Collections and collaboration in the Scottish information environment

In this issue Gordon Dunsire, Depute Director of the Centre for Digital Library Research, provides WIDWISAWN with two related features suggesting that cross-sectoral collaboration is the only way to go ...

Scottish Collections Network

The Scottish Collections Network (SCONE) is a Web service for the information retrieval of descriptions of print and digital collections held in libraries, archives and museums in Scotland. The service provides collection-level descriptions with direct connection to online digital collections and related online catalogues and finding aids. Collection descriptions can be searched by collection title, subject, language, town of location, and name of associated person or organization. The service also provides navigation through collection hierarchies.

SCONE project

The service is an outcome of the Scottish Collections Network Extension (SCONE) project funded by the Research Support Libraries Programme (RSLP). The SCONE project overview (http://scone.strath.ac.uk/about/proposal.cfm) says it aimed "to aid researchers by extending existing collaborative collection management work carried out within the framework of the Scottish Confederation of University and Research Libraries (SCURL) into new areas and investigating effective models for building and sustaining a co-ordinated Scotland-wide distributed national resource". The project created two embryonic but operational services. The Scottish Collections Access Management Portal (SCAMP) gathers a number of online tools and services for fostering collaborative approaches to the management of collection acquisition, storage, preservation and access, while the SCONE service offers a collection-centred focus for improving item-level information retrieval for collaborating professionals as well as learners, teachers and researchers.

The SCONE project continued work carried out on service and catalogue descriptions for the Co-operative Academic Information Retrieval Network for Scotland (CAIRNS) project, one of the distributed Z39.50 catalogue "clumps" funded by the eLib: the electronic libraries programme. A clump provides a one-stop-search retrieval interface for identifying resources held in multiple libraries. The Co-operative Information Retrieval Network for Scotland (CAIRNS) continues to be the Scottish clump, and has developed significantly since its creation. In particular, the COPAC/Clumps Continuing Technical Cooperation project (cc-interop) has used the CAIRNS and SCONE services as a testbed for part of its work. This has involved comparing the SCONE database structure with that of other collection-level description services and proposals in the UK, and producing a report on differences and similarities with recommendations for Extending the SCONE collection descriptions database for cc-interop. Many of the recommendations have been implemented in the SCONE service, including searches for the principal languages, other than English, of collection materials, and the educational level the collection is aimed at.
Above: SCONE allows users to browse collections according to geographical area via a "clickable" map.

The CC-interop project has also developed and implemented better integration between SCONE and CAIRNS to demonstrate the concept of the "information environment" where collection-level descriptions are used to "landscape" concentrations of resources where item-level retrieval is more likely to satisfy the particular requirements of a user. The integrated service identifies which catalogues for a selected group of collections are available in CAIRNS for a one-stop-search, as well as which collections in the selection have online catalogues and finding aids which can be searched one after the other.

Another major project fuelling the development of SCONE and CAIRNS is Scottish Portals for Education, Information and Research (SPEIR). This has allowed the development of "portlet" versions which support canned, pre-set searches for collections in SCONE and items held in CAIRNS libraries. Examples of these can be seen in the Browse section of Scotland’s Culture, the new Scottish cultural portal. The canned searches are contained in the URL of the portlet; the URL can be attached to a hyperlink label, button, or image in the host portal.
The portal provides a one stop shop for information on Scottish cultural matters, by acting as a gateway to information on a wide range of cultural resources in print, audio visual and electronic formats.

**SCONE database**

The collection-level descriptions used by the SCONE service are derived from data stored in a relational database, MS SQL Server. The database structure is closely based on the entity-relationship model given by Michael Heaney in "An Analytic Model of Collections and their Catalogues". Heaney identifies three entities which are likely to be part of the description of a collection: collection; location; and agent. Agents are persons or organizations involved in collecting or owning a collection, or administering the location of a collection. Agents can also be the subject of a collection, as well as responsible for creating or manufacturing most or all of the items in a collection.

Heaney also defines the concept of "functional granularity" as what the "institution deems to be useful or necessary for the purposes of resources discovery or collection management". Functional granularity is used to determine at which levels of aggregation a collection and its sub-collections should be described. For example, a special collection in a library requires a specific collection-level description to identify its collector, donor, shelfmark and access restrictions. The department which administers all of the special collections in that library requires a description at a higher level to identify departmental opening hours and contact details for the "collection of special collections". At an even higher level of super-collection, a description may contain details of the chief librarian, library sector, and funding organization. This results in a hierarchy of descriptions which, at each level, pertain to all collections below that level.

