

Director Welcomes Delegates to University of Bath for ECDL 2004

It is my pleasure to welcome delegates to ECDL 2004, the 8th European Conference on Research and Advanced Technologies for Digital Libraries being held in September and hosted by UKOLN at the University of Bath. Previous conferences have been held in a variety of locations from Trondheim last year, to Paris and Rome. Against this background, the World Heritage City of Bath provides interesting architectural contrasts and a rich and varied history.

ECDL is part of the Delos Network of Excellence on digital libraries which has received European Union funding under the Framework 6 Programme. The ECDL 2004 Conference Programme demonstrates the rapidly changing information landscape in which we work. It seeks to encapsulate the more 'traditional' aspects of digital libraries but also new and emerging areas, including both those related to eLearning

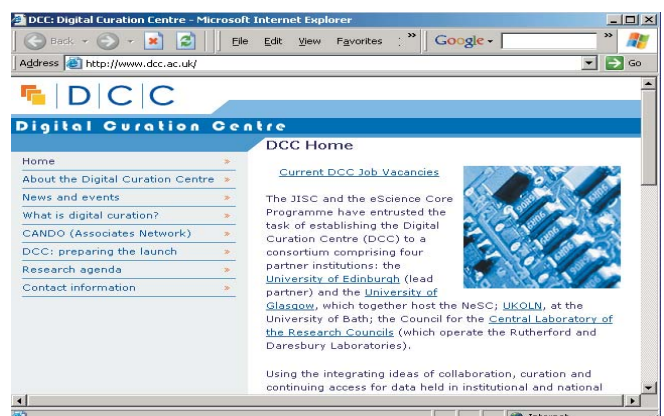
and eResearch. The Programme reflects global trends in information infrastructure developments, open standards, metadata schemas and interoperability.

There is a parallel emphasis on user studies, evaluation and usability. The three well-known and internationally respected keynote speakers, Professor Tony Hey (Director, UK e-Science Programme), Neil McLean (Director, IMS Australia) and Lorcan Dempsey (VP Research & Chief Strategist, OCLC) will present wide-ranging and often challenging views of the future of digital libraries and will no doubt help to fuel the conference discussion and debate. The parallel sessions cover a wealth of topics and promise a very high standard of papers. The Programme also includes a supporting series of Tutorials and Workshops together with the conference's social events.

UKOLN Partner in the New Digital Curation Centre

I am equally delighted to introduce the DCC and its aim to meet the perceived requirements for support for curatorial effort. The creation of the Centre was informed by the seminal 'Data Deluge' paper and the recent e-Science Curation Report which both described the increasing volumes of data generated by e-Science applications and the need to manage, archive, preserve and actively curate these datasets. The DCC has been jointly funded by the JISC and the Engineering & Physical Sciences Research Council (EPSRC) from March 2004. The Centre will be officially launched in November. The Consortium running

continued overleaf...



UKOLN is funded by MLA: the Museums, Libraries and Archives Council, the Joint Information Systems Committee (JISC) of the Higher and Further Education Funding Councils, as well as by project funding from the JISC and the European Union. UKOLN also receives support from the University of Bath where it is based.



the DCC comprises four partner institutions:

University of Edinburgh (Informatics, Law, Information Services and leading research institutes); **University of Glasgow** (HATII and Information Services); **The Council for the Central Laboratory of the Research Councils** (CCLRC); **UKOLN** at the **University of Bath**.

The work of the Centre falls into four categories which are inter-linked:

Research - which includes carrying out work in crucial areas such as annotation, data integration and publication, appraisal and long-term preservation

Development - which covers creating a repository of tools and technical information, services to evaluate tools and methodologies, registries of metadata standards and file formats, and a Standards Watch

Advisory Services - which embrace production of a Curation Manual and provision of training materials

Community Support and Outreach - which will encompass a help desk, Web site, an electronic journal and a range of dissemination events. UKOLN is leading this strand

The Centre is currently gathering user requirements through a series of focus groups and interviews to inform all of the above activities. The DCC is building an Associates Network to bring together key international players in this area such as curators, data centres and relevant industrial organisations. We have also begun to articulate our approach to digital curation, which will include a conceptual model and a framework architecture based on the OAIS Reference Model. There is clearly much work to be done in this emerging field but we look forward to the challenge and to working more closely with colleagues in the eResearch community.



VRVS Offers Core Functionality of the AccessGrid

There seems to be an increasing desire to hold meetings between the members of physically distributed partnerships without the need for people to spend long periods of time sitting on the train. UKOLN staff are often involved in such meetings, notably in our DCC and RDN/LTSN work. The AccessGrid goes some way towards supporting these kinds of meetings but is limited to those sites that have an AccessGrid node - a room equipped with networked audio and video equipment!

