Markita Franulić
Senior Documentarist
Museum Documentation Centre
Ilica 44
10000 Zagreb
Croatia
Phone: + 385 1 48 47 897
Fax: + 385 1 48 47 913
mfranulic@mdc.hr

The Register of Museums, Galleries and Collections in Croatia – Facing Various User Needs

Summary

The focus of the Museum Documentation Centre's (MDC) interest is on the museum as an institution. The institution (museum, collection) is also the main entity of MDC's information system.

This paper will focus on the structure of the Register and on different aspects of its use.

The Register of Museums, Galleries and Collections in Croatia has been managed by MDC since 1992 as a data base whose structure consists of 4 main groups of data: 1) general data concerning a museum; 2) address(es); 3) premises; 4) units: departments, museum collections, documentation holdings; 5) professional museum staff. The structure of the Register is based on the structural organisation of museums, the Museum Law (1998), the needs of MDC and user's needs.

MDC is the only institution that can provide such a large and systematic set of data on museums that serve as an important source of information for museum professionals, the Croatian Museum Network, the Ministry of Culture and the public at large.

From its first static and one-user version, the Register turned into dynamic and multi-user model. It can provide either a different simple set of data for the general public or specialised data that enable analyses that can provide a view of the entire Croatian museum community.

A particular aspect of the Register is its online application "Find the museum" (2005).

Opening its resources to users via the Internet is one of the aspects how MDC fulfills its mission of an information-documentation-communication centre in the field of cultural heritage.

The Museum Documentation Centre (MDC), as referral institution for the museum activity, has a particular role in the documentation and information system in the domain of the cultural heritage. The work of the MDC in the field of documentation and computerisation takes place at two levels. The first relates to the development of its in-house information system meant for the

processing of data from and about museums, the improvement of information flow within the MDC and interaction between the MDC and museums and enabling the accessibility of data from its fonds (databases) to all interested users. The second level is the coordination of the computerisation of Croatian museums.

1. The Register of Museums, Galleries and Collections in the Republic of Croatia

Unlike museums that deal with the processing of the museum object and collection management, the focus of interest in the documentation and information system of the MDC consists of the museum and the collection qua specific categories of material. Hence it is the museum that is the basic entity for processing in the database the Register of Museums, Galleries and Collections in the Republic of Croatia (below: the Register).

The main criterion for entry into the Register is the existence of material formed into a collection, which is the precondition for the founding of any museum. Conceived in this way, the Register is actually a record of the "musealised heritage" and contains data about all the museum institutions in Croatia irrespective of their legal and administrative status. According to professional and administrative criteria, we distinguish among museums that:
A) meet the conditions that are prescribed by the Museums Law and have an acceptable foundation instrument, i.e., exist in law as establishments or institutions,
B) partially meet the conditions prescribed by the Museums Law and are working on meeting them fully,
C) that do not meet the conditions prescribed by the Museums Law and which would seem unlikely ever to meet them, but do nevertheless have material, i.e., a collection. These are for example the collections or establishments that ICOM defines as museums but which are not recognised by the Croatian Museums Law, and according to the current regulations have no chance whatever of becoming a museum. The great majority of such collections are natural history collections, institutions that exhibit living organisms, study collections at faculties and so on.

According to this division, we assign different statuses to the institutions in the Register – A, B and C, in order during search and analysis to acquire the most reliable results. Each museum is marked in the Register with a coding – an alphanumerical marking assigned by MDC according to the ICOM museological classification (1972, 1985)[i], according to the following criteria: kind of material and, in the case of general museums, the area in which the museum operates.

It should be pointed out that the Register is not based on the system of museum accreditation, as is, for example, the British system, but on Croatian legislation and the criteria of the discipline defined in the MDC.

2. The structure of the Register of Museums, Galleries and Collections in the Republic of Croatia

The structure of the Register developed according to the organisational (professional and administrative) organisation of museums, the regulations adopted since 1998 (Museums Law and related individual regulations) and the needs of users in the MDC, the museum community and the public. That is, since we are not aware that there is any international standardised museum system for recording data about museums as institutions we had to work out the structure for the data ourselves. We consulted the archival standard, ISAAR (CPF) – International Standard Archival Authority Record for Corporate Bodies, Persons and Families[ii], but it did not correspond to our requirements. The scope and structure of information in the Register are subject to changes, in line with the law, the needs of users and changes in the policy of the keeping of the Register. Thus up to 1997, the Register recorded collections owned by religious bodies, which different considerably from museums in their organisation (if any) and the structure of the data, for which reason the data in the Register were rather inconsistent. Hence collections owned by religious bodies have been removed from the Register and placed into a separate Register of the Museums, Collections and Treasuries Owned by Religious Bodies.

