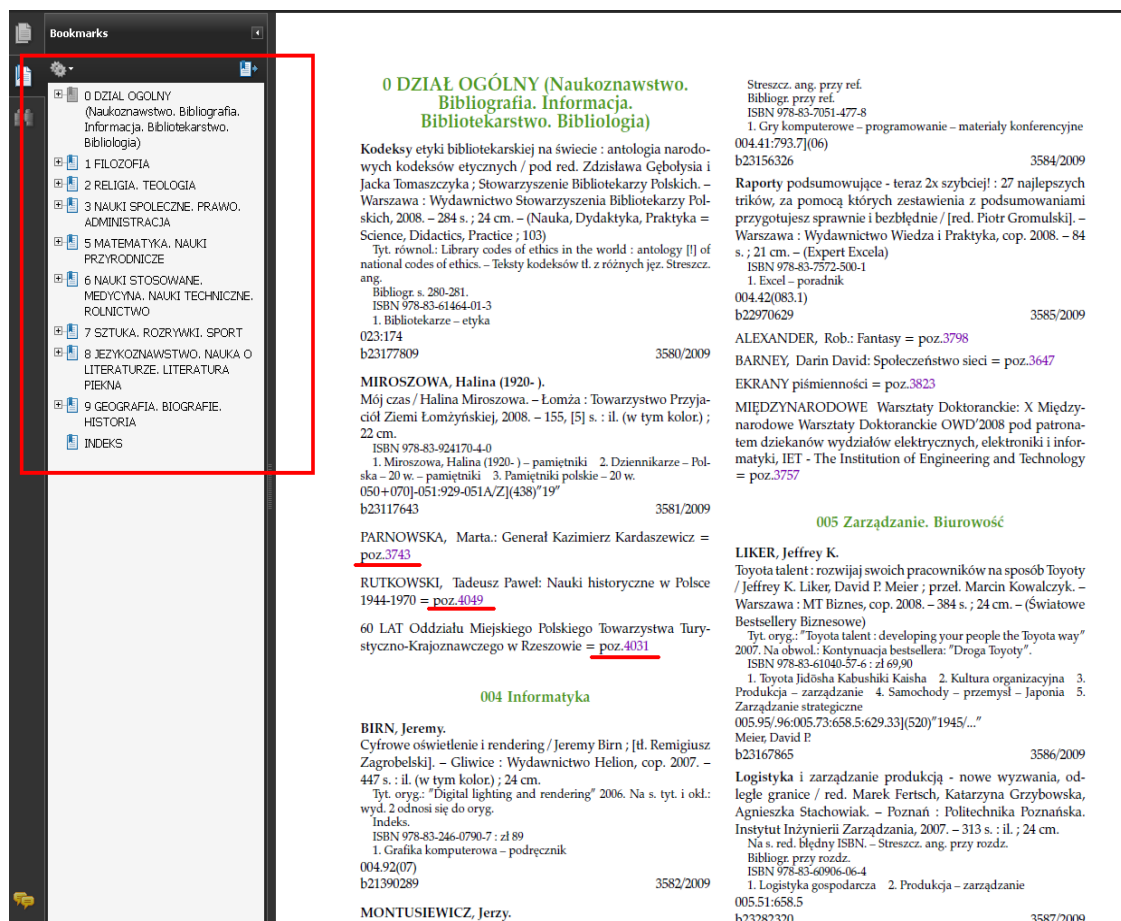
Fig. 1. The typographic form of Polish Bibliography of Monographs called „Przewodnik Bibliograficzny" (it means in exact translation *Bibliographical Guidelines*) with hyperlinks.

http://bn.org.pl .

