



Cultural differences between libraries, archives and museums? Experiences from BAM, the joint portal for libraries, archives and museums in Germany

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Abstract

BAM, the joint portal for Libraries, Archives and Museums in Germany, considers itself to be a digital memory institution. Currently the portal holds more than 40 million records from a wide range of cultural institutions, some 37 million data sets from six libraries or union catalogs, 2.9 million data sets from eleven archives, 300,000 data sets from twenty museums and 800,000 data sets from other institutions. These significant differences in numbers of data sets are not only due to the size of the holdings of the participating institutions but also to “cultural differences” between libraries, archives, and museums in creating records and collaborating in union catalogs. The paper describes those differences from the perspective of the BSZ, the hosting organization of BAM, and a major contributor to BAM, the Foundation Prussian Cultural Heritage (Stiftung Preußischer Kulturbesitz), Berlin. The point of view is specific for the situation in Germany and might differ from the situation in other countries. There are certainly other important issues that are not mentioned here as we chose to take a perspective specific for BAM.

1 Introduction

In the information society, it is not surprising that many call for libraries, archives and museums to merge into one digital memory institution, a single platform for cultural heritage online. BAM, the joint portal for Libraries, Archives and Museums in Germany, is an example of such a memory institution. Currently BAM holds more than 40 million records from a wide range of cultural institutions, some 37 million data sets from six libraries or

union catalogs, 2.9 million data sets from eleven archives, 300,000 data sets from twenty museums and 800,000 data sets from other institutions. These significant differences in numbers of data sets are not only due to the size of the holdings of the participating institutions but also to differences between libraries, archives, and museums in creating records and collaborating in union catalogs. The paper describes those differences from the perspective of the BSZ, the hosting organization of BAM, and a major contributor to BAM, the Foundation Prussian Cultural Heritage (Stiftung Preußischer Kulturbesitz), Berlin. The point of view is specific for the situation in Germany and might differ from the situation in other countries. There are certainly other important issues that are not mentioned here as we chose to take a perspective specific for BAM.

2 Some General Information About BAM

Originally, the BAM Portal started as a project funded by the German Research Foundation (Deutsche Forschungsgemeinschaft, DFG) in 2001. Since 2007 it is run by a consortium consisting of the following institutions:

- The Foundation Prussian Cultural Heritage (Stiftung Preußischer Kulturbesitz), Berlin;
- The State Archives of Baden-Württemberg (Landesarchiv Baden-Württemberg), Stuttgart;
- The State Museum of Technology and Labour (Landesmuseum für Technik und Arbeit) Mannheim;
- The Library Service Centre Baden-Württemberg (Bibliotheksservice-Zentrum Baden-Württemberg), Konstanz.

The collections presented in BAM are:

- the South West German union catalogue (Südwestdeutscher Bibliotheksverbund) with about 13,2 million titles of about 1200 scholarly libraries,
- the Northern German union catalogue (Gemeinsamer Bibliotheksverbund) with nearly 20 million titles of 332 scholarly and municipal libraries,
- the Foundation Prussian Cultural Heritage with the library catalogues of about 10 million titles and the online content of the image archive with about 15,000 items,
- the German online archive of autographs (Kalliope-Verbund) with a collection of about one million items,
- the State Archives of Baden-Württemberg with 2,500 online inventories showing more than 1.7 million items,
- the German National Archives with 500 inventories and nearly 90,000 items,
- the Historical Museum of the City of Leipzig (Stadtgeschichtliches Museum Leipzig) with about 141,000 items,
- the Architecture Museum of the Technical University of Berlin with nearly 90,000 items,
- DigiCULT, the northern German museum network with some 18,500 items,
- the Foundation Haus der Geschichte of the Federal Republic of Germany and the German Historical Museum (Deutsches Historisches Museum) with some 6,500 digitized objects from their permanent collections each,
- four State Museums of Baden-Württemberg (Landesmuseum für Technik und Arbeit Mannheim, Badisches Landesmuseum Karlsruhe, Staatliche Kunsthalle Karlsruhe, Landesmuseum Württemberg Stuttgart) with several thousands of items.

