

Directory
of
Open Access Education and Training Opportunities



By
Shalini Urs
Executive Director and Professor
International School of Information Management
University of Mysore

Submitted
To
UNESCO

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Table of Contents

	Page
Executive Summary	4
Chapter 1: Understanding Open Access: Ideology and Economics	9
Chapter 2: Present Study : Approaches and Methods	18
Chapter 3: Open Access: Lay of the land	20
Chapter 4: OA Education and Training: Review of programmes	22
Chapter 5: Model Syllabus for a Course on OA	38
Chapter 6: OA Education and Training Opportunities	41
Chapter 7: Conclusions and Recommendations	43
References and Bibliography	45
List of Appendixes	
Appendix 1: SPARC-OA Forum Listing (key players)	47
Appendix 2: Sample of Discussions (some examples)	53
Appendix 3: Digital Library Course Listing	55
Appendix 4: Digital Library Course Listing – India	57
Appendix 5 : Details of the OA Workshops	59

Executive Summary

In the context of scholarly publishing, Open Access (OA) is a term widely used to refer to unrestricted online access to articles published in scholarly journals. It is also a passionately discussed topic for a decade and a half. It is an ongoing movement with many advocates and proponents unfalteringly championing the cause. OA movement is aligned with the overarching Millennium Development Goals (MDP) and its focus on bolstering human capital and the World Summit on the Information Society's goal of building open and inclusive knowledge societies. To achieve the goal of open and inclusive knowledge societies, different approaches and strategies have been adopted by agencies and organizations including intergovernmental agencies such as UNESCO and others. UNESCO supports OA for the benefit of the global flow of knowledge, innovation and equitable socio-economic development. Its Constitution, written long before the advent of digital publishing, mandates: UNESCO should 'maintain, increase and diffuse knowledge, by assuring the conservation and protection of the world's inheritance of books, works of art and monuments of history and science' (Constitution, art, 1.2 c). UNESCO's open suite strategy primarily includes the Open Educational Resources (OER); Open Access to scientific literature (OA); and Free and Open Source Software (FOSS). According to Peter Suber, a strong votary of the OA movement, open access to scientific literature refers to the literature that is digital, online, free of charge, and free of most copyright and licensing restrictions.

An examination of the landscape of OA reveals that the field is predominately led by ideology and ideological fervor at one end of the spectrum and fuelled by the possibilities of the technologies, tools, and mechanisms of building repositories at the other end. Spurred by the ideological fervor and availability, ease, and convenience of OA tools such as the depository software (DSpace, Eprints, Greestone, Fedora, and others), Journal Publishing software such as the Open Journal Software (OJS) and attendant tools and mechanisms such the OAI-PMH (Open Archives Initiative-Metadata Harvesting Protocol), OA has taken deep roots in the academe in



the form of many a initiatives including OA repositories across the globe. Many fora and organizations such as Open Archives Initiatives (OAI); Scholarly Publishing and Academic Resources Coalition (SPARC); SHERPA: Securing a Hybrid Environment for Research Preservation and Access project along with its funders, partners in the UK, EIFL (Electronic Information for Libraries) initiative, the Open Society Foundations' initiatives including the Budapest Open Access Initiative (BOAI) ; Open AIRE (Open Access Infrastructure for Research in Europe, under the European Commission's Seventh Research Framework Programme); and institutions that organize science and access to scientific information such as the International Network for the Availability of Scientific Publications (INASP) and others have given momentum to the OA movement and achieved sustained interest.

In terms of public policy perspective, OA has been hugely successful with many organizations and institutions espousing, drafting and adopting OA policies. Important milestones in this global debate were the Budapest Open Access Initiative (2002), *Berlin Declaration on Open Access to Knowledge in the Sciences and Humanities* (2003) and the *Salvador Declaration on Open Access* (2005). More and more funding agencies make OA publishing a prerequisite for their support. Universities across the world are urging scholars to disseminate their publications via freely available repositories. Another indicator of the success of OA is in terms of number of universities and agencies that have mandated the OA. Libraries, publishers and governments continue to reflect upon adequate policies and help promote and support the policy development.

Since the earliest OA repository the arXiv (www.arxiv.org) developed by Paul Ginsparg and launched in 1991 thousands of repositories around the world have emerged. A look at the open access map (<http://www.openaccessmap.org>) reveals that OA repositories are across the world, though concentrated primarily in the European region.

Despite these tremendous achievements in terms of advocacy, awareness rising, institutional and public policies, and implementations in terms of repositories and rise of OA journals,



training opportunities have remained one of the untapped terrains of OA movement. An examination of the OA scene reveals that OA training has primarily followed the route of short-term workshops on awareness rising; sensitization/orientation programmes/capacity building in OA and building repositories (mostly) by deploying one or the other Open Source software such as DSpace or EPrints or Greenstone and in some cases in Open Access Journals software. The other meetings and workshops have been primarily focused on very high-level workshops and meetings of champions and advocates.

A desktop study of the OA training opportunities has been carried out to understand the lay of the land and explore the opportunities. Our study adopted the following methods: collection of information based on web search; doing a Google search for all possible keywords (Open Access/OA/Digital Libraries/Scholarly Publishing/Journal Publishing/ eScholarship); carrying out an analysis of the SPARC OA forum to identify the main advocates of OA and the topics of discussion; further analysis of the advocates who are active in the OA Forum to identify the areas/disciplines to which the proponents belong; reaching out top players in the OA domain to know more about the OA Training opportunities (a kind of Delphi study). Fifty digital library course contents were studied to examine the OA component. Our study also involved an analytical and comparative study of the syllabus of OA training programmes. We have also developed a model syllabus for OA.

OA Education and Training opportunities may be categorized as three kinds/levels – (1) formal courses on OA that are part of a graduate level degree programs; (2) formal programs that include significant OA component (such as Digital Library (DL) Courses; Scholarly Publishing/ePublishing courses at the universities); and (3) Short Term Training programmes. The findings of the study confirm the hypothesis that though thousands of training workshops have been conducted (supported with funding from some agency or self-supported), formal full-fledged educational programmes in OA are a handful. While one can conclude that these regular/one-off training workshops have laid the foundations for capacity building especially

amongst the library communities in developing countries, we should also acknowledge the fact that perhaps there is an urgent need to introduce formal courses at various levels.

Perhaps one of the most comprehensive and well-structured formal graduate level programmes on OA is at the University of British Columbia (UBC), Canada. The course (LIBR 559K: Topics In Computer-Based Information Systems: Open Access) by Heather Morrison was first taught in May 2007 and has been conducted not so regularly and according to Morrison, the course has been very popular. About 50-69 students have taken it, so far. Another course also taught by Morrison at UBC is also a full course on OA though from a scholarly publishing perspective (IBR 559L: Topics in Computer Based Information Systems: Issues in Scholarly Communications). Mention must be made of other three courses: “Seminar in Information Science: The Open Movement and Libraries” (LIBR287-06/LIBR287-15) by Ellyssa Kroski, Fall 2008 at San Jose State University; Stanford University, School of Education EDUC 358X WINTER 2008 course “Developments in Access to Knowledge and Scholarly Communication by John Willinsky; The proposed course at University of Torino, Italy “Open Access: logiche e strumenti, by Elena Giglia in the Fall 2011 (In Italian); and proposed one at Nicolaus Copernicus University and Akademia Gorniczo-Hutnicza – University of Science and Technology with financial support from EIFL (in Polish)

A study of some of courses with significant OA component was also carried out. An examination of the more than fifty digital library and ePublishing courses taught in different universities across the world revealed that these courses do have varying degrees of OA component. However, the focus is primarily on the software. Our study found that these courses are primarily focused on building capacities in the technologies of OA, rather on the principles, issues, and theoretical underpinnings of OA. These DL courses also touched upon the copyright issues and in this context introduced the OA movement.

The short term training programmes are all over the place and are run by many different kinds of organizations. Some of the leading players in the short-term training programmes include the Programme for the Enhancement of Research Information (PERii), by INASP, which is

working with, and in, developing countries to strengthen their ability to carry out their own research and contribute to the global knowledge network, SPARC, OpenAIRE, and EIFL. UNESCO supported programmes have also been one of the leading training initiatives to build capacities in the OA.

Based on the desktop study, we conclude that the opportunities for OA training are huge and our efforts towards capacity building need to go beyond short-term training programmes. Secondly, given the central role library professionals play in the OA domain, perhaps there is an urgent need to begin a campaign to introduce full-fledged OA courses for future library professionals as part of the Masters Degree programs in Library and Information Science. One other important stakeholder community is the community of researchers. We need to also explore the possibilities of introducing OA course for Ph.D students and awareness and training programmes for the researchers. The curriculum for the OA training programmes also need to be comprehensive and well-structured with the objective of training people in the philosophy and pragmatics of OA including the economics and legal issues. It is time we look beyond software for OA Training.

This Report is divided into following chapters:

1. Understanding OA: Ideology and Economics
2. Present Study: Methods and Approaches
3. Open Access: Lay of the land
 - a. Main players and their educational and organizational affiliations
 - b. OA: Topics of discussion and issues and challenges
4. OA Education and Training: a review of the programs
 - a. Full-fledged Programs on OA
 - b. Programs with significant OA Components
 - c. Short Term OA Training Programs
5. OA: A model Syllabus
6. OA Education and Training opportunities
7. Conclusions and Recommendations

List of Appendixes:

- a. Appendix 1: SPARC-OA Forum Listing (key players)
- b. Appendix 2: Sample of Discussions (some examples)
- c. Appendix 3: Digital Library Course Listing
- d. Appendix 4: Digital Library Course Listing – India
- e. Appendix 5 : Details of the OA Workshops



Chapter 1

Understanding Open Access: Ideology and Economics

Introduction

In the context of scholarly publishing, Open Access (OA) is a term widely used to refer to unrestricted online access to articles published in scholarly journals. It is also a passionately discussed topic for a decade and a half. It is an ongoing movement with many advocates and proponents unflinchingly championing the cause. OA movement is aligned with the overarching Millennium Development Goals (MDP) with its focus on bolstering human capital and the World Summit on the Information Society's goal of building open and inclusive knowledge societies. To achieve the goal of open and inclusive knowledge societies, different approaches and strategies have been adopted by agencies and organizations including intergovernmental agencies such as UNESCO and others.

UNESCO supports OA for the benefit of the global flow of knowledge, innovation and equitable socio-economic development. Its Constitution, written much before the advent of electronic publishing, mandates: UNESCO should 'maintain, increase and diffuse knowledge, by assuring the conservation and protection of the world's inheritance of books, works of art and monuments of history and science' (Constitution, art, 1.2 c). UNESCO's open suite strategy primarily includes the Open Educational Resources (OER); Open Access to scientific literature (OA); and Free and Open Source Software (FOSS). According to Peter Suber, a strong votary of the OA movement, open access to scientific literature refers to the literature that is digital, online, free of charge, and free of most copyright and licensing restrictions.

The world of scholarship and Scholarly communication

The scholarly communication and publishing world is said to date back to ancient Greece when students of Plato regularly sold or rented transcripts of their master's lectures and research (Mason, 2011). The scientific journal publishing dates back to the Oldenburg days. Oldenburg founded and edited the *Philosophical Transactions*, the world's oldest scientific journal. Oldenburg and Royal Society have impacted and shaped the intellectual world especially its scientific aspects. Oldenburg during 1655 to 1661 not only learnt the art of Science communication but laid the framework of scientific authority. From the beginning, journal publishing has been tied to the very culture of scientific research and as a competitive quest for "scientific authority" (Bourdieu, 1976). Though a scientist does not ground his/her authority solely on published articles or books; institutions, titles, positions, committees, prizes, and of course the branding of journals all play a role in the building of personal authority. This has been in keeping with the tradition that had prevailed in the Republic of Science from its beginnings in the late 16th and early 17th centuries (Guedon, 2011). Scholarship, scholarly communication, and authority have remained closely intertwined since the beginning of



modern Science and journals in the seventeenth century till date and have been the bell weather of scientists and Science.

The Business of Journal Publishing

The current scholarly publishing system has evolved over the centuries. The stakeholders of the scholarly communication system include the researchers/academics/scientists as authors and consumers; scientific societies, academies and such institutions as vanguards; librarians as facilitators; publishers/publishing industry stepping in as the quintessential broker, with a fairly acceptable business model (till recently).