The Register is conceived as a complex database comprising five interrelated groups of data (5 smaller databases). During the creation of the database of the Register, as part of the computer system of the MDC, we privileged the principles of simplicity, precision and comprehensiveness. The manner of the organisation of data in the Register is a structured file the features of which are simplicity of registration, standardisation of data and categorisation of data, which enables a data item processed for use is appropriate for communication, interpretation and processing purposes by people and machines. An essential factor was the standardisation of the content or substance of the data in the base, aimed at the elimination of errors and inconsistencies during the entry of data and in search results and in order to facilitate inter-institutional communication. Lists of terms were worked out for the description of given contents based on various processional sources, primarily those from the Zagreb Faculty of Philosophy's Information Science Department (Museology) [iii]. Some were accepted in toto, and some were adapted in line with experience gained in work on the Register. Terminological control was brought into the headings such as "type of museum" "kind of museum" "scope of museum" "founder", in the geographical and administrative headings, the professional grades of the personnel, "kind of museum collection "kind of documentation fonds" and some other items.

The structure of data in the Register
1. General information about an establishment
Data concerning an establishment contain general data about museums in Croatia, such as their name, kind, founder or owner, year of foundation, scope of activity, name of director and so on. Records are kept of 188

establishments (as of 2004). It consists of 30 fields / attributes, 15 of which are accessible online. Various values in the form of numerical and/or textual items are entered into the fields.

2. Information about addresses.
Address information contains 9 fields/attributes, eight of which are accessible online.

3. Information about professional personnel
Information is kept concerning about 840 museum employees (2004) who are actively at work in museums and another 40 or so who have left museum work or have retired (the reason for the small number here is that we started recording them only in 2004). It consists of 16 fields / attributes, five of which are accessible online.   Information is collected about, for example, qualifications and degrees, profession, professional qualification [grade], gender and so on.

4.a) Information about museum collections
Information about collections consists of 17 fields / attributes, four of which are accessible online. The register records data about the name and kind of the collection, number of objects, inventorisation, accessibility and so on.

4.b) Information about documentation fonds
Information about documentation fonds consists of 15 fields/attributes, four of which are accessible online. Information that is collected about the documentation fonds overlap to a very large degree with the structure of information about museum collections.

5. Information about premises
Thirteen fields are defined, relating to the premises that the museum possesses, four of them being accessible on line.   The sizes of given premises are entered into the field, so that there is a simultaneous record of the existence of a given space and its size.   For example, information is collected about what rooms are provided for the permanent display, temporary exhibitions, offices, a restaurant, shop, workshop and so on.

3. The manner in which the Register is kept

3.1 Collecting information

Information for the Register is gathered by research that is carried out at the beginning of each calendar year. The structure of the questionnaire distributed to the museums follows the structure of the Register. We have attempted to make filling in the questionnaire as simple as possible, through explanations and the provision of standardised answers that need to be circled. Along with the questionnaire, each museum is sent a printout of the data concerning itself for the previous year.   All this has proved encouraging to museums, for the response rate to the research rose from 40-50% in 1996 to 70-90% in recent

years. Considering the response rate, although not all the sections are always filled in, and are sometimes filled in wrongly, the data obtained can be considered up to date and authoritative.

As well as through this research, information is collected the whole year round in other ways: from reports about work, oral communications, letters, tours of museums for other matters, news from the press, and other means.

The increasing computerisation of museums has enabled the questionnaire for the annual research to be distributed mostly by email, and as for the future we are endeavouring to produce it in the shape of an online form that will be accessible to the museums on production of an appropriate log-in and password.

3.2 Data processing

Work on the Register's database includes procedures of inputting data, alteration of data, deletion of data, sorting of data and printout of data.   The head of the Register inputs the information collected into the database. Before input of data for the current year, the status quo situation is saved on electronic readable media, a hard copy is made of all data, which is kept in the MDC Library, and is available to users.   With current inputs, new data replace old information, which means that the Register contains information about the current state of museums, and it is these data that are accessible in the online database.