By the end of 2008, the total number of data sets in BAM was:

BAM total 40 482 163

Libraries

Northern German Union Catalogue GBV (some 330 scholarly libraries)

Southwestern German Union Catalogue SWB (some 1200 scholarly libraries)

State Library of the Prussian Cultural Heritage Foundation, Berlin

Central Index of Digitized Imprints (ZVDD) 36 645 259

~20 M

~13 M

~3 M

~0,5 M

Archives

State Archives of Baden-Württemberg

State Archives of Hesse

Federal Archive of Germany

Municipal Archives (Freiburg, Heilbronn, Reutlingen, Mainz) 2 751 346

1,7 M

0,8 M

88 K

86 K

Museums

Architecture Museum of the TU Berlin (collection of technical plans and drawings)

Historical Museum of the City of Leipzig

The Foundation Prussian Cultural Heritage, Berlin

digiCULT Schleswig-Holstein

Foundation Haus der Geschichte, Bonn / Leipzig

German Historical Museum, Berlin 268 461

69 K

141 K

11 K

18 K

6,5 K

6,5 K

Other sources (Kalliope portal) 817 097

The BAM Portal is hosted by the Library Service Centre Baden-Württemberg (Bibliotheksservice-Zentrum Baden-Württemberg, BSZ). Apart from hosting the South West German union catalogue (Südwestdeutscher Bibliotheksverbund), the BSZ provides services for archives and museums, it is application service provider for MusIS, the South-Western German Museum Network (for details on MusIS see Schweibenz & Sieglerschmidt 2008). Furthermore, the BSZ is also involved in the activities of creating the German Digital Library and the European Digital Library Europeana.

A major contributor to BAM is the Foundation Prussian Cultural Heritage, Berlin (Stiftung Preußischer Kulturbesitz, SPK). The SPK is the institution that keeps together all the central, state cultural institutions of the former state of Prussia (dissolved in 1947) located in Berlin and is the biggest cultural complex in Germany. It consists of one big library (the former

Prussian State Library), one big archive (the former Prussian State Archive including all governmental provincial archives), and 16 museums, as well as two research institutions (Ibero-American, and Music Research).

3 Divided by a Common Origin?

In the beginning, the different types of cultural (and natural) heritage objects were treated more or less alike and gathered in closely related collections with regard only to their functions. A more distinctive differentiation of institutions and objects they collected took place from around 1700 onwards. The definite line along which libraries, archives, and museums could be irrevocably separated from each other was only too often not too clear (and this surfaced up in regular intervals again and again). A prominent example is the huge British Library which was formally a part of the British Museum until 1973. However, what at first were only differences in detail of handling their objects by the different 'custodians' – the later 'professions' – gradually developed over time, later to develop and consolidate into more rigid and clear-cut different approaches. (For our topic of 'cultural differences' it should be noted that the approach to be quite uniform in each of the branches themselves – rather than differing practices in every individual library, archive, museum – must be regarded as a later product, largely of the 19th century.) Of equal interest with regard to 'cultural differences' for the time being is that we may safely assume these different approaches to have been based on a) the different interests taken in, and usage planned of, the documents being kept b) the differences of material form and how to best store, administer, and retrieve physically differing documents that pose different requirements in this respect. This latter difference does not play the predominant role today, partly because the most suitable conservation techniques and procedures by now are well established in all three sectors A, L, M, partly because it is just the very methods of conservation and restoration themselves which show the greatest uniformity among the sectors. Safe buildings, adequate lighting and climate control, how to treat paper in its different conditions, the properties of material and how they develop under certain influence – all that is largely the same for all three branches. Wood is wood, paper is paper, stone and ceramics are stone and ceramics now matter if they are held in the collections of an archive, a library or a museum.

But for a), the different interests taken in documents, the different aims of what to retrieve from them, no doubt has had and continues to have a large influence on forming different 'cultures'. A book is a self-contained entity, often you know already the title or a specific author, and then you simply ask to get it and start studying it.

The problem that arises, beyond this most easy way of using books, is how to find not a certain object (book) but a certain piece of information – be it a specific section of a book not recognisable in the title data of this book, be it only a specific piece of information hidden together with others in a bigger document unit. And how to find the information not laid down in books but in other kinds of documents? These three problems historically gave rise to the idea of documentation starting from around 1900, they are still valid today and they constitute the big movens behind the databases, search engines, online retrievability of our days.

Archival records most often make no sense in isolation, as a single physical object alone. It is decisive here that you know the context (the previous and subsequent documents), the originator (the authority responsible), the reactions of others in the process of the document

creation, etc. In archives, you often do not want to study simply documents but you want to research a historical event, a subject question and how it was solved, who intervened when and why, etc. Here, archival documents are the means to an end within a larger undertaking (task). The way they are organized, what repositories are built very much depends on these historical contexts of their genesis.

In museums, documents (i.e. physical objects)

A) are nowadays held for both enjoyment and study at an equal share. This is obvious for art objects but is also true for others, like technical machines. In addition, the museum objects serve further purposes like being the only true historical testimony of some event, expedition, production, social development, ("Belegstück" – reference sample, piece of evidence, cf. Buckland 1991). They may be used as demonstration object to study, and to familiarize yourself with, e.g., a certain technique of making something, a certain taste for arts and crafts, etc..