The business model of scholarly publishing began to be questioned following the phenomena of “serials pricing crisis” in the nineteen eighties and nineties. Tenopir and King (1997) in their excellent review of the development of scholarly publishing in the United States, presented evidence showing that the average institutional price of a scholarly journal subscription increased from \$39 in 1975 to \$284 in 1995, a factor of 7.3 in just twenty years. Based on these figures, Tenopir and King conclude that: "It is clear that traditional scholarly publishing is in serious economic difficulty". Many argued that journal publishing is largely monopolistic organizations in that they are not governed by market forces and have a specialized clientele.

The emergence of electronic formats in the 1990s began to impact the journal publishing scene, especially libraries and publishers in numerous ways: by enabling new business and pricing models, altering existing revenue sources, revamping workflows and processes, and introducing new kinds of publications. Stevan Harnad (Harnad and de Kemp, 1997), pioneering publisher of the first peer reviewed all electronic journal *Psycoloquy*, argued that electronic publishing is the logical way to address the spiralling costs and glacial prices of print journals. He began advocating for electronic journals to save the industry from collapsing under its own ballooning prices and circulated a “subversive proposal” to force the publishing industry to better serve scholarship. ***In a sense this was to be the beginning of the Open Access Movement.***

The Business and Morality of OA

The arguments for OA are not only on grounds of simple economics but also morality. Open access proponents make compelling economic arguments to justify the business model — it costs less, it guts profit-seeking publishing conglomerates, it makes papers affordable to people who couldn't otherwise afford them, it provides research back to taxpayers — while also arguing that open access is morally superior for some of the same reasons (Kent Anderson, 2011). Aligned to the open source and open content movements, OA has been hugely successful in different ways. Every player in the journal publishing field has tried to embrace the OA movement in some way or the other. As John Willinsky (2009) says the stratified scholarly publishing market can be roughly grouped among independent journals, scholarly society publishers, and commercial publishers and each of these three market segments have been experimenting with forms of open access that hold promise for sustaining, if not extending, the segment's market position.



To a certain extent the moralistic high grounds of OA advocates stems from the notion of gift economy in academia, while the journal publishing industry works on the principle of market economy. A gift economy (or gift culture) is a society where valuable goods and services are regularly given without any explicit agreement for immediate or future rewards (i.e. no formal quid pro quo exists). “The organization of a gift economy stands in contrast to a barter economy or a market economy. Informal custom governs exchanges, rather than an explicit exchange of goods or services for money or some other commodity” (Wikipedia).

OA: Ideology and Supporting Landscape

OA is considered a key part of the greater revolution in knowledge generation and distribution allowed by the expansion of information and communication technologies (ICTs). It is believed to have the potential to empower individuals, communities and institutions, contributing to economic and social development and wealth in the patterns proposed by the information society. OA is an appropriate model for knowledge transfer and empowerment based on the following premises:

- Knowledge, especially scientific and technological knowledge fuels economic growth and hence growth, prosperity, and welfare
- The full and open availability of scientific data on an international basis, and the open publication of results are cornerstones of basic research
- By sharing and exchanging data with the international community and by openly publishing the results of research, all countries (developed as well as emerging) (Bits of Power: Issues in global access to scientific data, http://www.nap.edu/openbook.php?record_id=5504&page=17)
- The Internet opened the possibility of breaking barriers of space, time and money
- The Republic of Science — publishing for the sake of sharing and credentialing, and building authority and a new technology — the Internet can be converged to make possible an unprecedented public good of knowledge
- The academe can and should reclaim its hold on scholarship and scholarly communication

An examination of the landscape of OA reveals that the field is predominately led by ideology and ideological fervor at one end of the spectrum and fuelled by the possibilities of the technologies, tools, and mechanisms of building repositories at the other end. Spurred by the ideological fervor and availability, ease, and convenience of OA tools such as the depository software (DSpace, Eprints, Greestone, Fedora, and others), Journal Publishing software such as the Open Journal Software (OJS) and attendant tools and mechanisms such the OAI-PMH (Open Archives Initiative-Metadata Harvesting Protocol), the OA has taken deep roots in the academe in the form of many a initiatives including OA repositories across the globe.

The OA Movement and the Organizational Framework of Support

The OA movement has been a success and is sustained primarily by scholars/academics who are fuelled by the ideology and the indignation of being held to ransom by the publishing industry and the library and information professionals who are driven by the contingencies of



library budgets and redefining and repositioning of their roles. The LIS (Library and Information Profession) has played the midwifery role in the birth of OA movement. Technology has been the trigger and the catalyst in the shifting sands of scholarly communication system and models.

Many a fora and organizations such as Open Archives Initiatives (OAI); Scholarly Publishing and Academic Resources Coalition (SPARC); SHERPA: Securing a Hybrid Environment for Research Preservation and Access project along with its funders, partners in the UK, EIFL (Electronic Information for Libraries) initiative, the Open Society Foundations' initiatives including the Budapest Open Access Initiative (BOAI); Open AIRE (Open Access Infrastructure for Research in Europe, under the European Commission's Seventh Research Framework Programme) ; Open Access Scholarly Publishers Association, OASPA; The Confederation of Open Access Repositories (COAR) ; CERN, the European Organization for Nuclear Research; and institutions that organize science and access to scientific information such as the International Network for the availability of Scientific Publications (INASP) and others have given momentum to the OA movement a continued and sustained interest.

The Two Flavours of OA: Gold and the Green Route

To make possible an unprecedented public good of providing unrestricted access to scholarly literature, two complementary strategies are followed: Self Archiving and Open Access Journals often referred to as the Green and Gold routes respectively.

- **Self-Archiving (Author Self Archiving):** Scholars deposit their works in repositories that help them with tools and assistance to deposit their refereed journal articles in open electronic archives, a practice commonly called, self-archiving. If the principle and protocols of Open Archives Initiative are adhered to then search engines easily find these literature and users then need not know which archives exist or where they are located in order to find and make use of their contents.
- **Open-access Journals:** Second route is similar to the traditional journals except that these journals are free to access by the users. A new breed of journals emerged called the OA Journals that use different strategies to bring the fruits of scholarship to society. Believing that journal articles should be disseminated as widely as possible, these new journals neither invoke copyright to restrict access to and use of the material they publish nor charge a fee. Believing that price is a barrier to access, these OA journals do not charge subscription or access fees, and in turn use other methods for covering their expenses. There are many alternative sources of funds for this purpose, including the foundations and governments that fund research, the universities and laboratories that employ researchers, endowments set up by discipline or institution, friends of the cause of open access, profits from the sale of add-ons to the basic texts, funds freed up by the demise or cancellation of journals charging traditional subscription or access fees, or even contributions from the researchers themselves.



Business Models of OA Journals

While OA is driven by the ideology of removing barriers of ‘Access’ and ‘Reach’, the question of economics naturally comes up. In scholarly publishing, there are many business models for OA journals. Currently OA journals are recovering their costs in various ways. SPARC has published a new guide called *Who pays for Open Access?* (<http://www.arl.org/sparc/media/09-1008.shtml>). The guide is intended to provide, "an overview of income models currently in use to support open-access journals, including a description of each model along with examples of journals currently employing it".

The income models capable of sustaining open access to scholarly publication are:

- Article processing fees
- Advertising
- Sponsorship
- External subsidies
- Institutional subsidies
- Government funding
- Donations and in-kind support
- Income from offline media.

OA: Coming of Age and the Growth Story

Based on the evidence provided by Laakso, et al (2011) in a recent study of open-access publishing, and responses of many advocates of OA such as Peter Suber and others, John Whitefield in a recent write up in Nature News says that “ Open Access has come of age” (<http://www.nature.com/news/2011/110621/full/474428a.html>). Laakso et al divide the history of open access into three phases -- first phase as the **pioneering years** of 1993–99, during which most open-access journals were home grown efforts, set up by individuals and hosted on university servers. Next are the **innovation years**, (1999-2005) which saw the birth of publishers such as the Public Library of Science and of software infrastructure that makes it much easier to launch a digital journal. Since 2005, innovation has slowed but growth continues — the **consolidation** phase.

According to Laakso et al., the number of papers in freely accessible journals is growing at a steady 20% per year. This recent study also found that the number of fully OA journals is growing at around 15% every year as against subscription journals that are growing at about 3.5%. As more and more OA journals are founded and subscription journals switch to the OA model, it appears that the OA movement is getting stronger and not slowing down.

OA Policies and Mandates

In terms of public policy perspective, OA has been hugely successful with many organizations and institutions espousing, drafting and adopting OA policies. Important milestones in this global debate were the Budapest Open Access Initiative (2002), *Berlin Declaration on Open Access to Knowledge in the Sciences and Humanities* (2003) and the *Salvador Declaration on Open Access* (2005). More and more funding agencies make OA publishing a prerequisite for



their support. Universities across the world are urging scholars to disseminate their publications via freely available repositories. Table 1 below provides the details of various mandates and declarations of OA from across the government, intergovernmental, university, professional organisations and groups.

Table 1: OA Mandates and Declarations

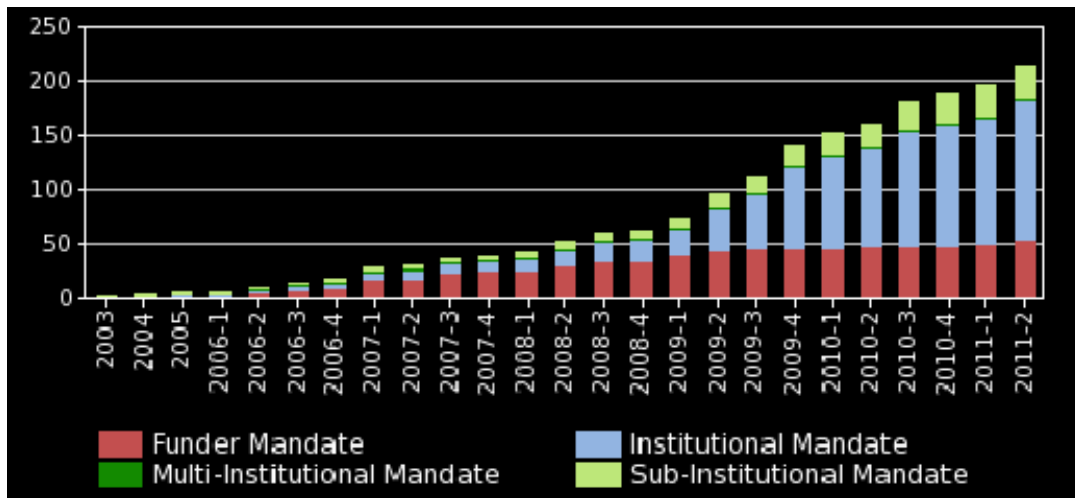
Year	Major OA Policies
1991	The "Bromley Principles" Regarding Full and Open Access to "Global Change" Data. By Allan Bromley, published in Policy Statements on Data Management for Global Change Research from the U.S. Office of Science and Technology Policy. (http://www.gcrl.org/USGCRP/DataPolicy.html)
1996	The Bermuda Principles. Adopted at the International Strategy Meeting on Human Genome Sequencing. (http://www.ornl.gov/sci/techresources/Human_Genome/research/bermuda.shtm)
2000	Declaration from the United Nations Economic and Social Council. The declaration called for "universal access to knowledge and information" (Section 15).
	Association of Research Libraries (ARL): Tempe Principles For Emerging Systems of Scholarly Publishing.
2001	Declaration of Havana Towards Equitable Access to Health Information, CRICS, Cuba (http://crics5.bvslud.org/l/declara.htm)
2002	Budapest Open Access Initiative (BOAI) by the Open Society Institute
	The Montreal Declaration on Free Access to Law, World Legal Information Institute (http://www.worldlii.org/worldlii/declaration/montreal_en.html)
2003	The Fort Lauderdale Statement. (Wellcome Trust) (http://www.wellcome.ac.uk/stellent/groups/corporatesite/@policy_communications/documents/web_document/wtd003207.pdf)
	The Bethesda Statement on Open Access Publishing. Meeting of Howard Hughes Medical Institute. (http://www.earlham.edu/~peters/fos/bethesda.htm)
	The Beijing Declaration on scientific advancement, openness, and cooperation (the Third World Academy of Sciences) (http://users.ictp.it/~twas/pdf/Beijing_Declaration.pdf)
	The Berlin Declaration on Open Access to Knowledge in the Sciences and Humanities. From the Max Planck Society and European Cultural Heritage Online.
	WSIS Declaration: UN World Summit on the Information Society, Declaration of Principles and Plan of Action.
2004	OECD Declaration on Access to Research Data From Public Funding (http://www.oecd.org/document/0,2340,en_2649_34487_25998799_1_1_1_1,00.html)
	IFLA Statement on Open Access to Scholarly Literature and Research Documentation (http://www.ifla.org/V/cdoc/open-access04.html)
	DC Principles Coalition. http://www.dcprinciples.org/statement.htm
	The ALPSP Principles of Scholarship-Friendly Journal Publishing Practice. (http://www.alpsp.org/ForceDownload.asp?id=126)
	Australia's eight leading research universities -Statement on open access to scholarly information (http://www.go8.edu.au/news/2004/Go8_Statement_on_open_access_to_scholarly_information_May_85.pdf)
	The Declaration from Buenos Aires On information, documentation and libraries. (http://www.inforosocial.net/declaration.html)
	The Scottish Declaration of Open Access. From the Scottish Science Information Strategy Working Group (http://scur.ac.uk/WG/OATS/declaration.htm)
	The Messina Declaration. From 32 Italian university rectors. A statement of Italian university support for the Berlin Declaration. (http://www.aepic.it/conf/viewappendix.php?id=49&ap=1&cf=1)
	The Conservation Commons Statement of Principles calling for open access to biodiversity data and knowledge. From third IUCN World Conservation Congress (http://antbase.org/ants/publications/conservation_commons.pdf)
	Vienna Declaration: 10 Theses on Freedom of Information. (http://www.chaoscontrol.at/2005/we_english.htm)
2005	Salvador Declaration on Open Access: The Developing World Perspective. (http://www.icml9.org/meetings/openaccess/public/documents/declaration.htm)
	The São Paulo Declaration in Support of Open Access. From IBICT (Instituto Brasileiro de Informação em Ciência e Tecnologia). (http://www.ibict.br/noticia.php?id=176)
	ERCIM Statement on Open Access (European Research Consortium for Informatics and Mathematics) [www.ercim.org/publication/Ercim_News/enw64/ercim-oa.html]
2006	The Rio Declaration on Open Access. (The iCommons iSummit for 2006) (http://icommmons.org/declarations/the-rio-2006-declaration-on-open-access/)
	The Riyadh Declaration for Free Access to Scientific and Technical Information. (http://openaccess.inist.fr/article.php3?id_article=129)
	The Declaration of Mexico, recommending open access policies to Latin American universities and governments. (https://mx2.arl.org/Lists/SPARC-OAForum/Message/3495.html)
	The Kronberg Declaration on the Future of Knowledge Acquisition and Sharing. UNESCO High Level Group of Visionaries on Knowledge Acquisition and Sharing. (http://portal.unesco.org/ci/en/files/25109/11860402019Kronberg_Declaration.pdf/Kronberg%2BDeclaration.pdf)
2008	The Cape Town Open Education Declaration. From a coalition of educators and foundations. (http://www.capetowndeclaration.org/)
	The Belgorod Declaration on open access to scientific knowledge and cultural heritage on the university area of border regions of