VRVS (Virtual Rooms Videoconferencing System) brings the core functionality of the AccessGrid (i.e. audio and video conferencing) to the desktop. All that is required is a Web cam, speakers and a microphone, (for AccessGrid sessions a headset is preferred). Supporting a number of underlying network technologies, VRVS displays multiple incoming video streams and allows full control over the audio and video streams you make available to others. Although the user interface isn't quite as polished as, say, the latest version of Messenger, UKOLN staff are impressed so far with the quality of the sound and vision.

RDN/LTSN Interoperability Work: RLLOMAP Unfolds

The collaborative activity funded by JISC between RDN hubs and LTSN centres continues to roll forward, with several LTSN centres now making their records available for harvesting by others. As with our other RDN-related activities, UKOLN's role has primarily been one of steering the technical direction of the partnerships. The work centres on the use of the OAI Protocol for Metadata Harvesting to exchange Learning Object Metadata (LOM) records between RDN hubs and LTSN centres. To support this, we have been developing an application profile of LOM known as the RLLOMAP (the RDN/LTSN LOM Application Profile) - not the catchiest of names we have to admit! We are currently working closely with CETIS to develop RLLOMAP version 2.0, in line with the release of version 1 of the UK LOM Core specification.

We have also been using this activity as a chance to prototype the use of PURL-based Object Identifiers (POIs) as semi-persistent identifiers for the resources about which descriptions are being exchanged. To support the use of POIs, a POI 'lookup' service has been developed.

RSS-xpress Passes 150 Mark

The RSS-xpress service was originally set up by UKOLN to make it easy for people to create their own RSS feeds. It also provided a UK-specific place to register the existence of new feeds. RSS-xpress now lists well over 150 UK news channels.

To make it easier to navigate the list, these are now partitioned into 'JISC-funded Services', 'UK Higher and Further Education', 'UK Museums, Archives and Libraries' and 'UK Other'. If you have a UK RSS feed that isn't listed, please feel free to register it!

Web Services and Service Registries: Mainstay of the Future JISC Information Environment?

Some would probably say that SOAP (Simple Object Access Protocol) and Web Services in general haven't had as much impact on services within the JISC IE as we might have expected a year or so ago. And they're probably right.

e-Science Grid Engineering Task Force and the release of standards like SRW (Search and Retrieve Web service).

On the other hand we are now beginning to see significant moves in the direction of Web Services, notably the JISC e-Learning Framework, the Virtual Research Environment, the development of pilot UDDI (Universal Description Discovery and Integration) service registries with the UK

Can we now conclude that Web services will form the mainstay of our interoperability in the short/medium term? If so, then the implication for pilot service registry activities like the JISC IE Service Registry is that support for mainstream Web services, both in the services being described and the interfaces to the registry itself, should become the key issue driving our technology choices - e.g. whether to support UDDI or not.

Simple Requirements, Complex Objects

The ePrints UK Project is nearing completion and we are now regularly harvesting metadata from 24 repositories throughout the UK. If we're honest, we can now look back and say that we've done rather better with some of our original aims than others (but that's another story!). One of the themes throughout the project has been the need to improve the consistency and quality of the metadata that we're harvesting. Our major problem has been the need to harvest the full text of each eprint as well as the metadata. Unfortunately, the simple Dublin Core (DC) metadata records made available by most repositories aren't sufficiently rich to support even this relatively straightforward requirement. In both our ePrints UK work and in its sister project, eBank UK, we are now seeing a real need to exchange much richer 'complex objects' made up of metadata records about multiple resources (and, in some cases, the resources themselves), packaged together using METS or MPEG-21 DIDL formats. Watch this space!

Support Is Rationalising Hardware Management

I need a database that holds some simple data on each UKOLN PC, e.g. machine speed, memory, age, warranty, OS, software installed and usual user. We already have one but it isn't central to how we set up and dispose of our machines. To maintain the database properly, each PC ought to be dependent upon it for a network connection. So I would have to register a new machine with the database; no database entry, no network connection. Bath University Computing Services implements Active Directory, recording University Network users and PCs. It includes tools for installing and auditing software on machines, and providing access to services such as printing and file storage. The advantages of registering our PCs and users onto Active Directory would be consistent upgrading of all machines to the latest version, maintenance of Windows and anti-virus software and a live database of PCs for the Systems Administrator - making equipment purchase and disposal more efficient and auditing software simpler. This project is under way.