This approach was invoked during the early stages of the SCONE project, when the first collection-level descriptions were based on the directory of SCURL libraries and catalogues developed for CAIRNS. The directory contained names, addresses and phone/fax numbers of each campus library, with descriptions and URLs of the Z39.50 and Web public
access catalogues. This information corresponded to attributes of the agent and location entities in Heaney's model. During migration of this data to SCONE, the title of a collection entity was created simply by adding the word "collection" to the library name. Functional granularity permits this, even if the library itself does not have a specific label for the "collection of all resources in the library". Where a library had several library buildings in separate locations, the result was a set of collection-level descriptions for that library. Functional granularity was again invoked to create a single description at a higher level for the "collection of branch collections of all resources in the branch library". As well as collating the collections of each library service, the higher level description provided the basis of a description of the coverage of the CAIRNS and Web catalogues of that library.

For example, if Brigadoon Library service operates a library on Tartan Campus, Bagpipe Campus, and Kelly Campus, SCONE has descriptions of the Brigadoon Library collection, the Brigadoon Tartan Library collection, the Brigadoon Bagpipe Library collection, and the Brigadoon Kelly Library collection, with the last three as sub-collections of the first.

Sources of Scottish collections information

The same method was used later in the SCONE project when incorporating the database used to produce Scottish Library and Information Resources (SLIR). SLIR is a printed directory of library and information services located in Scotland, containing postal addresses, phone/fax numbers, email and homepage addresses. It covers every academic, public, school and special library, and is updated annually. The Scottish Library and Information Council (SLIC) which maintains the database allowed an out-of-date version to be used in SCONE. A collection title was generated by default from the organization name for each branch entry in SLIR. Some of these were subsequently deleted for organizations and branches with purely policy and management functions; i.e. without any collections. Location and agent details were left intact, although without a collection title they could not be displayed in the SCONE service.

Other SLIR collection, agent and location data were merged with those already created by CAIRNS, as all members of
SCURL are included in SLIR.

A database maintenance interface was developed and tested during the SLIR annual updating exercise in 2001 and incorporated in the SCAMP service. The printed SLIR is now derived from the SCONE database, and an online version was launched in 2003 as SLIR Online. The SCONE project also used two other directories as test data for the database. Both directories were focussed on collections, with additional agent and location information. The Directory of official publications in Scotland lists collections of governmental publications held in Scottish university and government libraries. It was used to test the database when there were multiple levels of collection hierarchy, in this case up to seven. Again, all organization and location data could be discarded as it was already covered by SLIR.

Exploring Scottish history: with a directory of resource centres for Scottish local and national history in Scotland (ESH) was printed in its second edition in 1999. It was derived from a database developed by SLIC, and contains detailed descriptions of family and local history collections located in Scotland. The collections were identified and described by the Scottish Local History Forum. The data was used to test the SCONE database for flexibility in accommodating descriptions created by users who were not library professionals. In most cases, ESH descriptions applied to only part of the materials available at collection locations by ignoring resources not relevant to genealogy. The ESH collections were therefore mainly processed as sub-collections of organizational collections.

Not surprisingly, the organizational collections of ESH libraries were already present in SCONE from SLIR. ESH did not confine its coverage to libraries, however, and organization-level collections had to be added to SCONE to accommodate genealogical sub-collections in some archives and museums.

In 2003 the Scottish Museums Council (SMC) gave SLIC a copy of the MS Access database used to drive its online directory of Museums. The data was used to extend coverage of Scotland’s Culture to museums using the SCONE portlet. As with SLIR, the data includes museum names, addresses, phone/fax numbers and email and homepage addresses, with brief descriptions of the collections.

The data was migrated using the same methodology as before, and a surprising overlap with existing SCONE records was found. The SMC database identified 330 museums. Details of 313 of these have been transferred to SCONE; most of the others are museums which are currently closed. 90 of the transferred records already had an entry in SCONE, was found. The SMC database identified 330 museums. Details of 313 of these have been transferred to SCONE; most of the materials available at collection locations by ignoring resources not relevant to genealogy. The ESH collections were therefore mainly processed as sub-collections of organizational collections.

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SCONE has also been creating links to the Scottish Archive Network (SCAN) as part of SPEIR. SCAN provides an Online catalogue for many of the archival collections of Scotland, with a Directory of contact details for Scottish archives and associations (http://www.scan.org.uk/directory/index.htm). The SCAN Directory of 52 archive organizations has been used to update existing SCONE records. The overlap is higher than with the SMC data, at around 70 percent, due to ESH and SLIR entries. SLIR coverage of archives is much greater than museums because the administration of archives and libraries is often shared in the university and local authority sectors. The SCAN Online catalogue has been linked to relevant SCONE collection records for archives, although not all SCAN archives have entries in the catalogue. SCONE will continue to liaise with SCAN via the Confederation of Scottish Mini-Cooperatives (CoSMIC).

SCONE now contains over 4000 basic collection-level descriptions. The addition of index entries for the languages, subjects and education levels of collections in SCONE is by no means complete. Priorities are currently determined by the SPEIR project, and in particular by the need for canned searches in Scotland’s Culture. This means that index entries will be created irrespective of the collection domain.