An excellent example of a modern service is the Australian Trove (http://trove.nla.gov.au). This service integrates metadata from over 1,000 sources - Australian libraries and other cultural institutions, including the ANBD (Australian National Bibliographic Database, which is in essence a union catalogue). Resource types, which Trove indicates are books, magazines, music, sound and video recordings, diaries, letters, photographs, maps, articles from magazines and newspapers digitized, networked resources from Pandora archive, as well as other sites like Wikipedia, Amazon, Google Books, and information about people and organizations. In the Trove service we can obtain information about specific types of resources, displayed in separate blocks, and each can be operated independently. The Trove service provides the ability of faceted limiting search results; indicates the relevance ranking of an item in relation to the query; and provides the services typical for Web 2.0.

The new technologies are also adopted by the British National Bibliography (BNB, British National Bibliography, http://bnb.bl.uk). Bibliographic data are presented by using a friendly interface (Aleph's Primo software). We have the possibility of reducing the multi-faceted performance, such as selected authors, subject, date, language, publisher names, and genre. The FRBR display is used in the OPAC to present information about other issues of the described resources. Detailed information on the resource is presented in a drop-down menu, the records are enriched by book covers and summaries. There are hyperlinks to records in external directories like Copac, WorldCat, Amazon. We can add records to our own list.

They provide a good example of using modern technology adopted in many networking tools. It becomes easier for the average user to make use of bibliographic data contained in the library catalogue. The accessibility of multi-faceted searching and browsing of this data, and limiting search results are a very important advantage of library systems. The audience does not need to focus on what a national bibliography is, and what it consists of, but it must have specialized skills for a heuristic search of bibliographic data in different sections, and professional databases. The most important is that bibliographic products are presented in friendly and easy-to-use interfaces. Meanwhile, the system should allow for the adjustment of detail and type of supplied resources appropriate to the user's requirements with respect to medium, content, carrier, etc. to generate their own lists on the basis of given criteria. Currently the software is not so specialized, but with rapid technological development, which we are witnessing, it will be soon possible. The current model of sharing the bibliography, as separate databases for different types of resources hidden deep within the structure of library services, made this such an elite, special and limited-scale use tool. Bringing the NBs closer to other modern tools helps the NB to gain more users.

According to latest trends such a friendly face for the bibliography is a good way to attract the attention of contemporary users. In regard to this the term bibliography 2.0 is interesting. It may mean a new trend in the area of bibliographic activity with using the latest applications, web services, modern standards and metadata description languages, and also co-operation between recipients of the information. All of this can make bibliographic knowledge more popular[6]. However we must remember that the bibliography should be conservative to some extent. It is not possible to allow users uncontrolled interference in content and structure of lists. This would mean a loss of quality and reliability of data, which are the major benefits of bibliography. Therefore, the bibliography can put social networking trends into practice solely in some aspects.

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6   Jarosław Pacek: *Bibliografia 2.0.* "Zagadnienia Informacji Naukowej" 2008, nr 1, s. 35-44.

Nowadays recipients of information, who are not well prepared to organize a scientific workshop, have access to easy-to-use applications such as bibliography generators (Bibliography Maker) and bibliography managers (Bibliographic Management Software). The metadata found in the Google Books service can be easily imported into programs such as EndNote, RefWorks, and Reference Manager. The WorldCat and more and more modern catalogues of national libraries make available similar metadata. The management of metadata resources can be possible in the same way as online bookmarks to create bibliographic references of resources retrieved in the network for example using Zotero, CiteULike, Connotea. In a similar way, it is suitable for managing the metadata resources collected on your own computer. An application such as EasyBib can be used to scan ISBN numbers and quickly retrieve bibliographic data and automatically generate a list of bibliographic references. Such applications are increasingly available for mobile devices, so we can easily create lists already in the library, bookstore, or on the go. All this makes the preparation of a bibliography more affordable for everyone as a result of good co-operation between specialists for bibliography and modern technology.