	Belarus, the Russian Federation and Ukraine. (http://www.eifl.net/cps/sections/services/eifl-oa/docs/belgorod-declaration/downloadFile/file/Belgorod_Declaration.doc?nocache=1246893488.79) The Atlanta Declaration for the Advancement of the Right of Access to Information. From participants in a global conference at the Carter Center (http://www.cartercenter.org/documents/Atlanta_Declaration_and_Plan_of_Action.pdf) The Seoul Declaration. From Civil society organizations participating in the OECD 2008 Ministerial Meeting on the Future of the Internet Economy. (http://thepublicvoice.org/events/seoul08/seoul-declaration.pdf) NKC Statements on Open Access (National Knowledge Commission, India) [http://knowledgecommission.gov.in/downloads/documents/wg_lib.pdf & http://knowledgecommission.gov.in/downloads/documents/wg_open_course.pdf]
2009	The Reclaim The Commons Manifesto. From the participants at the World Social Forum (Belem, Brazil, January 27 - February 1, 2009). (http://bienscommuns.org/signature/appel/?a=appel&lang=en) The Durham Statement on Open Access to Legal Scholarship. From a meeting of law library directors at Duke Law School in Durham, North Carolina, in November 2008. (http://cyber.law.harvard.edu/publications/durhamstatement) The Kigali Declaration on the Development of an Equitable Information Society in Africa. From representatives of the parliaments of 27 African countries and four intergovernmental organizations. (http://info-society.apkn.org/declaration/final-declaration) The Olvio Declaration. From the rectors of 26 Ukrainian universities. (http://www.eifl.net/cps/sections/services/eifl-oa/oa-news/2009_09_08_open-access-to-research) The Amsterdam principles on sharing proteomics data, updating the Bermuda principles (http://www.ncbi.nlm.nih.gov/pmc/articles/PMC2742685/?tool=pubmed) The Toronto Statement on pre-publication data sharing. From participants in the Toronto International Data Release Workshop http://www.nature.com/nature/journal/v461/n7261/box/461168a_BX1.html The Singapore Declaration on Equitable Access to Health Information in the Western Pacific Region. From the participants in the Joint Meeting of the Asia Pacific Association of Medical Journal Editors (APAME) and the Western Pacific Region Index Medicus (WPRIM) (http://www.wpro.who.int/apame/events/Singapore_Declaration_FullText.htm) The Manchester Manifesto. From philosopher John Harris, Nobel-winning biologist Sir John Sulston, and 48 others from the Institute for Science, Ethics and Innovation (iSEI) at The University of Manchester (http://www.isei.manchester.ac.uk/TheManchesterManifesto.pdf)
2010	The Public Domain Manifesto (http://www.publicdomainmanifesto.org/node/1) The CIARD Manifesto: Towards a Knowledge Commons on Agricultural Research for Development. From CIARD (Coherence in Information for Agricultural Research for Development). (http://www.ciard.net/ciard-manifesto) The Panton Principles for Open Data in Science. (http://pantonprinciples.org/) The Manifesto for the Digital Humanities. (http://www.digitalhumanities.cnrs.fr/wikis/tcp/index.php?title=Anglais) Cape Town Declaration. CODATA International and the South African National Research Foundation released the Cape Town Declaration on the importance of open data in research. (http://www.codata.org/10Conf/Cape_Town_Declaration.pdf)
2011	The Ghent Declaration, at the meeting to launch OpenAIRE .The authors are Gregor Hagedorn, Frederick Friend, Jean-Claude Guédon, and John Willinsky. (http://www.sparceurope.org/resources/general-advocacy-materials/ghent-declaration)

Open Access Self Archiving Mandate

Another indicator of the success of OA is in terms of number of universities and agencies that have mandated OA. Open Access Self Archiving has been mandated by over 150 universities (and parts of universities) worldwide (for example, in the US, Harvard and MIT, and in the EU, University College, London and ETH Zürich) as well as over 50 research funders (including NIH in the US and RCUK and ERC in the EU). *For those interested in mandate policy, models, and guidance the Open Society Institute's EPrints Handbook, EOS, OASIS and Open Access Archivangelism are good resources.*

ROARMAP: Registry of Open Access Repositories Mandatory Archiving Policies is a source of listing for such policies (<http://roarmap.eprints.org/>). Libraries, publishers and governments continue to reflect upon adequate policies and help promote and support the policy development.



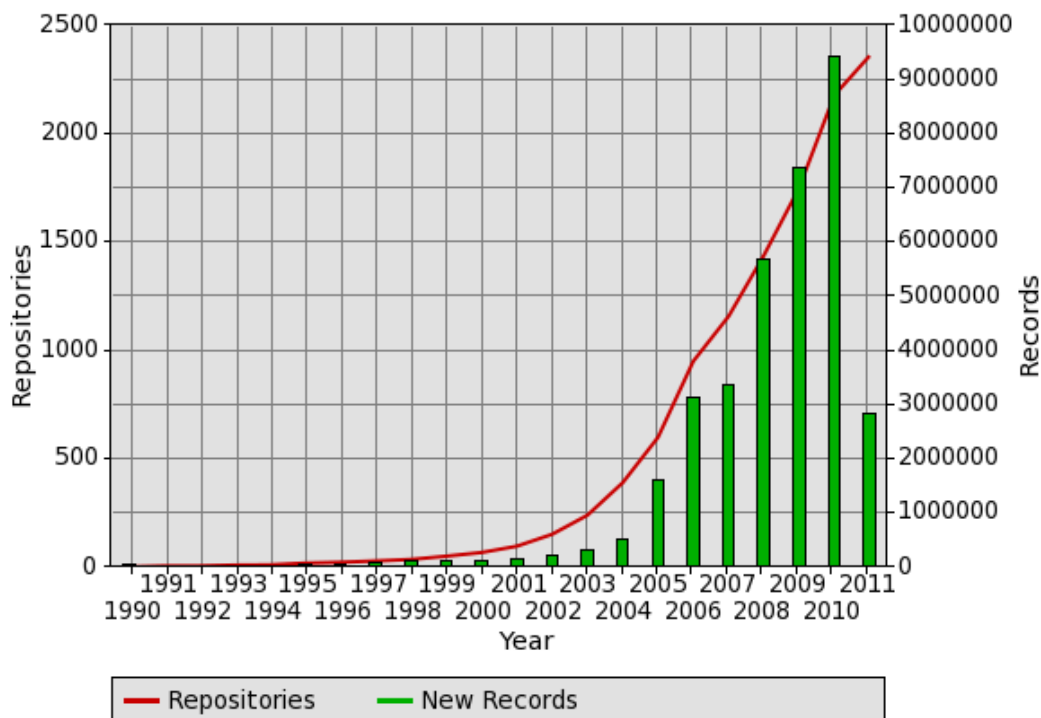
Total Mandates to Date (by type)

Institutional Mandates (131)	Proposed Institutional Mandates (4)
Sub-Institutional Mandates (31)	Proposed Sub-Institutional Mandates (3)
Multi-Institutional Mandates (1)	Proposed Multi-Institutional Mandates (5)
Funder Mandates (52)	Proposed Funder Mandates (8)
Thesis Mandates (82)	

(OA Mandates by type and Date Source: ROARMAP)

Growth of Archives/Repositories and Articles

Since the earliest OA repository — the arXiv (www.arxiv.org) developed by Paul Ginsparg and launched in 1991, to date there are thousands of repositories around the world. According to **ROAR** -- a searchable international **Registry of Open Access Repositories**, to date, there are over 1500 institutional and cross-institutional repositories that have been registered in ROAR. A look at the open access map (<http://www.openaccessmap.org>) reveals that OA repositories are across the world, though concentrated primarily in the European region.



(ROAR growth curve for open access repositories, Aug 1 2011 by Harnard, in Wikipedia)

Conclusions

Within a relatively short span of approximately two decades, the OA voice is heard loud and clear. It has moved from mere rhetoric to actions and enduring repositories and journals. From every account, OA may be declared a success. Both the routes – the Gold and the Green are showing signs of robust growth and sustainability. In some respects 20% market share in 20 years, is certainly not great indeed. There are many reasons for this ‘low market share’. The business models of OA are still being questioned and also there is the perception of ‘quality’ issues. But given the sway of tradition of established journals and their significance to academe and the still untested economics and revenue models of OA, it is heartening to note that the OA has been able to shake up the publishing industry and impact the scholarly publishing landscape like perhaps nothing else before.

Given the landscape and the prospects, perhaps it is time to move beyond the first generation of OA movement and scope the potential and possibilities of OA for the next decade. Given that OA as a domain and field of study has sufficient theoretical foundations and practical knowledge base, and the need for building the human capital in this niche area, it is time for considering the educational possibilities beyond short-term training. Two prominent stake holder groups are present in OA — LIS professionals and Scholars/Researchers. Formal educational programmes for these two groups at appropriate levels need to be scoped.



Chapter 2

Present Study: Approaches and Methods

UNESCO contracted a desktop study of the OA training opportunities and to prepare a directory of OA Training Programmes. Given that it is a desktop study and the mandate was to carry it out in two months, we decided to follow a blend of methods. A desktop study is quite a cost effective method to get some understanding and insights into a phenomenon /domain before deep diving into the field. A desktop study is typically iterative and is based on data/information available in the public domain. It usually also involves some consultations with some key people and informal communications. It is more an impressionistic study and the data may not be comprehensive. The advantage of impressionistic methodology is it gives us a fairly realistic picture based on some cases and sample of data. Just like an impressionistic painting, the picture is quite clear though not necessarily accurate in terms of dimensions.