B) The enjoyment happens at some distance between user and object, there is no direct haptical interaction (interference) of the users with the objects. 'Study' happens at two levels: One equally 'at a distance', for the general public. The other one involves direct touching, inspection, physical investigation (with the help of apparatuses, etc.) and is limited to restorers, curators, scholars and scientific researchers.

C) In each case, an ample documentation is required to accompany the object. This documentation is both the material assembled, collected, and kept together with the document, and the material sometimes extensively written about and 'around' it: furnishing a picture of the historic situation and circumstances, the implications some new technology had, the social reactions interfering with it, etc. Such documentation most often takes the form of a general, or a specifically scientific, catalogue. Such activity may continue in providing conference contributions, books, TV features etc. produced around the object and based on its study.

D) For museum objects, a strong interest nowadays lies in the narrative, i.e. weaving stories around the objects, integrating them into a scenery that explains a larger idea or (intellectual) phenomenon (cf. the modern theory of exhibitions, see Dietz 1999; Donovan 1997 for the role of the narrative). To sum it up: different forms of use in and of A, L, M become obvious as soon as we take a closer look at the practices that surround us every day, and they become equally obvious from studying the rich literature on cataloguing, object handling, and content representation in the three institutions.

How did all this affect our work with BAM? Once the reference data are there in digital form, they can in principle be joined together. Different data formats from A, L or M do, of course, pose some work for data input and for keeping the online connection with the institutions. Because the data fields (information about the objects) are not the same for A, L, M, the BAM portal cannot furnish complete coverage of all information aspects users might expect to learn. Presently, it cannot furnish data (retrieval results) completely comparable between A, L, M and between all individual institutions because not all objects in the database can be searched along the same criteria. And this is even a little worsened by the fact that different data values (terminology, vocabulary) are being / have been used to describe objects and thus to determine their retrieval. However, this is not a point that prolongs cast-in-concrete 'cultural differences' between A, L, M into eternity but rather a point which emphasises the

need for future increased application of joint vocabulary – something that should be done as soon as possible.

So, what's common in approach, and thus, in present-day teaching for the three sectors and their unity/differences ? The clear basis for convergence between A, L, M is that they all hold objects which carry semantic content and which are kept for that reason. There is a certain number of properties of these objects which can be represented (described) by standardised data categories, and thus allow access to the objects for further study. There is not really a contradiction between these but a different range of choice reflected by these categories as selected hitherto. Clearly, individual, precisely delineated data (metadata) need to be taken from, and recorded for, each type of these objects in all three sectors. These data have a digital representation whose fundamental technology is not in any way different for each of the three sectors. These data are digitally stored and digitally retrieved – no difference either. Technical knowledge, experience, practice is required to perform these operations. These requirements are, basically, not different for the objects of the three sectors either. They only differ depending on the individual differences of the DIGITAL techniques that you apply. A 3-D representation can be applied to a book, a seal in an archive, a museum object, ...

But then, on the other hand, what remains different and must be taught differently for each sector even in future? This could be answered this way: The range of (types of) data needed to be 'read' /extracted from, and documented for, the different (types of) objects. And: What do you want to do with the different objects, for what purpose to use them - this is very much in the scopes of the three sectors. By the different way you approach them, you look upon them, the documents naturally entail different properties and thus, different information depending on the angle you take. It is this requirement, the knowledge of how to interpret the documents, i.e. to use them adequately, that leads to some differences between the three sectors. The need will continue to teach the students in the LIS faculties the understanding of these differences also in future. Partly, it will be a teaching and an introduction into a historic dimension, into a group of 'historic' document types and their physical existence (printed or handwritten books, photos on paper, ..). This would be 'historic' documents which are still produced and continue to exist, but whose relative share in the total information amount is likely to decrease gradually - as archival and library documents are more likely to be produced only electronically ('born digitals') in future. With museum objects it may be slightly different because what is collected there will probably in future in its majority be as 'corporeal' in nature as it is hitherto – just as a counterpart to the ever-growing share of digital objects likely to surround us in future.