The usefulness of national bibliographies has been challenged, because of the richness of Internet resources. It may suggest that the traditional and reliable sources are unhelpful, since the Internet's search engines and the web's agents provide answers to "all questions". Of course this is only an illusion. It stems from the fact that the network can easily find news on common and popular topics. When the information is more specialized, it is more difficult to find it. There is a risk that facts or knowledge which are unpopular or obscure for the average Internet users, may not be adequately reflected in the network. Hence the importance of understanding NB, as far as possible, as a comprehensive source of information about the intellectual and artistic heritage of the nation, in each area and regardless of the method of fixation of artifacts. The condition for the effective use of information retrieval is verification of their reliability. It allows you to build scientific knowledge, and consequently science. In information society the science has become a key driver of the sphere of economy, and a well-educated community engaged with knowledge has been expanding rapidly. The most important are activities to improve access to resources in the so-called invisible web or deep web, like special portals, catalogues, databases, electronic journals, bibliographies, which are satisfied with their reliability, because it has been verified. The NBs are a valuable tool for providing such information.

With library catalogues, commercial search engines allow you to generate bibliographic data on demand. Of course, this "little automation" will not eliminate the need to create professional lists. Indeed, just catalogues and bibliographies are the main supplier of content for the bibliographic tools. This content is specific information of high quality, serving science, useful for future research. The NB is not intended to compete with catalogues, or

even more, with search engines. On the contrary, its further development should involve a more complete integration of these tools. Users expect that the current catalogues will be integrated with external tools, including the services provided by Google. For a long time there has been a need spoken of to open the library catalogues for search engine indexing. It was pointed out for example, by Karen Calhoun[7]. Today it is more important to popularize the role of the NBs, which cannot be replaced by the sum of many alternative, but unverified data sources. An often overlooked advantage of NBs is the fact that they are financed with public funds, which gives them stability. At the same time they are being prepared by non-profit institutions, which distinguish them from commercial institutions. With a drop in demand or changes in the profile of commercial databases, they may no longer exist or may be deprived of updating, while on the other hand, there may be high fees for access to them.

Subject of bibliography and unit of description

The NB, which originally included only books, in time began to take into account other emerging types of documents. In the nineteenth century, outside of books it included the newspapers and magazines. The articles appearing in them only recorded the subject bibliographies. Further developments in this field had already appeared in the late nineteenth century and twentieth century when a broad development of the bibliography had occurred. New kinds of documents, which for some time had been ignored by the bibliographies, over time has been accepted. Nowadays a similar process is also seen with respect to the resources published using new formats and media types.

Among the documents of special qualities might be mentioned still images e.g. graphics and cartographic materials. These documents existed with books, but their inclusion in the NBs was limited. Today they are more appreciated. They are often digitized and made available in digital libraries. A similar trend is observed in regard to multimedia, in particular, various types of recordings (e.g. audio, video, etc.), collective works, content of magazines, etc. In the case of sound recordings properly you should always take into account the content, because more often than in other types of resources we are dealing with collections or sets of works of one artist or band, or a selection of songs by subject. More and more attention is paid to the actual content of the work, regardless of the form in which they were issued. Of great interest are the bibliographic databases, in which next to books and articles and their full text, you can find videos, recordings such as radio, music and graphics.

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7   Karen Calhoun: The Changing Nature of the Catalog and its Integration with Other Discovery Tools. Prepared for the Library of Congress. Final Report, March 17, 2006 [online]. http://www.loc.gov/catdir/calhoun-report-final.pdf.

Little is said about the preparation of aggregates in the NBs. This is a difficult matter because of the huge number of publications which should be taken into account. Meanwhile, according to the FRBR model, it is important work. Perhaps we will have to wait long for the inclusion in the study of all works from anthologies, volumes, and conference materials. In the future new technologies and further automation of preparation of the bibliographic activities may be helpful in this.

Certainly it can be concluded that in the XXI century the NB will have to be opened wide to new types of resources. It is necessary to provide a broader understanding of the subject bibliographies and to figure out how to extract the basic units of description. In order to represent the intellectual and artistic achievements of the nation it is no longer sufficient just to inform about printed resource. However, the effective registration of electronic resources, especially network, still makes for a lot of problems[8]. They raise concerns over:

- standards of description;

- establishing formal and subject ranges (all aspects of selection criteria);

- legal possibilities (especially in relation to filing and recording of network resources).