EnrichUK : Door to New Digital Riches

The Technical Advisory Service (TAS), operated by AHDS and UKOLN, has been busy performing final compliance checks on the projects which have participated in the lottery-funded Digitisation Programme (NOF-digi). Grant conditions stipulated that the projects must work within the framework provided by the Technical Standards and Guidelines. At time of writing, over 85% of them have already met or exceeded the requirements with respect to HTML validation, WAI Accessibility guidelines, Open Standards, security, preservation and discovery of resources. The success rate is very pleasing and unusually high compared to software projects in general. The wealth of new online material generated by this £50m initiative can be unlocked through EnrichUK, the custom-built collection portal developed and managed by UKOLN.

ISBN-13: Sooner Rather than Later

For the past 30 years, the book trade and libraries in more than 160 countries have used the International Standard Book Number (ISBN) to identify books. However, the numbering capacity is running out. The system won't be depleted by tomorrow, but changes are needed.

Currently the ISBN is a 10-digit number but this will change to a 13-digit number. This will also make it compatible with the 13-digit UCC-EAN product coding system for bar codes. The revised ISBN standard is to be published in early 2005. The new style ISBN will come into use on 1 January 2007. After that point all ISBNs will appear in 13-digit form. However, publishers may well employ the 13-digit form as from October 2004, resulting in ISBN-13 numbers then appearing in Library of Congress and British Library bibliographic records.

What does this mean for libraries? They will need to start thinking about the issues sooner rather than later. An article on these developments, including the libraries' perspective, will appear in *Ariadne* issue 41.

The DC Collection Description Application Profile

The Dublin Core Collection Description Working Group (DC CD WG) is developing a Dublin Core 'application profile' for collection-level description, a specification of how properties from the DCMI (Dublin Core Metadata Initiative) metadata vocabularies - and, where appropriate, from other metadata vocabularies - can be used to describe collections.

This work builds on earlier work by UKOLN on the RSLP (Research Support Libraries Programme) collection description schema. The Dublin Core Collection Description initiative seeks to reflect the experience of implementers of that earlier schema and also of other work on collection description within The European Library initiative, the Reveal Project, the IMLS Collection Registry and the JISC Information Environment Service Registry Project.

The DC CD WG is open to all interested participants and work is conducted primarily via the mailing list. The group is chaired by Pete Johnston of UKOLN.

Please note that the names of authors of all items in **focus**, together with references and URLs are available at <http://www.ukoln.ac.uk/focus/>

UKOLN Staff News

We are sorry to report that Penny Garrod, who has fulfilled the post of Public Library Networking Focus since September 2001, will be moving on from UKOLN. While Penny's principal role was focused on public libraries, the wide range of collaboration in which she was engaged, from MLA, British Library and JISC to the Higher and Further Education communities and public libraries across the UK, called for considerable stamina and mastery of her brief. Colleagues at UKOLN have greatly valued Penny's enthusiasm, candour and incisive wit over the past three years and wish her all the best for the future.

Meanwhile, we are pleased to announce the birth of daughters to Eddie Young, Systems Support, Marieke Guy, Project Manager for the ePrints UK Project, and to Sally Criddle. We wish Marieke and Sally both well during their maternity leave. Sally, who as Resource Co-ordinator oversees all general and project administration within UKOLN, has passed the baton to Jenny Taylor during her absence. We are pleased to welcome to the Resources and Administration Team Cora Eley, who will assist Jenny in her work.

Collaboration with TechDis

UKOLN has run several joint workshops with the JISC-funded TechDis service which advises the Higher and Further Education communities on best practices for Web accessibility.

We recognise that providing accessible e-learning resources is not always easy and that simply following WAI guidelines may not always be an appropriate solution. A holistic approach to Web accessibility is being developed which was outlined in a talk at the Institutional Web Management Workshop in Birmingham (see overleaf).

This approach provides a user-driven focus on accessibility rather than simply implementing a checklist approach and recognises there may be times when proprietary solutions may be needed.

TechDis



Events for your Diary: Digital Resources for the Humanities Conference 2004, 5-8 September 2004, University of Newcastle, UK



2 conferences, 4 days, 400 delegates, 4,800 cups of coffee and 2 storms later, the **JISC Programmes Meeting** and **JISC-CNI Conference** went off successfully at the Grand Hotel, Brighton, UK, organised by UKOLN Events on behalf of JISC.