Our approach primarily consisted of the following:

- The present desktop study is primarily based on information/data available in the public domain (Internet).
- Reaching out to some key players.

The scoping of our study is as follows –

- Study the landscape of Open Access
- Identify the stakeholders and key players (in OA and OA Education and Training)
- Searching and identifying more information
- Studying and Reviewing the blogs/wikis/lists of these key advocates:
 - Peter Suber
 - (http://oad.simmons.edu/oadwiki/Main_Page)
 - <http://www.earlham.edu/~peters/fos/fosblog.html>
 - Stevan Harnard
 - <http://openaccess.eprints.org/>
 - Richard Poynder
 - Open and Shut? (<http://poynder.blogspot.com/>)
 - John Willinsky
 - <http://pkp.sfu.ca/> (PKP Blog)
- Contact some of the key players
 - Peter Suber
 - Alma Swan
 - Stevan Harnard
 - Jean-Claude Guedon
 - Iryna Kuchma
 - Heather G. Morrison



Our study adopted the following methods:

- Given that the mandate was a desktop scoping study and the fact that the topic of study is Open Access, the collection of data/information was primarily web search
- We did an extensive Google search for all possible keywords (Open Access/OA/Digital Libraries/Scholarly Publishing/Journal Publishing/ eScholarship)
- Collated all material on OA
- In addition, like every scholar, followed up on linked references for collecting data
- Identified the main contributors to and the topics of discussion in OA Forums. We chose the SPARC-OA
- An analysis of the advocates who are active in the OA Forum to identify the areas/disciplines to which the proponents belong
- Identified the OA Education and Training Programmes and studied the same for understanding and scoping the OA Training opportunities
- Fifty digital library course contents were studied to examine the OA component.
- Carried out an analytical and comparative study of the syllabus of OA training programs.
- Developed a model syllabus for OA and compared the syllabi of existing OA programs including partial ones

Originally, we had planned on a questionnaire-based study. However, this approach was abandoned, since formal OA Training programmes were less in number and the details of the same could be obtained from the concerned people/sources.

Based on our reaching out to and exchanging mails with the leaders in the OA space, we were able to scope the OA education and training opportunities.

Chapter 3

Open Access: Lay of the land

In order to understand the lay of the land, an analysis of the SPARC OA Forum was carried out. We visited the SPARC OA Forum Archive (<https://arl.org/Lists/SPARC-OAForum/>) and collected data from August 2007 to July 2011 (Appendix 1.) There were 5909 postings/threads in this Listserv. The objective of this analysis was primarily to find evidence in terms of who are the main players and their educational and organizational affiliations, as this would help us to scope the OA education in terms of which target groups to focus OA Training; and topics and trends in OA. SPARC OA Forum is used as a indicative sampler of the OA players and trends. There are many such OA lists, which could not be studied due to the time factor.

Main Players and their Professional and Organizational Affiliations

A total of 138 people had posted 1999 postings to the SPARC-OA Forum. Of these we filtered out those who had posted less than 3 times, which brought the list down to 44 (see Appendix 1). These 44 people had contributed 1877 posts (almost 94 %).

Given that this is Forum of SPARC, it is not surprising that the contributors are predominantly from the North American continent. When we analyze the top 44 contributors to SPARC-OA, we find the composition to be: USA-22; UK-11; Canada-4; Germany /Australia/Sweden/Italy/Spain /Japan/Greece (1 each). The disciplinary orientation/roles of the top 44 people are – librarians (17); Academics (10); publishers (8); OA (7); Media (1).

Based on this we can infer that the key players in the OA Space are primarily from North America, Europe; and some other countries such as Australia and Japan. It is not surprising that LIS professionals and Academics — the two main players, whose stakes are high, dominate OA space. Peter Suber and Steven Harnard dominating the discussions is again no brainer.

Thus our approach of studying the blogs of Peter Suber and Stevan Harnard and also informal method of contacting and getting their comments/suggestions has been justified. Interestingly, there were no posts from the OA journal publishing groups such as PLOS or Open Journal Systems (PKP) (other than Peter Suber). This could be one indication of the differing interests and stakeholders between the Gold and Green Routes of OA. While the involvement and engagement of LIS community in Green OA is dominant, the Gold OA is dominated by scholars and science communicators.



OA: Topics of Discussion and Issues and Challenges

The postings in SPARC-OA Forum indicate that the Forum is mainly an announcement/dissemination platform. It is not much of a debate/discussion platform. Subscribing to these forums would be more for the sake of alerting services and as an informational resource. They serve as useful dissemination platforms. Appendix 1 and 2 provide the complete listing of the active people involved in the SPARC forum and samples of the main topics of discussions.

A closer look at the postings reflects the fact that the 'community' feelings are very strong, and many people use them also to find solutions.

The Forum for example discussed issues such as:

- Pricing policies (Text Books, and everything else)
- Peer Review Process (Innovations, issues etc.)
- Technical Issues (automatic depositing to different repositories)
- Gold vs. Green (whether one is responsible for the slowing of the other)
- Copyright issues (various hues and from all angles)
- Archiving of OA issues (CLOCKSS and others)

Given that one of the current focuses of OA movement is building and sustaining a vibrant and active OA community, the frequency of postings and the nature of messages demonstrate the effectiveness of these kinds of Forums in the following:

- Awareness and news alerting
- Sharing of knowledge and experiences
- Sense of engagement
- Building passion and commitment
- Professionalism
- Practical help and support

We can conclude that the SPARC and other similar fora have contributed significantly to the OA movement by building a strong group of committed OA professionals.

Chapter 4

OA Education and Training: a Review of Programmes

An examination of the OA scene reveals that despite the heated debate, discussions, votaries and humongous amount of information / information resources available, OA formal education and training opportunities are limited. OA education may be categorized as three kinds/levels – (1) formal courses on OA that are part of a graduate level degree programmes: (2) formal programs that include significant OA component (such as Digital Library Courses; Scholarly Publishing/ePublishing courses at universities); (3) Short Term Training programmes. The findings of the study confirm the hypothesis that though thousands of training workshops have been conducted (supported with funding from some agency or self-supported), formal full-fledged educational programmes in OA are a handful. While one can conclude that these regular/one off training workshops have laid the foundations for capacity building especially amongst the LIS community in developing countries, we should also acknowledge the fact that perhaps there is an urgent need to introduce formal courses at various levels.

Formal Courses in OA

Perhaps one of the most comprehensive and well-structured formal graduate level programs on OA is at the University of British Columbia (UBC), Canada. Table 2 gives the list of formal courses on OA.

Table 2: Formal Courses on OA

Sl. No	Course Title	Where	Who	Contact person	Remarks
1	LIBR 559K: Topics In Computer-Based Information Systems: Open Access)	University of British Columbia. School of Library, Archival, and Information Studies http://www.slais.ubc.ca/	Heather Morrison	hgmorris@gmail.com Or hgmorris@sfu.ca	A course being taught since 2007. Quite popular and effective. About 50-69 students have taken it, so far
2	IBR 559L: Topics in Computer Based Information Systems: Issues in Scholarly Communications	University of British Columbia. School of Library, Archival, and Information Studies http://www.slais.ubc.ca/	Heather Morrison		
3	LIBR287-06/LIBR287-15. "Seminar in Information Science: The Open Movement and Libraries"	San Jose State University	Ellyssa Kroski	ellyssakroski@yahoo.com	Fall of 2008
4	EDUC 358X WINTER "Developments In Access To Knowledge And Scholarly Communication"	Stanford University, School of Education	John Willinsky	john.willinsky@stanford.edu	Fall of 2008



5	“Open Access: logiche e strumenti,	University of Torino_Italy	Elena Giglia	elena.giglia@unito.it	Proposed for fall of 2011 and in Italian
6	Open Access: New model of scholarly communication	Nicolaus Copernicus University and Akademia Gornicz-Hutnicza – University of Science and Technology with financial support from EIFL	Iryna Kuchma Of EIFL	iryna.kuchma@eifl.net	Proposed for October 2011

OA Course Contents: An overview

An examination of the available courses on OA reveals that these courses primarily focus on the following:

- Scholarship and Academe frameworks and cultures
- Knowledge Economy and how knowledge is produced and distributed
- Knowledge/scholarly publication principles, processes, paradigms and prevailing systems
- Journal Publication: historical perspectives, current trends and issues
- The concepts and notions of Open Access
- The ideology and economics of Open Access
- People, organisations, and resources of OA
- The technology of distribution of knowledge and information
- Legal Issues of knowledge production and dissemination

Some Examples of Course Contents/Syllabus of Formal OA Education Programmes

LIBR 559K: Topics In Computer-Based Information Systems: Open Access


GOALS: To provide overview of the basic concepts of Open-access. The open access movement is one of the key trends in librarianship today, one that presents librarians and archivists with challenges, but also significant opportunities for leadership. This course will provide students with an overview of open access, key definitions, how and why libraries and archives are involved in open access, trends, policies, and implications for librarians and archivists.

OBJECTIVES: By the end of the course, students will be able to:

- Have a basic understanding of what open access is, and be able to distinguish open access from related trends (such as free access to back issues of journals) (brief overview)
- Understand open access archiving, library and archives involvement, and key issues for librarians and archivists
- Understand open access publishing and its implications and opportunities for libraries
- Know about major open access resources
- Be able to provide assistance and advice to researchers wishing or needing to provide open access to their works
- Have an introduction to the transformative potential of open access

COURSE CONTENT

- Overview and definitions of open access
- Open access publishing (full, hybrids, library as publisher)
- Open access archiving (institutional and disciplinary, library involvement)
- Open access policy and advocacy and library roles
- Futures for open access, and transformative potential of open access

 *By Shalini Urs*

IBR 559L: Topics in Computer Based Information Systems: Issues in Scholarly Communications

GOALS: The goal of this course is to provide students with a broad understanding of scholarly communications, with a particular emphasis on the evolutionary potential of the World Wide Web for scholarly communication and the implications for libraries and librarians, as well as basic practical experience in scholarly publishing and self-archiving.

COURSE OBJECTIVES: Upon completion of this course, students will be able to:

- Understand scholarly communications in historical perspective
- Understand current trends and concepts in scholarly communications
- Understand the evolutionary potential of the world wide web for scholarly communications and scholarship in general
- Understand open access in some depth
- Be familiar with library leadership in change in scholarly communications, particularly local library leadership
- Peer review and edit scholarly journal articles within domains of subject expertise
- Publish a journal using Open Journal Systems (OJS), from developing policies and journal set-up to coordinating peer review and editing to copyediting and layout
- Self-archive own work using D-Space

COURSE TOPICS:

- Scholarship and scholarly traditions
- Scholarly journals and monographs
- Scholarly publishing
- Scholarly communications activities at UBC and SFU
- Open access (definitions, OA archives, OA publishing, OA policies)
- Open journal systems (OJS)
- Synergies
- D-Space
- Author's rights
- Peer review
- Emerging trends and formats in scholarly communication
- Preservation



Stanford University, School of Education EDUC 358X WINTER 2008; DEVELOPMENTS IN ACCESS TO KNOWLEDGE AND SCHOLARLY COMMUNICATION

Course Introduction:

The course will provide a point of critical reflection on, and practical guide to, current developments in access to online sources of knowledge, with a special focus on how people are able to obtain research and scholarly work. It will consider the potential of new communication systems to enhance the educational quality of materials, sources, and scholarship with an eye to how this work is becoming available to a wider public. This new openness has implications for teaching and learning, inside educational institutions, among public institutions such as libraries, and for individual and independent learners. It can help students better understand how to readily find the best work, as well as to position their own scholarly efforts to increase their contribution.