4. A short survey of the Register in the 1992-2004 period

The first programme system *Register of Establishments in the Museum Activity* was created in 1992.   It was conceived as being for a single user, and the purpose was supposed to: "1) be a rapid, easily readable and well ordered record concerning establishments, personnel, addresses, collections, activities and subscriptions to MDC editions; 2) facilitate and automate the production of invoices and sending post to addresses from the database; 3) rationalise and reduce records on paper; 4) standardise forms and printouts from the database, and, if wanted, the creation of a hardcopy database from the electronic archives."[iv]   The application for the database was in dBASE VI, using the MS DOS operating system, and it was created by external consultants working in collaboration with MDC professional staff. It can in fact be said that the first version of the Register worked first of all as a directory or address book of museums.

Pursuant to experience acquired during the collection of data, statutory changes and the need to meet the requirements of users quickly and accurately, certain problems were remarked.   They appeared at both technological and substantive levels.   At the technological level, we moved to the MS Windows OS, and the base was transferred to the programme Borland Paradox. This time computer support was worked out by the MDC IT officer.

At the substantive level, numerous modifications were made to the Register. We shall mention just the most important.

The section "activity" was cancelled, because it gave no relevant information: all museum activities are anyway founded on the principles of the discipline and on the regulations, and hence they are practically the same for all institutions. Instead of in the Register, analysis of the actual working of institutions was made possible by the collection and publication of the annual reports of museums. As well as data about museum objects, collection of information about the documentation fonds was also started, which entailed the structure of the Register being adjusted accordingly. We have already mentioned the introduction of control of terminology, which eliminated mistakes during the input of data, arbitrariness in filling out the questionnaire and inconsistency in the writing in of data. For example, in the field of "type of museum" as many as 18 different types of museum were written in, which apart from hindering searching was not founded on any premise of the discipline.

A great problem was that all searches were collected with predefined tabular printouts that could be obtained only on paper, and more complex searches, related to the specific needs of users, could be done only with the help of the IT officer. The distribution of information that until recently could be carried out exclusively in the form of hardcopy was absolutely inappropriate with the enormous changes in the technology, particularly with the increasingly frequent requests for sought data to be delivered in electronic form.

As for the Register being available online on the Internet, it should be said that as early as 1997 the web site of the MDC enabled searches of the database of the Register according to seven criteria selected according to the most frequent inquiries by users. However, searching was not possible from the online base, which was the reason why data were not updated, and this was abandoned. In addition, the lack of any control of terminology made searching more difficult. The next time the Register appeared on the Internet (1999) it was in the for of an interactive map of Croatia on which it was possible to obtain a list of museums and their regional branches according to county and city, with a graphic display of affiliative relationships. In the context of the map, each establishment had a "card" of its own, containing the basic data about it: name, address, telephone and fax numbers, email address, name of director, type of establishment, names of regional units and URL. But once again the problem showed up that it was hard to maintain updated information, because there was no on-line database, and once again this effort was abandoned, and it was decided that only after the creation of a database to make online searches feasible would information from the Register be made accessible on the Web again.

The proposal for a new database of the Register was worked out in 2000. A new structure for the data and functioning of the Register was formulated. In 2004 the database was created in MS Access, and when the new base

started to function, and the web site of the MDC was reconstructed (2005), conditions were created for the production of a true online Register, the structure of which in the main features had been worked out as early as 2001.

It should be said that the structure of the information of the Register was worked out in accordance with proposals and suggestions from all MDC experts, while the application was worked out by the MDC IT officer.