Third International Summer School on Digital Library Technologies (ISDL 2004) 6-10 September, 2004, Pisa, Italy

European Conference on Digital Libraries (ECDL) 2004 12-17 September 2004, University of Bath, UK

ALT-C 2004: Blue Skies and Pragmatism 14-16 September 2004, University of Exeter, UK

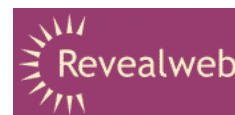
Internet Librarian International 2004 10-12 October 2004, London, UK

3rd International Semantic Web Conference (ISWC2004) 7-11 November 2004, Hiroshima, Japan

10th Online Educa Berlin - International Conference for Technology Supported Learning and Training 1-3 December 2004, Hotel InterContinental, Berlin, Germany

New Data for Revealweb Online Catalogue

Plans are afoot to add details of Ulverscroft large print titles to Revealweb, Britain's first online union catalogue for information on materials in alternative formats for users with visual impairments. Visually impaired people can then use this information to request a title from their public library or to order it from a bookshop. Revealweb represents a leap forward in the provision for visually impaired people. Working well with assistive technology, it holds details of over 100,000 titles including musical scores, tactile maps and talking newspapers available in a variety of formats. Revealweb provides as much detail as is known, e.g. reading age, genre, language, etc.



The project began with a review of the requirements for updating the RNIB's National Union Catalogue of Alternative Formats (NUCAF), carried out by Ann Chapman of UKOLN, who also produced the Revealweb MARC 21 Bibliographic Standard. The migration of existing data from NUCAF took place last year. Since then much work has been done to remove duplicate entries and to add further titles. Revealweb will also have a role to play as the national agency for recording the accessible format versions produced under the terms of revised copyright legislation.

The NISO Metasearch Initiative

'Metasearching' is the function of searching a range of heterogeneous resources from a single interface. Library service providers have traditionally provided such functionality using Z39.50. As the range of search targets has widened, so the diversity of approaches to interacting with targets has increased. Metasearch applications deal with a growing number of proprietary interfaces and may "screen scrape" results returned as HTML documents, as well as managing authorisation and authentication, and results merging and presentation. Service providers are confronted by the complexity of managing multiple interfaces and their possible instability; content providers by issues of efficiency, access control and appropriate results presentation.

The NISO Metasearch Initiative has brought together stakeholders to identify the problem areas and seek common approaches, so that service providers can offer more effective and responsive services; content providers can deliver enhanced content and protect their IPR; and libraries can distinguish their services from other Web search services. Task groups are working in three areas: access management, collection and service description, and search and retrieval. UKOLN is contributing to Task Group 2, specifically in the area of collection-level description.

The JISC IE Metadata Schema Registry

UKOLN and ILRT (University of Bristol) are the main partners in a project to develop a metadata schema registry as a pilot 'shared service' for the JISC Information Environment. The project is funded by JISC's Shared Services Programme, and CETIS and Becta are supporting the work as 'contributing partners'.

The metadata schema registry (IEMSR) will provide services based on information about the metadata vocabularies used for resource description within the UK learning, teaching and research communities. The work will build on the experience of developing schema registries in the earlier CORES, MEG Registry, SCHEMAS and Desire projects.

The IEMSR aims to improve the disclosure and discovery of information on metadata terms and also on how those terms are deployed within applications. This should facilitate the re-use of existing solutions and reduce the duplication of effort, as well as contributing to improved semantic interoperability.

As in the case of the other shared services in the IE, the intention is that the IEMSR provides what the IE technical architecture describes as 'structured' network services, services that are accessed by software applications rather than by human readers. However, at the present time, the exchange of metadata between applications within the IE is based primarily on prior co-ordination between the providers of those services, and it is likely that the provision of human-readable interfaces to the IEMSR - a 'metadata vocabulary portal' function - will be of considerable importance for the foreseeable future.

Minerva Technical Guidelines for Digitisation Programmes

The Minerva Project was funded under the European Commission's IST 5th Framework Programme and has recently been extended under the 6th Framework Programme. Its aim is to develop a network of ministries to discuss and harmonise activity in the area of digitisation of cultural and scientific content. The UK partner in Minerva is the Museums, Libraries and Archives Council (MLA), and UKOLN has contributed to the work package on interoperability and service provision, particularly in the editing of Minerva's Technical Guidelines for Digital Cultural Content Creation Programmes.

Tap into Bath

Archivists, librarians and museum curators in Bath have all been working on a new resource to record all the collections held in the city - Tap into Bath. This cross-domain and cross-sector collaboration began when the public and academic libraries discussed the possibility of using a set of static Web pages to describe their joint resources. A consultation with UKOLN about options led to the proposal that collection description metadata should be used to create an online database and the scope was widened to include archives and museums.