Topics and Classes

1. Introduction to online sources of information and knowledge, including historical background on origins of scholarly journal (Oldenburg, JSTOR).
2. The legalities of intellectual properties: Contracts, copyrights, patents, and other intellectual properties (Benkler, LAWRENCE LESSIG ON YOUTUBE, CREATIVE COMMONS, SCIENCE COMMONS).
3. The university within the knowledge economy (David and Foray, Peters, Bok, ITUNES U, OPENCOURSEWARE, OPEN YALE COURSES).
4. Science's ongoing opening: Open science, open access, open source, open review (Chan et al., Harnad, Nature, Falagas, BIOS.NET, PLOS ONE, SHERPA/ROMEO, DOAJ, PUBLIC KNOWLEDGE PROJECT).
5. The global circulation and postcolonial production of knowledge (Arunachalam, Teferra, HINARI, AGORA, AJOL, BIOLINE).
6. New forms and means for assembling scholarly resources: Archives, scholarly editions, collaborative research sites, data sharing, data-mashups (David, den Besten, & Schroeder; Hodgkinson; Miller; APA, NINES, DARWIN CORRESPONDENCE PROJECT, DIGITAL LOCKE PROJECT, STANFORD ENCYCLOPEDIA OF PHILOSOPHY, DATAVERSE NETWORK, CLEARMAP CRIME INCIDENTS, NETSQUARED).
7. The sharing of learning materials among teachers and students: Open Educational Resources (Cape Town Declaration, Smith, CURRIKI, MERLOT, CK12, CONNEXIONS, NATIONAL HISTORY EDUCATION CLEARING HOUSE).
8. The expanding sphere of public knowledge: Encyclopedias and indexes (Vine, Tenopir, Willinsky (2008), ENCYCLOPEDIA OF LIFE, WIKIPEDIA, STANFORD ENCYCLOPEDIA OF PHILOSOPHY, CITIZENDIUM; CITESEER, GOOGLE SCHOLAR, PUBMED, ERIC, TECHNORATI, FISHBASE, OER COMMONS).
9. New ways and means of sharing knowledge: Blogging, wikis, casts, ebooks (Ross, Toobin, Rich, Buckler, SAVAGE MINDS, DAN COHEN DIGITAL HUMANITIES BLOG, EDUBLOGS, GOOGLE BOOK SEARCH).



LIBR287-06/LIBR287-15. San Jose University “Seminar in Information Science: The Open Movement and Libraries”

Course Description

This course will explore the role and participation of library science and librarians in this movement. This course will give an overview of open-source technologies (such as content management systems and ILS programs) which are being used by libraries today, as well as exploring the open access movement which advocates free online access to scholarly research and journal articles. During the course we will also discuss open courses and learning, open conferences, and open licenses (like GPL and Creative Commons). This practical knowledge will be taught with an eye towards students understanding the implications of open access and what it means for libraries and librarians.

Open Access Objectives

Upon completion of this course, students will:

- Have a basic understanding of what Open Access is.
- Understand OA archiving and key issues for libraries and librarians.
- Understand OA publishing and its implications and opportunities for libraries.
- Know how to access major OA resources, journals, policies, etc.
- Be able to provide assistance to researchers wishing to provide open access to their works.
- Understand current trends in OA policy.
- Know how to self-archive own work in disciplinary repositories.
- Know how to publish an OA journal using OJS from policy development to peer review.
- Have a scholarly article published in a class journal.

Open Education Objectives

Upon completion of this course, students will:

- Understand the current state of the field of Open Education.
- Understand key issues for Open Education such as copyright, licensing, and sustainability.
- Know about major OER and OCW initiatives.
- Understand the role of libraries and librarians in Open Education.

Open Source Software Objectives

Upon completion of this course, students will:

- Have an understanding of the Open Source Software movement.
- Know about major OSS applications and know how to locate OSS programs.
- Have hands-on experience using several OSS programs including Drupal, OpenOffice, and Open Journal Systems.
- Know about the current library-related OSS landscape.
- Understand key issues surrounding OSS implementation in libraries.

Other Objectives

Upon completion of this course, students will:

- Have a basic understanding of copyright and open licenses and their relation to the topics covered in the course.



OAel

Open Access e-learning course for Polish scientific community (acronym: OAel)

Jointly developed and to be implemented by Nicolaus Copernicus University and Akademia Gorniczo-Hutnicza – University of Science and Technology with financial support from EIFL

The goal of the project is to educate Polish research community about Open Access (OA).

This E-learning course will be promoted by the Ministry of Science and Higher Education as a learning resource for LIS students, researchers interested in open knowledge, open science, e-science, and for new activists of OA movement.

The project will raise awareness about OA in Poland and will serve as a professional teaching and learning resource that can be widely re-used.

Course Title: Open Access: New model of scholarly communication”.

Language – Polish

Course structure:

- 1) Four video lectures
- 2) E-learning course on Moodle platform under Creative Commons BY-SA.

The course structure:

- Introduction to OA movement (idea, objectives)
- Introduction to new model of scholarly communication
- Open repositories
- Open journals
- Examples of best practices: open access projects in Poland
- Reading lists (Polish and international sources and open resources)
- Bibliography

Courses with Significant OA component

Table 3: List of Course with significant OA component

Sl. No	Course	University and Date	Instructor	URL
1	INST 7150 Introduction to Open Education	University of Utah, Fall 2007	David Wiley	http://opencontent.org/wiki/index.php?title=Intro_Open_Ed_Syllabus
2	FIS 2309, Design of Electronic Text	University of Toronto. Faculty of Information Studies, Summer 2008	Joan Cherry.	Scroll: Essays in the Design of Electronic Text (the student journal)
3	Open Source, Open Access, Open Education	University of Illinois. Graduate School of Education. March 2009	Michael Peters.	http://gse.ed.uiuc.edu/courses.html
4	EC&I 831 Social Media & Open Education (both for credit as well as non credit)	University of Regina, Canada. Fall 2009 Fall 2010 Fall 2011	Alec Couros.	http://eci831.wikispaces.com/ http://educationaltechnology.ca/couros/1673
5	LIS 457 Digital Publishing	Simmons College, Graduate School of Library and Information Sciences, Regular Offering.	Robin Peek	http://www.simmons.edu/gslis/academics/courses/electives/
6	LIS 421 Social Informatics,	Simmons College, Graduate School of Library and Information Sciences Regular Offering	Robin Peek	http://www.simmons.edu/gslis/academics/courses/electives/
7	LIS 796: Internet Publishing	Dominican University Graduate School of Library and Information Science	Edward J. Valauskas,	www.dom.edu/academics/gslis/programs/pathways/Digital.pdf - 2009-04-22
8	LIS901 Scholarly Communications and Electronic Publishing	School of Education and Information Sciences C.W. Post Campus of Long Island University Fall 2010 (September -December)	John J. Regazzi and Selenay Aytac	http://www.liu.edu/CWPost/Academics/Schools/CEIS/PSLIS/SCILL/~media/Files/CWPost/Academics/CICS/Syllabus_LIS901.ashx

Sample of Courses with significant OA (Dominican University Graduate School of Library and Information Science)

Course description

Each year, approximately 1.5 billion gigabytes of information is created in a variety of formats, or some 250 megabytes for each human on the planet. Increasingly, this information is taking a digital form. This class will allow students to weigh digital options for presenting information to a variety of different audiences, with a special emphasis on Internet-based, scholarly journals as well as scholarly books. Students in particular will examine and participate in the basic production routines of the journal *World Libraries* (<http://www.worlib.org>). Students as well will work on the digitization of a history of the Dominicans in the United States; see *Friar in the Wilderness: Edward Dominic Fenwick, O.P.* at <http://www.worlib.org/friar/>. There will be opportunities to work on the development of these projects on Dominican's Open Journal Systems server. In addition, two other Internet based publications will be examined, the cyberculture scholarly journal entitled *First Monday* (<http://firstmonday.org>) and a book review journal, *Current Books on Gardening & Botany* (<http://www.chicagobotanic.org/book/>).

Objectives

This class will examine how the Internet is transforming the traditional publishing industry. Students will learn how Internet publishing:

- Differs from traditional print, but also shares many commonalities with traditional publishing;
- Affects copyright and the legal relationships between author, publisher, and reader; and,
- Provides a mechanism for the rapid dissemination of information to a global audience at minimal cost, compared to print and other media.



Syllabus

- Introduction and objectives; A brief examination of *World Libraries*; The process of creating scholarly information: *Libri*, *World Libraries*, *First Monday*, *Current Books on Gardening & Botany*, and *Palaeontologia Electronica* as examples. The Open Journal Systems (OJS) server will also be examined in passing, at <http://journals.uic.edu>.
- Scholarly publishing: Historical background and context.
- The significance of scholarly publishing.
- The economical context of digital publishing.
- The economics of digital publishing: Different models.
- The economics of digital publishing: Specific applications.
- Which economic model would you choose?
- Peer review: Objective validation of scholarship for publication?
- The fate of data: Short- and long-term access to research results.
- A brief overview of copyright and the history of scholarly publishing.
- Copyright: The rights of publishers, authors, and readers.
- Protecting copyright vs. Creative Commons.
- Politics of access to scholarship.
- Libraries, universities, and scholarly communication: What are the roles of libraries and librarians in academic and other institutions?

OA as part of other courses (Digital Library/Scholarly Publishing/Electronic Publishing)

An examination of the more than fifty digital library and ePublishing courses taught in different universities across the world revealed that these courses do have varying degrees of OA component. However the focus is primarily on the software. Our study found that these courses are primarily focused on building capacities in the technologies of OA, rather on the principles, issues, and theoretical underpinnings of OA. These DL courses also touched upon the copyright issues and in this context introduced the OA movement.

We identified 38 DL programmes across the world and twelve DL programmes in India (Appendix 3, and 4).

Given the commonality of “Access” imperative and mission of digital libraries and OA, it is reasonable to expect some kind of coverage of OA education and training in the curricula of Digital Libraries. Though it appears that there is some connection between Digital Libraries courses and OA, in terms of course contents, the connection is not very strong except for software issues. Digital Library courses invariably include topics on digital library software such as DSpace, Greenstone and Eprints.

In an earlier paper Pomerantz et al (2006) have carried out an analysis of the core of the DL courses and arrived at the following picture of the topics in Digital Libraries. This indicates that the main common thread between OA and DL are in the areas of ‘collection development’; architectures; and Legal, economic and social issues.

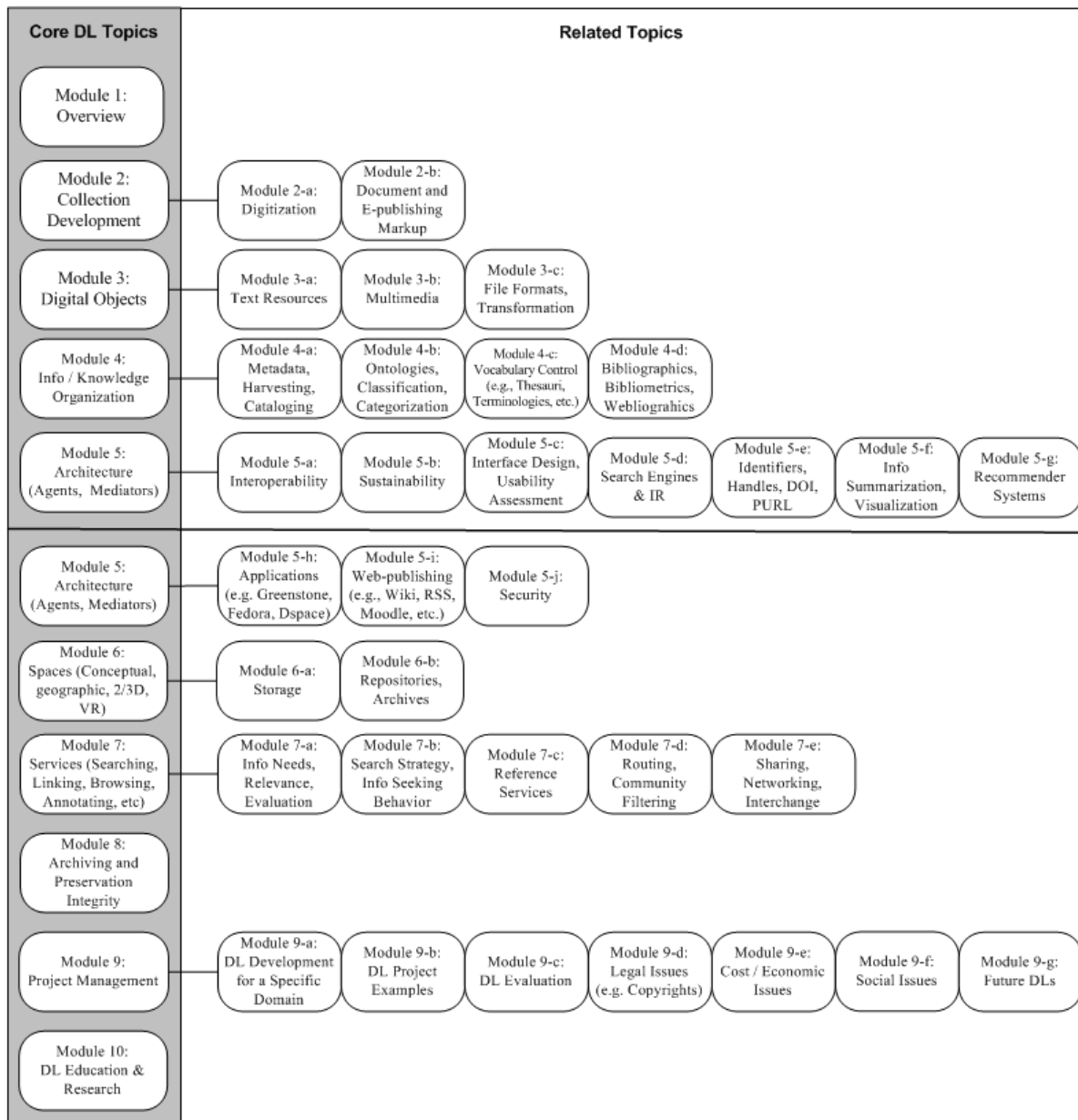


Fig. 1: Topics in Digital Libraries (Source: Pomerantz et al, 2006)