4 How did all this evolve?

In the 1920s and 1930s the field of modern information and documentation developed and all three memory institutions were considered to be information providers (Rogalla von Bieberstein 1975: 9ff). In the late 1960s and early 1970s a more integrated view of information provision and users' information needs developed. Many experts in the field found it increasingly difficult to distinguish what kind of objects were typically collected by just one of these three institutions due to its material manifestation (Leonhardt 1989: 215ff). It is no coincidence, then, that from 1969 onwards the “Vocabulary of information and documentation” (ISO 5127 : 2001) was developed – a work which united for the first time concepts and terms from libraries, book trade, archives, documentation, and museums into

one single, comprehensive system. The advent of the computer and of electronic documentation was also a major contribution to the erosion of the traditional differences between the three memory institutions. By focusing on the information content that could now be made available in electronic form and in this way bring closer together the traditionally separated institutions (Rogalla von Bieberstein 1975: 93).

In consequence of the differences created by “material manifestation”, the paradigm so far is that museums collect artifacts and naturafacts, i.e. original objects - while libraries and archives collect mentefacts, a class of objects that - in theory - can be copied indefinitely as only the information they carry is important and not the objects themselves (Waidacher 1993: 286; Maroevic 1998: 103f). But with the advent of digitization and the Internet more and more holdings of the three memory institutions became digitally available and can be viewed online (although being available only visually and not in a haptic or sensory way). In this regard, from the users’ perspective it is no longer of any importance what the original material form of the now digital objects used to be (Hedegaard 2003: 2; Martin 2003: 4).

Nevertheless, during the process of establishing BAM and collecting the data from the different institutions, it was natural that the differences in institutional cultures of libraries, museums and archives re-emerged which we (have) experience(d) continuously through our professional lives and which might be obstacles on the road to a useful and useable memory institution. Let us return to the different “manifestations” of the material objects and consider the differences in collection policy they generate and the different traditions they have created for the institutions.

Libraries collect books and serials, basically. As a rule they are products of mass production and not originals – except for some rare books and handwritten manuscripts. Therefore they can be found in many libraries. In order to save time and money it makes sense to share the effort of cataloging and to use data provided by other libraries or the national library. In this way, a closer cooperation between libraries developed. In a second step, a joint key-word terminology like the Schlagwortnormdatei (SWD, the German subject authority file) came into being. This was also the foundation for a second initiative for bringing the data from different individual cataloging in different libraries together in union catalogues (the first initiative had been the "Deutscher Gesamtkatalog" 1931-1941 much of which became destroyed, and the new model of "library networks" from the mid-1980s on). In contrast to libraries, archives and museums – for the majority of their objects – do not collect mass products but originals. Therefore, at first glance, collaborative cataloging together with other institutions does not bring the same advantages as in the field of libraries.

Archives hold the materials produced through an administrative, often governmental institution, an organisation or an individual in the conduct of their business. The guidelines for the preservation of these records are very strict due to the legal regulations for archival materials. In contrast to books, archival records are normally unpublished and almost always unique. The materials are usually collected and structured according to the principle of provenance, i.e. the (administrative) origin of the materials (cf. ISO 5127, entry 4.3.1.1-09). Structuring collected material according to the principle of pertinence, i.e. the subject contents of the materials (cf. ISO 5127, entry 4.3.1.1-08), was common some time in the early 19th century but is discarded nowadays. As these principles are different from those used in libraries or museums, archives have specific principles of classification. The so called finding aids (in German: Findbücher, Findmittel) contain consolidated information about the archival record, such as acquisition and processing; provenance, including administrative

history or biographical note; time span of record; scope of the record, including size, subject(s), medium; organization and arrangement; and an inventory of the series and the folders. This kind of context is crucial as archival materials without context are of no avail. At the same time, the way of indexing the materials is quite different from libraries and museums – if it is done at all because archivists reject the wide-spread practice of indexing by subjects as misleading.

In museums, cooperative cataloging does not mean a division of labor in relation to the objects to be cataloged as it does in libraries (Biedermann-Zimmerman 2008: 67). In the museum business cooperative cataloging results in a joint vocabulary that can be used for indexing the objects. In cooperation with the partners of the MusIS network, the BSZ also expands the German subject authority file SWD to meet the needs of museums - a process that is sometimes difficult and painstaking as it is sometimes difficult to explain to library professionals why museum professionals need new and quite specific terminology for indexing. Having now years of experience both in the field of libraries and museums, an institution like the BSZ is an ideal institution to serve the terminological needs of both institutions in coordinating the process. In addition to the SWD, the BSZ creates museum-specific thesauri such as the thesaurus for object names or for styles and epochs. These thesauri will be shared with the German museum terminology portal "museumsvokabular.de", an initiative of several German institutions, including the Institute for Museum Research (IfM). The portal museumsvokabular.de both makes available existing vocabularies that can be used without copyright fee restrictions and will serve as a platform for cooperative development and future harmonization of such vocabularies. In this way the BSZ, the IfM and other partners contribute to the national effort of creating a joint museum vocabulary – a tool we found important to have not the least due to our experience from the cooperation in BAM. Nevertheless, for the foreseeable future it remains a difficult process to establish collaborative cataloging among museums. This is due to the fact that museums have historically not been interested in the computer interchange of information with other museums because of the uniqueness of their collections forgetting that the museums information they collect is of interest to the world beyond the boundaries of the museum itself (Bearman 2008: 54).