Recognising the many benefits to be obtained from supporting such work, Bath University Library and Collection Description Focus, based at UKOLN, provided staff time and small-scale funding to the project. From these modest beginnings the database and interfaces are now reaching completion, based on open source software and the appropriate standards. Collection description was founded on the 'de facto' standard - the RSLP Collection Description Schema.

The process of data collection included consultation with the organisations involved. This alone proved very informative for participants; for example, the public library has now identified 29 separate sub-collections as a result. The database will include a range of resources - libraries academic, public, private and professional, museums from varying backgrounds, and more. The project intends to offer the open source-based software for use by others with acknowledgement. (See article of the same name in *Ariadne* issue 40.)

Work Begins on AACR3

Earlier this year Ann Chapman of UKOLN was invited to join the CILIP/BL Committee on the Anglo-American Cataloguing Rules (AACR) as a Chartered Institute of Library and Information Professionals (CILIP) representative. CILIP and British Library representatives provide the UK view on proposed revisions to the Rules to balance the North American view. Changes are issued as annual updates to the current version of the Rules, AACR2. The last changes to AACR2 will be those contained in the 2005 update. Work is about to start on a new edition of the Rules, AACR3, with a planned publication date of 2007.

Virtual Walk-throughs for ARCO Showcases

The Augmented Representation of Cultural Objects Project (October 2001 - September 2004), funded by the EU's IST Programme, has seven partners, with the University of Sussex co-ordinating and the Sussex Archaeological Society and Victoria and Albert Museum acting as pilot sites.



The project aims to develop techniques for the capture, virtual representation and manipulation of cultural objects and artefacts. UKOLN has been leading the work involved in co-ordinating and specifying user requirements from the museums and technical partners. UKOLN has also been involved in providing technical advice with regard to the metadata requirements of the project. With its partners, UKOLN has completed specification of the ARCO Metadata Schema (AMS). The AMS consists of metadata for resource discovery, curatorial description and technical data related to the digital representation of museum artefacts. It draws on standards such as Dublin Core and mda's SPECTRUM.

The final year of the project has focused on integration of ARCO components, assessment, evaluation and marketing at various exhibitions and conferences, e.g. the Museum and Heritage Show and EVA 2004. Showcases demonstrating various parts of ARCO technology, including virtual walk-throughs and interaction through augmented reality applications, have been developed specifically for this purpose.

The Annual Institutional Web Management Workshop

The eighth annual Institutional Web Management Workshop was held at the University of Birmingham over 27-29 July. The event provided an opportunity for delegates to hear case studies on how institutions had addressed issues such as the deployment of an integrated Web strategy, a portal service and an intranet. They also received information on new services such as OSS Watch (the Open Source Advisory Service) and updates on emerging technologies such as Blogs and Wikis.

The event also provided 18 parallel sessions which, together with the discussion groups, ensured delegates could actively contribute to the proceedings. The social events, including a narrow boat trip to Birmingham city centre, ensured that, despite some organisational problems including a missing bus driver, the delegates found the event both productive and enjoyable.



QA Focus

The JISC-funded Quality Assurance (QA) Focus Project finished on 31 July. The project, which was run by UKOLN and AHDS (Arts and Humanities Data Service), sought to ensure that project deliverables from JISC's digital library programmes were widely accessible, interoperable and could be easily deployed into service. During its lifetime the QA Focus project:

- developed a QA methodology for digital library programmes
- published a wide range of briefing documents and case studies
- produced a self-assessment online toolkit.

The approach taken by the QA Focus team has been described in several peer-reviewed publications; presentations have been given at three international conferences. The QA Focus resources are available on the QA Focus area of the UKOLN Web site. In order to maximise the impact of the methodology and resources, we are seeking to make the resources available under a Creative Commons licence. Having gained an understanding of a quality assurance methodology which we feel is suitable for the JISC community, we are now seeking to embed the approaches in our work for the wider community.

Message from the Editor

Welcome to **focus**, the newly designed UKOLN Newsletter, which contains a variety of news, opinion and comment from my colleagues within UKOLN. All authors and references, including sometimes lengthy urls have been located at <http://www.ukoln.ac.uk/focus/> My thanks to my UKOLN colleagues for their contributions and, in particular, Shirley Keane for all her work on the **focus** design.



I take this opportunity to remind you that UKOLN publishes *Ariadne*, a Web magazine for information professionals in archives, libraries and museums in all sectors. The Summer Issue, no. 40 is now available. Kindly note that no. 41 will contain articles on VRVS and ISBN-13 by the authors of the items in this **focus**.