Contemporary bibliography is the mirror image of changes in the structures of public communication. Confrontation with new forms of information, which is trying to include in modern bibliography is not easy. There two reasons of it at least: difficulty in defining some of the elements of new resources and the limitations of used data formats previously.

The twentieth century in Friedrich Kittler's concept of digital convergence is characterized by a predominance of digital media and creating a culture of postmodern age, which is also called Google's century. That has an impact on many areas of life and also applies to the bibliography. Earlier methods to prepare a bibliography for many centuries actually did not change too much. When the IFLA General Conference in Boston in 2001, Unni Knutsen[9] presented results of a survey on the national bibliographies, the loss of the dominant role of print already made itself apparent. Currently, most of the national bibliography is sharing in electronic form only[10].

International cataloguing principles are still changing. The national cataloguing rules (e.g. in Poland, which are consistent with ISBD), international (e.g. ISBD) or Anglo-American (not yet

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[8] IFLA Acquisition & Collection Development Section is preparing: Key Issues for e-Resource Collection Development: A Guide for Libraries [online]. http://www.ifla.org/files/acquisition-collection-development/publications/IFLA_ELECTRONIC_RESOURCE_GUIDE_FINAL_May2nd[1].pdf.

9   U. Knutsen, Changes in the National Bibliographies, 1996-2001. [online]. http://archive.ifla.org/IV/ifla67/papers/143-199e.pdf.

10   See: National Bibliographic Register [online]. http://www.ifla.org/en/node/2216.

AACR2, RDA will soon) are used in the national bibliographies. It is possible to apply different metadata format (for example MARC 21, UNIMARC, MARCXML, ONIX, Dublin Core), but frequently it is used the MARC formats and specially MARC 21 format. However for a long time, it became clear what she wrote and spoke frequently include Karen Coyle[11] that widely used MARC format is not keep up with modern information technology.

Therefore, there is a need to implement a new metadata standard, which would provide access to data recorded in MARC 21, and at the same time enable collaboration with search engines as well as contemporary and future technologies, which include the "semantic web". However, it was working on new rules of cataloging in the first instance. During preparation of the update ISBD, it was decided to create one document for all types of resources. In new edition of the consolidated ISBD there is area 0, which contains the resource type. According to it there are following content form terms:

- Dataset (e.g. numeric data, environmental data);

- Image (e.g. reproductions, maps, raised relief maps, photographs, remote-sensing images, stereographs, motion pictures, and lithographs);

- Movement (e.g. dance notation, stage actions, or choreography);

- Multiple content forms;

- Music (e.g. recorded in analogue or digital formats, notated music);

- Object (e.g. globes, relief models, and other items);

- Other content form.

- Program (e.g. operating systems, application software)

- Sounds (e.g. sounds made by animals, birds, naturally occurring sources of noise);

- Spoken word (e.g. sound of the human voice talking, radio broadcasts);

- Text (e.g. printed or electronic books, correspondence, databases of journals, and microfilmed newspapers);

"A content form category is expanded by one or more content qualification sub-categories that are applicable to the resource being described. (…) Qualifications are added if different

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11   K. Coyle, Future format. Goals and Measures. [online] http://kcoyle.blogspot.com/.

options are possible for a given content form, e.g. text (visual) or text (tactile); image (still ; 2-dimensional) or image (still ; 3-dimensional)"[12].

Some of these types have been included in the national bibliographies for long time, but there are also those that are rare for libraries and probably will not often occur. The question is whether the use of such a typology will actually be helpful? This question raises a number of librarians who are wondering how in practice to apply the new rules.

Much earlier it has been taken work on the development of new Anglo-American cataloging rules. During the preparations the Working Group has already realised that it could not be reduced to the next issue of this publication, because of need to change 'approach' to cataloguing. Therefore, RDA (Resource Description and Access) was published as a new standard of cataloguing after several years of work and process of testing a new code. The RDA implementation is announced on March 31st, 2013[13].