Short Term Training Programmes in OA

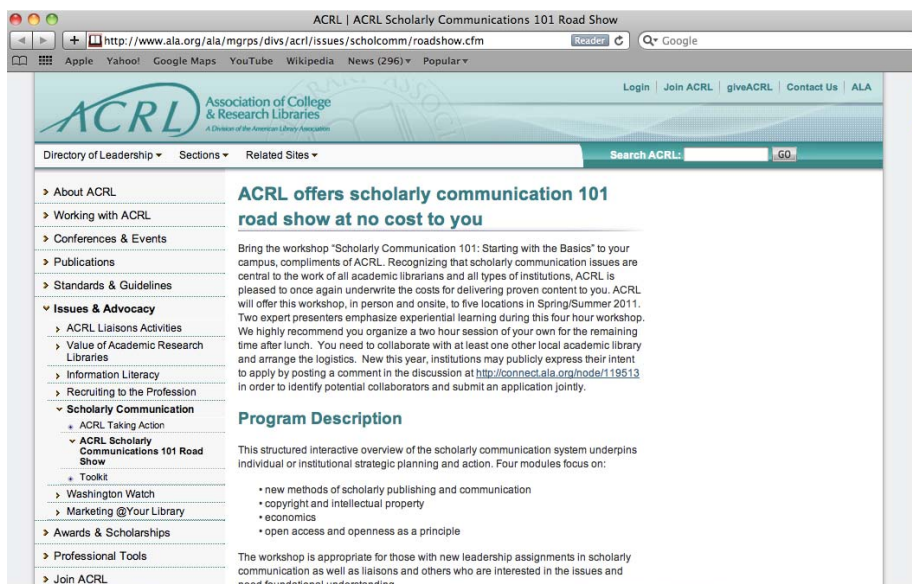
The short term training programs are all over the place and are run by many different kinds of organizations. Some of the leading players in the short-term training programs include ACRL led Road shows; the Programme for the Enhancement of Research Information (PERii), by INASP, which is working with, and in, developing countries to strengthen their ability to carry out their own research and contribute to the global knowledge network; OpenAIRE; and EIFL. UNESCO supported programs have also been one of the leading training initiatives to build capacities in the OA.

Table 3: Organisations involved in imparting training programmes

Sl. No.	Organisation	Details	URL's
1	GRDI - Global Research Data	5 Workshops	http://www.grdi2020.eu/Default.aspx
2	Open AIRE	5 Workshops	http://www.openaire.eu
3	CERN	7 Workshops	http://indico.cern.ch/
4	Open Access Week	7 Workshops	http://openaccessweek.org
5	EIFL	15 Workshops	http://www.eifl.net
6	Association of African Universities	1 workshop, 1 Webinar	http://www.aau.org/
7	ENCES - European Network for Copyright in support of Education and Science	2 Workshops	http://www.ences.eu/
8	INASP and PERii	2 Workshops	http://www.inasp.info/
9	M S Swaminathan Research Foundation	2 Workshops	http://www.mssrf.org/
10	OASPA -Open Access Scholarly	2 Conferences, 1 Webinar	http://www.oaspa.org/
11	European Federation for Information Technology in Agriculture, Food and the Environment	1 workshop	http://www.efita.net/
12	NECOBELAC	4 Workshops	http://www.necobelac.eu

Major Training Programs and the organisations

1. ACRL- 101 Road show



The screenshot shows the ACRL website with a navigation menu on the left and a main content area. The main content area features a heading "ACRL offers scholarly communication 101 road show at no cost to you" and a detailed description of the workshop. The description states that the workshop is a four-hour session focusing on experiential learning and is open to all academic librarians. It also mentions that the workshop is free of charge and that participants should contact their local academic library to arrange the logistics.

ACRL offers scholarly communication 101 road show at no cost to you

Bring the workshop "Scholarly Communication 101: Starting with the Basics" to your campus, compliments of ACRL. Recognizing that scholarly communication issues are central to the work of all academic librarians and all types of institutions, ACRL is pleased to once again underwrite the costs for delivering proven content to you. ACRL will offer this workshop, in person and onsite, to five locations in Spring/Summer 2011. Two expert presenters emphasize experiential learning during this four hour workshop. We highly recommend you organize a two hour session of your own for the remaining time after lunch. You need to collaborate with at least one other local academic library and arrange the logistics. New this year, institutions may publicly express their intent to apply by posting a comment in the discussion at <http://connect.ala.org/node/119513> in order to identify potential collaborators and submit an application jointly.

Program Description

This structured interactive overview of the scholarly communication system underpins individual or institutional strategic planning and action. Four modules focus on:

- new methods of scholarly publishing and communication
- copyright and intellectual property
- economics
- open access and openness as a principle

The workshop is appropriate for those with new leadership assignments in scholarly communication as well as liaisons and others who are interested in the issues and need foundational understanding.

2. OpenAIRE



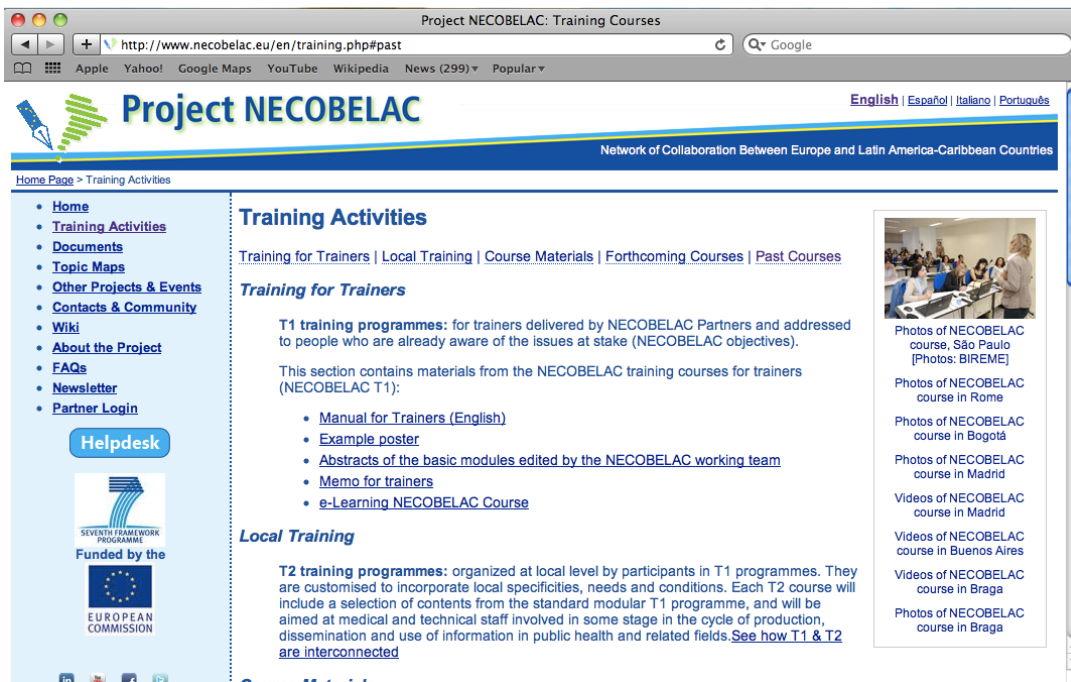
The screenshot shows the OpenAIRE website interface. The browser address bar displays <http://www.openaire.eu/en/open-access/mandates-a-policies>. The page title is "OpenAIRE - Open Access Policies and Mandates". The main navigation menu includes "Home", "Open Access in the EU", "Deposit Publications", "Search for Publications", "Get Support", and "News & Events". The current page is "Open Access Policies and Mandates", dated 02 MAY 2011. It features a sidebar with "In this section" and "EU Member States" (Austria, Belgium, Bulgaria, Cyprus, Czech Republic). The main content area is titled "Open Access Policies and Mandates" and includes a section "Open Access Policies in the European Union" with a paragraph explaining the benefits of open access and a reference to the "Digital Agenda for Europe".

3. OASIS



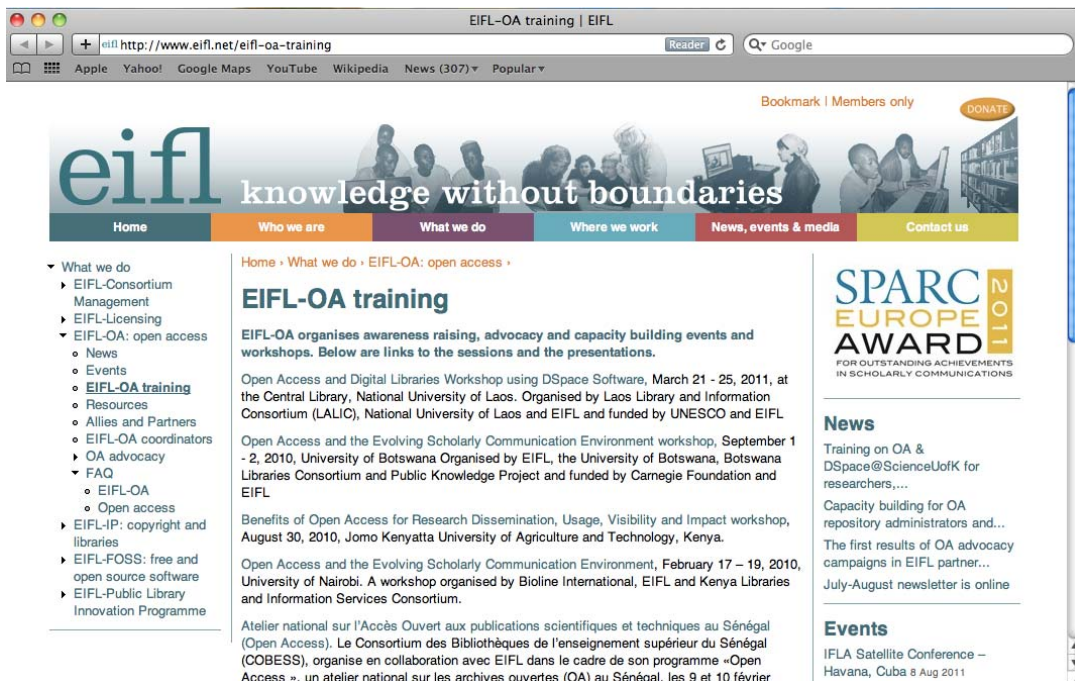
The screenshot shows the OASIS website interface. The browser address bar displays http://www.openoasis.org/index.php?option=com_content&view=article&id=43&catid=56. The page title is "Open Access Scholarly Information Sourcebook". The main navigation menu includes "About", "Sitemap", and "Search". The current page is "About this site", dated 02 MAY 2011. It features a sidebar with "Users" (Researchers, Librarians, Publishers, Administrators, Public, Students, Sign In) and "Resources" (Briefing Papers, Guides and Overviews, Video, Presentations, The Open Access Map, Open Access Tracking Project). The main content area is titled "About this site" and includes a section "Purpose" with a paragraph explaining the growing interest in open access and the need for training and knowledge development.