**Collaborating for quality**

As a result of these activities, the SCONE service now offers comprehensive coverage of high-level collections in Scottish archives, libraries and museums making it easier for users to landscape their searches to include all relevant materials. And the evidence that users do not necessarily wish to limit themselves to a particular domain comes from ESH, as the subsequent overlap with SMC and SCAN demonstrates. SCONE provides a filter to limit collection searches to one or more specific curatorial environments, covering archives, libraries, museums, and the Internet, but the considerable effort that went into compiling the original ESH reflects the importance placed on the collection’s contents rather than its professional domain.

The development of SCONE has also provided evidence of issues in the quality of collection-level data and its maintenance. The continuing volatility of telecommunications and Web addresses such as phone numbers and homepage URLs quickly degrades the quality of printed and online directories. This can be a particular problem for...
online services if users decide that it’s more effective to use an Internet search engine than click on dead links in a structured directory. At the same time, it is impossible for any directory service to be completely up-to-date, and SCONE is no exception. The majority of SCONE agent and location data is checked and updated annually with SLIR, but this leaves many archive and museum records unchecked. The production of SLIR incurs significant costs for SLIC each year, some of which are recovered from sales of the printed directory. That SLIC is willing to pay these costs, and sales to library and information services remain steady, indicate the importance placed by providers and professional users on accurate information.

It is presumably just as costly for other directory providers. Costs are incurred twice over when information is duplicated, and significant reductions must be achievable in minimising the maintenance of Scottish directory information given the overlaps discovered by SCONE.

It makes sense, therefore, for Scottish archives, libraries and museums to seek ways of improving collaboration in the provision and maintenance of online directory services, to save costs, maintain quality, and enhance access to the Scottish information environment.

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References


Archives, Libraries, Museums: possibilities for co-operation within the environment of the global information infrastructure, or, Wee countries wi' big Ideas

I attended this seminar to give a paper on the development of the Scottish Collections Network (SCONE). The seminar is aimed at professionals working in library, archive and museum services in Croatia, and was held in Porec, Croatia on 26-28th November 2003.

This was the 7th annual seminar in a series running since 1997 and organized by the Croatian Archival Society, the Croatian Library Association, and the Croatian Museum Association. Each association takes its turn to act as the chief organizer of one year’s seminar, with the librarians responsible for this most recent event. The objectives of the seminars “are to research, present and discuss a whole range of issues, both theoretical and practical, in the vast field of interoperability within [the] cultural heritage sector, as part of the global information infrastructure context”.

Delegates included students, junior and senior professionals, directors of national services, and developers. Topics were wide-ranging and chosen to be of cross-domain interest. As well as talking about SCONE, I helped to lead a workshop on the use of collection-level description in national and regional information environments. This proved to be very lively, with active contributions from all sectors and much enthusiasm for the SCONE approach. The workshop ended by voting to monitor the progress of SCONE and seek ways of expanding collaboration between Croatia and Scotland in this area. I have given presentations on related issues to two previous conferences in the Libraries in the Digital Age series held in Dubrovnik, and the SCONE database structure has been used to inform the creation of an embryonic collections descriptions service for Croatia.

There is a website for the seminar series, at [http://jagor.srce.hr/akm/index.html](http://jagor.srce.hr/akm/index.html). Most of the text is in Croatian, but there are English summaries available. Proceedings are also published as a paperback book each year, again mostly in Croatian.

The venue is usually Rovinj on the Dalmatian coast in Istria, close to the Italian border, but had to be held in nearby Porec in 2003 because the usual hotel in Rovinj was closed for off-season refurbishment. Porec still had a few hotels open, along with some restaurants; in high season it is like the Riviera, but we were able to enjoy the amenities, and some unseasonably good weather, without the crowds; prices were low-season, too (and the seafood excellent). As the seminar proceedings were in Croatian, except for the day I was involved, I had plenty of time to relax and chat with other skiving delegates, most of whose English was far better than my Croat (which is restricted to "pivo", for beer).

We CoSMIC Scots should take notice! The idea of an annual cross-domain seminar held over a few days in a relaxing environment has clearly been successful in Croatia. I’ve been told that the seminars have had a significant impact in fostering understanding and collaboration between information service professionals. Of course each domain in
Croatia, as in Scotland, has its own way of doing things, sometimes for very good reasons (and sometimes for not so good reasons), but with increasing evidence that our users don't care where the information comes from (see my other article in this issue of WIDWISAWN), this sounds like an appealing way of working together more to ensure best value for the public monies we spend.

**Tell WIDWISAWN About Your Projects**

WIDWISAWN aims to cover research and development projects in Scottish Archives, Libraries and Museums. We are also interested in cross-sectoral and cross-domain projects and non-Scottish projects covering areas not well-covered by Scottish projects or projects that inform the development of the Scottish information environment (JISC projects being one obvious example). Write about them yourself for a WIDWISAWN main article or brief report or tell us about them and we’ll do at least a brief report and sometimes a main article.

Contact WIDWISAWN at **WIDWISAWN@strath.ac.uk**.