Considering the above, libraries seem to be the most advanced institutions in collaborative cataloging. Some experts even claimed that libraries were a decade ahead of museums in collections management (Besser 1987: 14; Besser 1997: 154). This is certainly true for books and serials, the standard materials of library collections, but it seems questionable for other kinds of materials such as manuscripts, maps or drawings, or archives which are often part of library holdings. For such materials, which are often originals, libraries face the same problems in cataloging as museums and archives do, and they could profit from the latter's experience in handling this kind of material. Therefore it is reasonable to consider where the three memory institutions could learn from each other.

5 Learning from each Other

Libraries, archives, and museums are institutions with quite different ways and traditions of cataloging their holdings which resulted in 'cultural differences' between the institutions. Nevertheless, they should try and search for common approaches in cataloging and use a common set of thesauri. The modern models of cataloging philosophy like the CIDOC-CRM (Conceptual Reference Model) and FRBR (Functional Requirements for Bibliographic

Records) are excellent examples for building such common ground. Considering the fact that metadata formats and ontologies are about to merge more and more, the three institutions should consider applying the CIDOC-CRM. CIDOC-CRM provides the extensible ontology for concepts and information in cultural heritage and documentation being an international standard (ISO 21127:2006) for the controlled exchange of cultural heritage information. Moreover, CIDOC-CRM is closely related to FRBR. Since 2006 there is a joint effort for harmonizing these two standards.

Another example for such a tool is ICONCLASS, a subject-specific classification system for the iconographic content of works of art. It is a hierarchically ordered set of designations (terms/phrases) of objects, persons, events and abstract ideas that can be the subject of an image. Mostly art history institutions use it to describe, classify and examine the subject of an image represented in various media such as paintings, drawings and photographs. ICONCLASS uses so called keys, a set of numbers and characters which can be combined with names of persons or places, for instance the key “61B2(...) historical person (with NAME)” can be used to describe a historical person and the key “61E(...) names of cities and villages (with NAME)” to describe a geographic entity. This kind of keys could be used by all three memory institutions to index people and places in order to make them accessible via the same classification system. Moreover, due to the design of the keys, ICONCLASS can be easily translated in different languages currently being available in six European languages. The ICONCLASS Libertas Browser for the Web allows for searching in natural language so that users simply enter the search terms regardless of the ICONCLASS keys. A search for the Holy Roman emperor Charlemagne creates hits in such heterogeneous databases as Bildarchiv Foto Marburg (Germany), Arkyves Collection - Mnemosyne and Partners (an international project, login required), the Emblem Project Utrecht, and the Rijksbureau voor Kunsthistorische Documentatie (Netherlands Institute for Art History, The Hague). If ICONCLASS would also be applied by non-arthistorical institutions, it could become a valuable tool for indexing people, places and events in a wide range of collections. Apart from ICONCLASS, geographic thesauri like the Getty’s Thesaurus of Geographic Names (TGN) could be used by libraries, archives, and museums in order to have a collective frame of reference for geographical data. There are many other thesauri and cataloging systems that could be applied by all kinds of memory institutions in order to create shared points of access.

6 Conclusions

In the digital realm, the collections of libraries, archives, and museums merge together creating digital (“surrogate”) collections regardless of the original material forms of the holdings. Therefore the institutions should use joint vocabularies and thesauri in order to make the different materials accessible from each "branch" and from all points of view (i.e., points of (re)search interest) in a joint portal such as BAM. In this way users can find all relevant information in one portal instead of searching in many different online-catalogs of various institutions. By using joint vocabularies and cataloging rules in addition to their established and well-proven tools, libraries, archives, and museums could make their collections more accessible for a general public that rightly cannot be expected to be familiar with the differences in cataloging that developed during a long history in the three institutions.

„Can archivists, librarians, museologists and IT specialists join hands to do a better job?“ asked Boris Bosančić and Sanjica Faletar at the 71th IFLA General Conference and Council in 2005. Our answer is „Yes, we can“ - and not only in the field of terminology. But this specific field would be a good point to start because it can only be done together and because a joint terminology would greatly improve the access to the holdings of digital memory institutions.

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