5. Register and users today

5.1 The Register in the MDC information system

The documentation fonds of the MDC were created over many years of work in the fields of documentation, computerisation, referral, publishing, museums, libraries and education. The fonds comprise: the Collection of Museum Posters, the Photographic Collection, the Video Collection, the Register of Museums, Collections and Treasuries Owned by Religious Bodies, the Library, the Archives and the Microfilm Collection. The databases of the MDC are independent of each other, but the plan is for them to be interconnected in the near future.   In this, the Register will form the backbone of the system, to the database of which all the information of the other databases of the MDC will be linked.   In the performance of this linkage, attention will be paid to the needs of users and establishments, and a system will be developed such as to enable interaction among various subsystems. For example, accessing information about a given museum will produce a dataset about that museum, with a link to the connected documentation fonds, to posters issued by the museum, photographs connected with this museum, publications it has issued and the like. The names of the museums, as they are entered into the Register, will serve as a list of terms (for control of the terminology of museum names) and this will also go for the names of the collections, cities and professional personnel.   The names of the experts will be link to the bibliographic database of the library, and thus accessing data about a given expert in a museum will also produce a list of that person's bibliographic entries. Such data will be available, on request, to all interested users, and to some extent on the Internet as well. Within the MDC data from the Register will be used in the performance of all the regular professional activities and in the realisation of projects. Every MDC expert has access to data in the Register, while changes to the database and the inputting of new data are reserved for the Head of the Register.

5.2 The museum community, the administration and the public as users of the Register

The MDC has a unique role in the cultural policy of Croatia as a specialised establishment that keeps track of the whole of the museum activity and keeps data about various aspects of it. Users of information collected and processed by MDC are not necessarily the same as the users of the services and contents provided by museums.   Users of the Register can be grouped into

several basic categories: museums and museum experts, the Ministry of Culture of the Republic of Croatia, various establishments in Croatia (cultural, economic, tourist), international professional organisations, the media, producers of museum equipment, the public (as potential visitors and simply also in relation to the right to information about public establishments).

Data in the form of a directory, or address book, the simplest version of the printout of data, are given on request to any user who expresses an interest.

The Register is used by museums and museum experts as source of information and exchange mechanism in their communication with each other. For example, museums use the Register as source of information while organising conferences meant for a certain type of expert, for the foundation or professional associations or for informal groupings of experts in a certain branch (for example, museum documentarists), and the recording of photographic collections for the purpose of drawing up guides through such collections and so on. These are just some of the specific ways in which the Register issued. Data from the Register can be an important source of information for the establishment of the Croatian museum network (the System of Museums of the Republic of Croatia), which functions on a hierarchical principle, according to which some museums are defined as main or principal museums (which means that they provide help in expertise, carry out professional surveillance, advance professional work and coordinate work inside the System of Museums) with respect to collections in other museums throughout Croatia, according to divisions with respect to kinds of material.

One of the users of the Register is the Ministry of Culture of the Republic of Croatia, to which it serves as a source of information for planning policy in the museum activity, the creation of financial plans and as a source of information for various different projects (for example, a review of museums and collections on the Croatian islands as part of a project for the revitalisation of the islands). Information from the Register, for example, shows the vast disproportion between professional staff with a high level of qualifications and those with secondary qualifications (between curators and the ancillary staff), which comes to 77%:15%. In 2004 only 5 IT officers, 15 documentarists and 13 museum educationalists were at work in Croatian museums, as compared with 501 curators. These are facts that speak for themselves, and also sure that because of the structure of museum professional staff some of the activities of museums must be being neglected. The extent to which material has been inventorised (44% - 2004 figures) and the particular low level of processing of archaeological and natural history materials are facts that can be used by museums and the administration of jurisdiction as a corrective in the creation of strategic plans and annual programmes of work as well as to indicate the need to have a certain kind of museum given assistance in certain kinds of expertise.

ICOM, UNESCO and other international institutions and associations are also users of data from the Register.

The MDC works together with the Croatian Bureau of Statistics on the creation of their questionnaires for statistical research into museums, galleries and collections, pursuant to experience in work on the methodology and definitions used in the design of the structure of the Register and in the way it is kept.

Since 1998 a statistical review of Register information has been produced, according to which it is possible to obtain a pertinent image of the Croatian museum community. One such review, that for 2003, was published the journal *Informatica Museologica*[v].   We identified the need for the publication of such reviews, both for the dissemination of information that can be used by the museum community in its way, and in its way by the cultural administration, and also for the sake of popularising the Register.

Since 2002, data from the Register have been used for the production of reports on Croatian museums for EGMUS (European Group on Museum Statistics) which have led to the data becoming comparable at the EU level an on annual basis. A report on Croatian museums for the international project CALIMERA (Cultural Applications: Local Institutions Mediating Electronic Resource Access) [vi] is also founded on information from the Register.