4. NECOBELAC



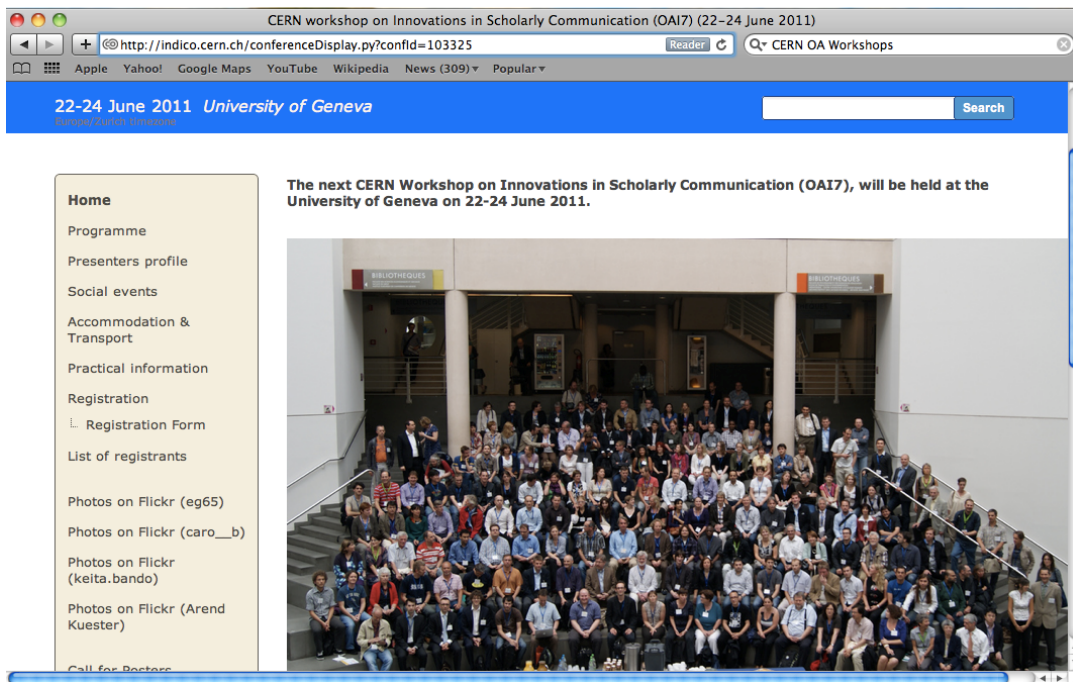
The screenshot shows the Project NECOBELAC website. The browser address bar displays "http://www.necobelac.eu/en/training.php#past". The website header includes the Project NECOBELAC logo and navigation links for English, Español, Italiano, and Português. The main content area is titled "Training Activities" and lists various resources such as "Training for Trainers", "Local Training", "Course Materials", "Forthcoming Courses", and "Past Courses". A sidebar on the left contains a "Helpdesk" button and a logo for the European Commission. A right-hand sidebar features a gallery of photos and videos from various NECOBELAC courses.

5. EIFL Training programmes



The screenshot shows the EIFL website. The browser address bar displays "http://www.eifl.net/eifl-oa-training". The website features a navigation menu with options like "Home", "Who we are", "What we do", "Where we work", "News, events & media", and "Contact us". The main content area is titled "EIFL-OA training" and provides information about various workshops and events, including "Open Access and Digital Libraries Workshop using DSpace Software" and "Benefits of Open Access for Research Dissemination". A sidebar on the right highlights the "SPARC EUROPE AWARD 2011" and lists recent news and events.

6. CERN Workshop on Innovations in Scholarly Communications series



CERN workshop on Innovations in Scholarly Communication (OAI7) (22-24 June 2011)

http://indico.cern.ch/conferenceDisplay.py?confid=103325

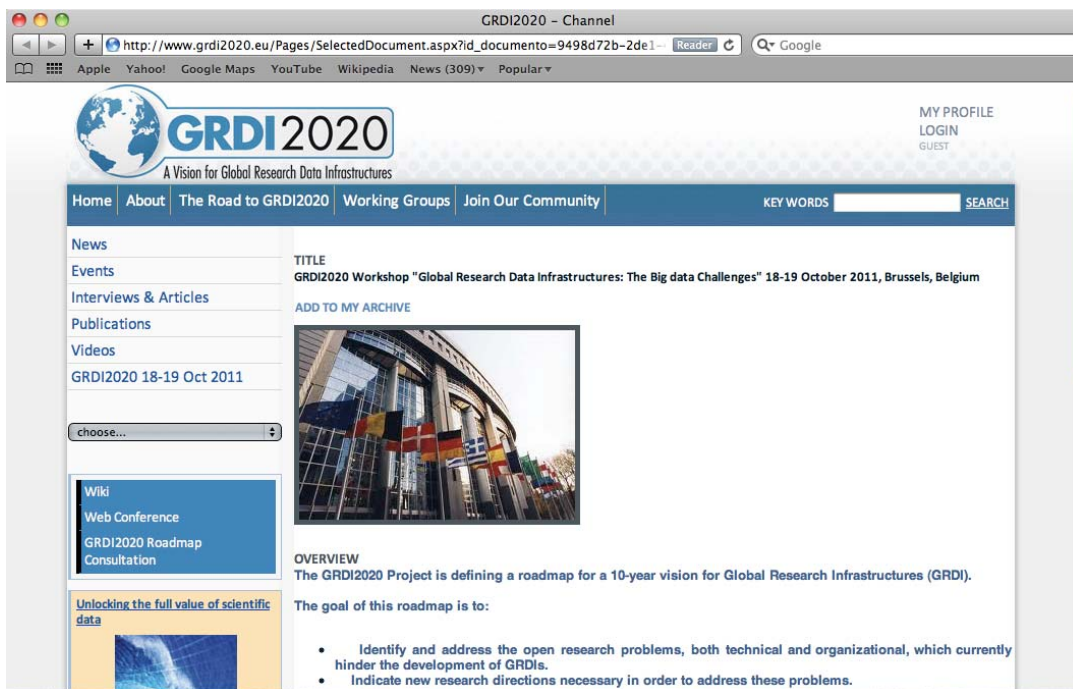
22-24 June 2011 University of Geneva

The next CERN Workshop on Innovations in Scholarly Communication (OAI7), will be held at the University of Geneva on 22-24 June 2011.

Home

- Programme
- Presenters profile
- Social events
- Accommodation & Transport
- Practical information
- Registration
 - Registration Form
- List of registrants
- Photos on Flickr (eg65)
- Photos on Flickr (caro__b)
- Photos on Flickr (keita.bando)
- Photos on Flickr (Arend Kuester)
- Call for Papers

7. GRDI Workshops and Conferences



GRDI2020 - Channel

http://www.grdi2020.eu/Pages/SelectedDocument.aspx?id_documento=9498d72b-2de1

GRDI2020

A Vision for Global Research Data Infrastructures

Home About The Road to GRDI2020 Working Groups Join Our Community

News

Events

Interviews & Articles

Publications

Videos

GRDI2020 18-19 Oct 2011

choose...

Wiki

- Web Conference
- GRDI2020 Roadmap Consultation

Unlocking the full value of scientific data

TITLE

GRDI2020 Workshop "Global Research Data Infrastructures: The Big data Challenges" 18-19 October 2011, Brussels, Belgium

ADD TO MY ARCHIVE

OVERVIEW

The GRDI2020 Project is defining a roadmap for a 10-year vision for Global Research Infrastructures (GRDI). The goal of this roadmap is to:

- Identify and address the open research problems, both technical and organizational, which currently hinder the development of GRDIs.
- Indicate new research directions necessary in order to address these problems.

Appendix 5 provides the details of the programmes that have been run.

A more detailed profile of EIFL is provided here, given the leading role it has played and continues to play in imparting OA Education

Electronic Information for Libraries (EIFL)

EIFL (Electronic Information for Libraries) is one of the very prominent organisations involved in the OA Training programmes around the world, with special emphasis on developing countries of Africa,

With the mission of removing barriers to knowledge sharing EIFL advocates for open access to promote knowledge sharing and is involved in many activities such as

- Building capacity to launch open access repositories and to ensure their long-term sustainability (<http://www.eifl.net/eifl-oa-resources#ir>)
- Offering training, supporting knowledge sharing, and providing expertise on open access policies and practices (open access journals, open access repositories, open access books, open data and open educational resources). (<http://www.eifl.net/eifl-oa-training>)
- Empowering library professionals, scholars, educators and students to become open access advocates. (<http://www.eifl.net/oa-advocacy>)
- Advocating nationally and internationally for the adoption of open access policies and mandates.

EIFL – OA achievements

- The EIFL Open Access (OA) programme has been chosen as the winner of the 2011 SPARC Europe Award for Outstanding Achievements in Scholarly Communications
- EIFL-OA and partner countries outreach efforts have led to higher visibility and impact of scholarly publications, international co-operation, and community building.
- There are 400+ open repositories and 2,600+ open access journals in EIFL partner countries.
- Open access policies that ensure that research funded by institutions is made freely available have now been adopted by 24 institutions in the EIFL network (<http://www.eifl.net/oa-policy>) (<http://www.eifl.net/oa-policy>) .
- There are EIFL-OA Coordinators in all EIFL partner countries that benefit from EIFL training and support in order to conduct national awareness rising and advocacy campaigns.
- EIFL –OA plays a leading role in advocacy at the international level; we are a co-organiser of International Open Access week (<http://www.openaccessweek.org/>) ; a founding member of the Confederation of Open Access Repositories (COAR) (<http://coar-repositories.org/>) ; a networking partner in OpenAIRE project (Open Access Infrastructure for Research in Europe) (<http://www.openaire.eu/index.php>) ; and an associate member of Open Access Scholarly Publishers Association (OASPA) (<http://www.oaspa.org/>) .
- EIFL-OA organised 62 awareness raising, advocacy and capacity building events and workshops in 2003-2011 in 32 countries with participants from over 50 countries.
- EIFL-OA released Results of the SOAP Survey: A Preliminary Overview of the Situation in EIFL Partner Countries (<http://www.eifl.net/news/results-soap-survey-eifl-partner-countries>) ,



- Report on the implementation of open content licenses in developing and transition countries and Report on Open Repository Development in Developing and Transition countries (http://www.eifl.net/system/files/201101/evaluation_report_on_irs_june.pdf) and the data (http://www.eifl.net/system/files/201101/ir_survey_questions_2.pdf) .

Contact EIFL : EIFL-OA Programme Manager: Iryna Kuchma, [iryna.kuchma\[at\]eifl.net](mailto:iryna.kuchma[at]eifl.net)

Berlin Open Access Conference Series

The Berlin Open Access Conference Series convenes leaders in the science, humanities, research, funding, and policy communities around *The Berlin Declaration on Open Access to Knowledge in the Sciences and Humanities*.

To support continued adoption of the principles outlined in the Berlin Declaration, as well to track progress on their implementation, the original signatories agreed to support regular follow-up meetings. As a result, Berlin Open Access conferences have been convened annually since 2004. The conference series now takes place in locations around world; to date Germany, Switzerland, England, Italy, France, and most recently, China — have hosted this prestigious gathering.

Berlin 9 to be held is the first of the annual meetings to take place in North America (<http://www.berlin9.org/about/conferences/index.shtml>)

Past Conferences

Berlin 1	Harnack House of the Max Planck Society, Berlin, Germany October 2003	http://oa.mpg.de/berlin-prozess/berlin-konferenzen/berlin-konferenz/
Berlin 2	<i>Steps Toward Implementation of the Berlin Declaration on Open Access to Knowledge in the Sciences and Humanities</i> CERN - the European Organisation for Nuclear Research, Geneva, Switzerland May 2004	http://oa.mpg.de/berlin-prozess/berlin-konferenzen/berlin-2/
Berlin 3	<i>Progress in Implementing the Berlin Declaration on Open Access to Knowledge in the Sciences and Humanities</i> University of Southampton, United Kingdom February 2005	http://www.eprints.org/events/berlin3/index.html
Berlin 4	<i>Open Access – From Promise to Practice</i> Max Planck Institute for Gravitational Physics, Potsdam, Germany March 2006	http://berlin4.aei.mpg.de/
Berlin 5	<i>From Practice to Impact: Consequences of Knowledge Dissemination</i> University of Padua, Italy September 2007	http://www.aepic.it/conf/Berlin5/index3b8a.html
Berlin 6	<i>Changing Scholarly Communication in the Knowledge Society</i> Heinrich Heine University, Düsseldorf, Germany November 2008	http://oa.mpg.de/berlin6/
Berlin 7	<i>Open Access – Reaching Diverse Communities</i> Université Paris I Panthéon-Sorbonne, France December 2009	http://www.berlin7.org/
Berlin 8	<i>Implementation Progress, Best Practices, and Future Challenges</i> Chinese Academy of Sciences, Beijing, China October 2010	http://www.berlin8.org/



OA Education and Training: Where do we stand?