In our opinion, important are the following issues:

- RDA is based on the conceptual FRBR and FRAD model,

- RDA also includes the rules of indexing all types of authority headings.

The AACR2 GMD (General Material Designation) is replaced by three elements in code RDA consisting of: content type, media type, and carrier type. There are the same types as ISBD's Area 0, but form of their names is distinguished. "RDA vocabularies for Content, Media, and Carrier type were developed jointly with ONIX. The vocabulary terms may be replaced for display in an OPAC by other terms of a local agency's choosing or by icons. The terms may be used additionally or only for filtering or limiting searches."[14]

RDA content types[15]:

- cartographic dataset

- cartographic image

- cartographic moving image

- cartographic tactile image

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[12] ISBD International Standard Bibliographic Description recommended by the ISBD Review Group; approved by the Standing Committee of the IFLA Cataloguing Section. Consolidated ed. Berlin ; Munich : De Gruyter Saur, 2011. (IFLA Series on Bibliographic Control ; vol. 44). ISBN 978-3-11-026379-4.
[13] http://www.rdatoolkit.org/.
[14] Replacement of GMD elements. Carrier description. [online]. www.loc.gov/catdir/cpso/RDAtest/gmd.doc.
[15] Term and code list for RDA content types. [online]. http://www.loc.gov/standards/valuelist/rdacontent.html.

- cartographic tactile three-dimensional form

- cartographic three-dimensional form

- computer dataset

- computer program

- notated movement

- notated music

- performed music

- sounds

- spoken word

- still image

- tactile image

- tactile notated music

- tactile notated movement

- tactile text

- tactile three-dimensional form

- text

- three-dimensional form

- three-dimensional moving image

- two-dimensional moving image

- other

- unspecified

The above mentioned principles to develop resources in accordance with ISBD and RDA led to input new fields and subfields in MARC 21 format. Now it is difficult to say how useful these will be to access the resource. It is possible to try looking at the OPAC version for a simple print book:

- Content type: rda content;

- Medium: rda media;

- Format: rda carrier.[16]

Both sets of cataloging rules ISBD and RDA demand for detailed determination of the content type, medium and format on which the resource is distributed. In this way, material designation was exposed that was previously defined less precisely and only if resources are considered as special type like electronic resources, sound recordings, still and moving images etc. This is a real step towards a uniform treatment of all types of resources. This is even more important that a variety of media expands the number of communication channels and facilitate access to cultural heritage. On the other hand, information about content and subject cataloguing of resources become more important than ever.

Conclusion

Is the Internet a real threat? Is the subject of this paper a marketing slogan? Internet used both for private and commercial dictates technological changes and the development of new tools. All other areas of knowledge more or less are involved in this process. In recent years we can observe the changes in respect of the bibliographic metadata standards, the software used in the OPACs, including national bibliographies. This situation of them shows that in a constructive way they put the new challenges. How the Internet could destroy or even kill the national bibliography? The greatest threat to the national bibliography would disregard the enormous Internet power as a result of its popularity, accessible, usefulness etc. The professional Internet tools are based on methods developed in bibliographic practice where important information is indexing; descriptive cataloguing, subject cataloguing and controlled access points are used for many years.

Currently librarians make the effort to the most important principles directed the construction of cataloguing codes according to *Statement of International Cataloguing Principles*[17]. One of conditions is integration of the descriptions for all types of resources and controlled forms of names of all types of entities. They should be based on common set of rules for relevant metadata of retrieval resources.

The national bibliography incorporating new types of resources and, where possible aggregates, is very important source of information. It will probably survive, if it changes the formats of metadata and catalogue software used, in order to obtain a more complete interoperability and usage of network resources. It would be useful to produce dynamically generated bibliographic data from library catalogues, in order to limit search results according to the user's requirements and to provide for friendly navigating between resources. The future of national bibliographies and bibliographic agencies might be a network service, providing bibliographic descriptions with full resources in one place by means of special services presenting metadata of the different types of resources.

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