SWOP analysis that the MDC carried out at the beginning of 2005 on a sample of 139 museum employees from all Croatian regions showed the following results with respect to the level of satisfaction with the quality of data in the Register: 10.8% of respondents were very satisfied, 49.6% satisfied, 7.9% not satisfied and there were 31.7% don't knows. According to structure of officers, exceptional satisfaction with Register information was expressed only by curators, and 37.5% of all curators expressed their satisfaction with the quality of the data.   It should be pointed out that the analysis was undertaken before the Register was put online, so that in the meantime steps have already been taken towards a reduction in the numbers of those who were dissatisfied with the quality of the data and of those who gave don't know answers, and towards raising the level of satisfaction of those who were already pleased.

6. The Register on the Internet

The need for an effective organisation of information and the heady development of the Internet brought into focus the need for the communications process between the MDC and the users to take place in real time. Internet technology at the current moment is the only means to link up all museum information and activities. Access to the data base, a valuable cultural resource, is one of the important uses of the Internet, and the functions of the Register are increasingly Internet-aware.

Today a selective approach to data from the Register via the Internet is available to all users at the MDC Web site. Access is possible via one of the

6 main headings Museums in Croatia – Review of Museums, and directly from the banner on the home page "Find museum". A review of museums is possible via alphabetical searching, according to the initial letter in the name of the museum, geographically, according to counties and cities; according to kind of material via selection from the dropdown list. A review of museum collections and documentation fonds is possible depending on the kind of material they possess. It is also possible to search via keywords. There is a specially featured list of museums that have their own Web sites, so that access to them should be as direct as possible. The directory of museums is given as a document that anyone may download and use as they like. The result of browsing and searches is a list of museums from which we come to a page reviewing each individual museum, which consists of photos of the museum and a set of about 40 kinds of datum about the given museum[vii] (of the total of 100 that are collected for each museum). Other data can be accessed on request to the Head of the Register, in conjunction with identification and a state of reasons what the data will be used for. In this manner we obtain records about users with specific queries, according to which we shall be able to correct the structure of the Register and the user options. As well as in the survey of museums, data from the Register are available on the Internet at a different level as well – in the form of statistical reviews and analyses in the Museum Statistics section. Although they are available to all users, data in this section are meant mainly for professionals. In the presentation of Register data we use hypermedia to a large extent; in the next phase there will also be multimedia, which will make the contents available visually more attractive.

7. Conclusion

The static, local and single-user oriented database in the preceding years (1992-2005) has, according to professional criteria and user requirements, with the help of the development of technology, become dynamic, available online and multi-user oriented. The MDC is today the only institution that can provide an extensive and systematic set of data about museums, and serves as important source of information for museum professionals, for the Republic of Croatia's System of Museums, the Ministry of Culture, international organisations and projects, the media and the general public. Through the production of general and specific statistical surveys and an analysis of Register data, the MDC is capable of supplying relevant data that provide an image of the Croatian museum community, according to which the museum policy in Croatia can be created or corrected. Through involvement in the work of EGMUS and CALIMERA, data from the Register can be used for the making of comparative, European-level, analyses.

The problem that museum material is insufficiently processed and digitalised can partially be overcome with the use of Register data, i.e., by collection level description, thus enabling an insight into the holdings of Croatian museums, which a large number of museums are not capable of undertaking independently.

By the application of Internet technology to its database and by opening up its resources to users, the MDC has become closer to the creation of a definition of an information, documentation and communication centre in the domain of the cultural heritage.

[i] The ICOM museological classification was published in *Muzeologija*, 13 (1972), Zagreb: MDC, ed. Antun Bauer

[ii] ISAAR (CPF) – International standard archival authority record for corporate bodies, persons and families. Zagreb: Hrvatski državni arhiv, 1999

[iii] Maroević, Ivo. Uvod u muzeologiju / Introduction to Museology. Zagreb: Zavod za informacijske studije, 1993

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[iv] Register of establishments in the museum activity of the RC, proposal for a qutoation for the production of software (from MDC Archives), MDC, 1991.

Register of establishments in the museum activity, instructions for the use of the programme system (from theMDC Archives), Zagreb, Integra, 1992.

[v] Franulić, Markita. Some aspects of Museum Activities in Croatia - a Statistical Overview on the Basis of Data from the Register of Museums, Galleries and Collections in the Republic of Croatia. // Informatica Museologica. 34 (1/2) 2003

[vi] URL: http://www.calimera.org/countries/Croatia.aspx

[vii] Decision of the professional council of the MDC.