Despite these tremendous achievements in terms of advocacy, awareness rising, institutional and public policies, and implementations in terms of repositories and rise of OA journals, training opportunities have remained one of the untapped terrains of OA movement. An examination of the OA scene reveals that OA training has primarily followed the route of short-term workshops on capacity building in terms of OA, building repositories (mostly) by deploying one or the other open source software such as DSpace or EPrints or Greenstone and in some cases in Open Access Journals software. The other meetings and workshops have been primarily focused on very high-level workshops and meetings of champions and advocates. Key players such as EIFL and SPARC have been involved in high level /policy development, leadership development workshops as well as capacity building exercises. One very positive sign has been the collaboration between different organisations and also integration of OA activities into both the research framework as well as LIS professional development.

It is interesting to note that while “digital libraries’ as a discipline of study (despite the multi-disciplinary nature) has evolved into a well-accepted formal academic programme across the world (Appendix 3 and 4). However OA formal educational programmes are yet to be well established. Perhaps one of the reasons is that the key leaders /advocates are more focused on advocacy for both policy and mandate and also awareness and adoption than establishing OA into a domain of study. Courses on “Digital Libraries” have become almost core and default electives in many universities. Most of the digital libraries courses are taught at the graduate (post graduate) level as part of the Masters in Library and Information Sciences and in some cases Masters in Computer Science. It is perhaps worthwhile to go deep into these phenomena; as both DL and OA are similar and coterminous in many respects. May be it is time we consider this issue and probe further.

Chapter 5

Model Syllabus for a Course on Open Access

Having examined the syllabus of OA across the different educational and training programmes, it is evident there is significant diversity and similarity. The difference comes in the following forms:

- Broad Picture (context): Some course teach OA in the context of scholarship and scholarly communication, while some from the perspective of publishing; some from the content management and library perspective
- Weighting given to OA and OA related topics

Having studied the lay of the land and the course content of many of these course offerings, a model syllabus is presented here. This syllabus needs to be further enhanced after an open discussion in the OA and relevant communities.

Innovations in Scholarly Publishing: Open Access Approaches and Models

Course Description:

This course designed for LIS professionals, will provide a serious grounding in all aspects of scholarly publishing with a focus on exploring the phenomenon of Open Access Publishing. LIS professionals have always been playing a critical role in scholarship and scholarly communication. Scholarship and learning have been quite intertwined with LIS functions and processes. This course is designed to provide an in-depth understanding of the philosophy, ideology, and the pragmatics of Open Access. The philosophy of “universal, open, and free” access is the very foundation of LIS profession and there is a natural coalition between the philosophy of librarianship and open movement — from open source to open content.

Scholarly journals (or serials) have not only taken center-stage position but also posed challenges in the development and management of library collections. The “serials pricing crisis” of the nineteen eighties, coupled with shrinking budgets aggravated the problems and the academia including the LIS professionals began to question the business model of scholarly journal publishing. With the emergence of the Internet and the web, the idea of “open” gained ground and the Open Access movement began taking shape in the early nineteen nineties, providing alterative models of access to scholarly literature.

Course Goal:



This course is intended to examine the participation and engagement of LIS professionals in the scholarly information life cycle both from the creator/author as well as consumer/user end. This course will help LIS professionals to develop solid foundations and gain insights and knowledge in its engagement with academe and technical skill sets in the management of collections in ensuring cost effective access to scholarly information

This course expects students to study the publishing/production routines of some selected scholarly journals and weigh the different options for publishing journals

Course Objectives:

Provide the students with:

- Understanding the Republic of Science and scholarship from a historical perspective
- Philosophical foundations of scholarly communication including the functions/role of journals
- Adequate foundation in the nature of the Internet/web and its effect on the academe and scholarship including eScience ; Open Science; Open Data ; and Cyber infrastructure
- Knowledge of the phases and processes of journal publishing in credentialing through peer review
- Understanding the concepts, philosophy and ideology of Open Access
- Different approaches to OA
- The economics of Open Access and Business models
- Some foundations in the measures and measuring of science/scholarship
- Management of digital content and repositories
- Knowledge of Building digital libraries and repositories through practical training in Open Source software such as DSpace, Fedora, DuraSpace , EPrints, Greenstone, Kete and others
- Practical Knowledge of Journal Publishing through Open Journal System

Course Contents

Unit 1: Republic of Science and Scholarship: Foundations of science and scholarship. Principles and paradigms of scientific culture / scholarship: Historical perspective of scholarly communication systems. Scholarship and scholarly traditions

Unit 2: Study of journals, their functions, working and processes. The importance of scientific and professional societies in journal publishing; the peer review process; the migration of peer review journals from print to Web-based; Serials pricing crisis phenomena

Unit 3: Rise of Internet as game changer in scholarship, communication, and daily lives. Evolution of Internet/Electronic publishing; Web 2.0 and the emergence of Wikipedia; slide-share; you tube; blogs and others as mainstream media. eScience, Open Data and cyber infrastructure

Unit 4: Knowledge Economy and intellectual capital. The Internet economy; the economics of information in the Internet era; the disruptive technologies; Google and its business model;



new business models of free information. The Wikinomics and the Wikipedia and the Encyclopedia case studies

Unit 5: Open Access Movement: understanding OA—concepts, principles, ideology and philosophy of Open Source, Open Content; Open Educational Materials and Open Access to scientific literature; the Green and Gold route to OA. Familiarity with the people and organisations behind the OA movement

Unit 6: Study of exemplars of institutional repositories. Evolution of libraries as electronic publishers; Leadership role in Institutional Repositories/OA policies and mandates and implementation; Workflows and IR Teams

Unit 7: Study of Open source software for IR and DL: DSpace; Eprints ; Fedora ; Kete

Unit 8: Open Access Journal Publishing: the best practices and exemplars of OA journals. Practical exercises in OJS: Building a Prototype OA Journal. Revenue models for OA journal publishing. Study of different business models

Unit 9: Copyrights issues. Understanding copyrights. Creative Commons. Licensing issues.

Unit 10: Scientometrics and metrics of scholarly communication. Innovations in measuring science and scholarship. Mapping science and tools and parameters: usage and influence factors.

Chapter 6

OA Education and Training Opportunities

At the turn of the last century/millennium the society (and the scholarly community) was at cross roads. Internet has been a disruptive technology in more than one ways. It has impacted work, lives and society like never before. One of the industries directly affected by the Internet is publishing including scholarly publishing. Science, scholarship, and academe have also naturally been transformed. In the world of scholarly publishing, especially journals, the ensuing phenomena has been a result of both the technology push and the need pull. Open Access movement has been primarily a result of the following:

- Serials pricing crisis (which in turn was also a result of shrinking library budgets, and subscription cancellations)
- The exhilarating and liberating phenomenon of Internet with the promise of non-intermediated communication
- The rights and the morality of custodianship of scholarship

The stakeholders of science, science communication, learning and academe in general, have all been involved in an intense and often acrimonious debate about the issues of scholarly publishing. It has also lead to the questioning of the very premises of scholarship. The “killer application” has not only dramatically transformed the world, but turned many a principles and policies on their heads. Thus, since the last two decades, the topic of ‘Open Access’ has attracted many a devout protagonists and with religious fervor these evangelists have successfully converted many adherents. It all began with a very provocative article by Stevan Harnard, with the title, "subversive proposal". Stevan Harnard, the author of that provocative document is a pioneering veteran of OA and open scholarship. Stevan Harnad, who took up a position as Professor at the University of Southampton (UK) in the fall of 1994 after many years as a researcher and editor in Princeton, New Jersey, knew the twin worlds of paper and electronic scholarly journals as few others. He has been the editor for many years of *Behavioral and Brain Sciences*, a journal published by Cambridge University Press, and in 1990 he introduced *Psycoloquy*, the first peer-reviewed scientific journal on the Internet (ARL, 2002) (<http://www.arl.org/bm~doc/subversive.pdf>)

With public access to the Internet becoming widespread in the late 1990s and early 2000s, and convincing advocacy by different individuals and groups, the OA movement took off. With low-cost distribution technology fuelling the OA movement, and prompting both the Green OA self-archiving of non-OA journal articles and the creation of Gold OA journals, OA movement has been an enduring phenomenon with fair degree of successes. Though 20% market share is considered dramatic or otherwise is a matter of opinion, it is safe to say that OA is a here to



stay and *not* a fad.

With two decades of development, innovations, and maturation, the critical questions for open access movement are:

- How do we leverage the interdisciplinary approaches to OA movement to allow scholars and librarians to capitalize on new opportunities in creative ways?
- How do we prepare the LIS profession for a new future of circulating and sharing knowledge and scholarship?
- How do we prepare our future generation of scholars for their publishing future?

It is important that we remember that it is also time for succession planning in the OA Empire! Building a strong OA leadership and community is a key to the sustained success and future of OA. The path of development of every emergent domain is that of the early phases of feverish philosophical debate giving rise to theoretical underpinnings and practical solutions development followed by the formalization of the domain through formal educational programmes.

Our study of the OA landscape reveals that there is abundant literature on the subject, sufficient to warrant a separate class (to use Ranganathan's phrase — literary warrant). Our study also highlighted the paucity of formal programmes despite the abundance of short-term training programmes — thanks largely due to organisations such as EIFL; SPARC; ACRL; OpenAIRE; and others. It is time for full-fledged academic programmes. It is time for OA movement to move from non-formal training to formal education in OA; develop holistic curriculum; build professionalism; and evolve pedagogy and methods of programme delivery.

Given the multidisciplinary nature of the field of OA, the challenges are many. Questions such as who and for whom will naturally crop up. Our impressionistic study of the composition of the OA domain indicates that LIS professionals play a significant role. However the leadership in OA is predominantly coming from scholars and those with deep knowledge of the science communication processes and systems. While short term training programmes help build capacity, it falls short of building specialized professionals. An examination of the evolution of different disciplines also suggests that it is time for professional education in OA. There is need for more scoping studies and also meetings and workshops are to be held to understand the tensions regarding OA education including curriculum, delivery modes and methods.

While the strong votaries and leaders of OA – Stevan Harnard and Peter Suber agree that there is a need for formal education programmes in OA, there is no consensus regarding who is competent to run such a programme. My interaction (email) with these two leaders strongly suggests that there are questions lingering about the competency of the people who can take leadership roles in OA education.



Chapter 7

Conclusions and Recommendations

Though paucity of formal education programmes in OA is encouraging in terms of opportunities, it is disconcerting to note that we have a long way to go before we reach a favorable stage for launching them. While there is sufficient ground both in terms of need and knowledge base, to begin the next phase of OA movement — education for OA, there exist some persistent questions. Some of the questions that arise are (or we need to be asking) are:

- Which are the broader academic programme/disciplinary frameworks within which we need to situate OA?
- Curriculum development — exploration and identification of the contours of the domain and research questions
- Competencies of faculty — who are the people competent to develop and deliver the curriculum on OA?
- Where do we place these graduates? What are the opportunities for careers in OA?

Most of the key players in OA (example SPARC and EIFL) recognize the importance of OA education and preparing the next generation of leaders. And have incorporated OA education in their strategic plans. These OA education strategies are currently limited to building networks of professionals and conducting awareness rising, advocacy at the policy levels, and training in OA implementation programmes. Their overarching mission is removing barriers to access to information, literature and knowledge. However the development of a discipline (especially a domain which is at the intersection of many) needs strong academic programmes to build a community of domain scholars and professionals. Currently the formal programmes in OA are run by passionate LIS academics in different universities.

Based on my understanding of the landscape and this desktop study following course of action is suggested:

- Convening a workshop (first) of OA leaders and key players to gain insights and share views, experiences and reach a broad framework for OA Education (Formal courses at graduate/post graduate level)
- Drafting a position paper on OA education and tabling the same at the above workshop
- Second Workshop on OA Curriculum Development with the explicit deliverables of a Model Curriculum and Educational Programme and a plan of action for implementation
- Initiating active discussion on the OA Education Programme
- Developing/consolidating the course package into full-fledged eLearning Programme through a wiki and allowing for organic growth and updating through community participation



- Initiating a campaign for introduction of such programmes in the educational programmes across universities and other educational institutions

One of the important issue to be deliberated and consensus to be reached is regarding the target group. Based on our desktop study and analysis of active stake holders, two main target groups emerge — the LIS professionals and the Ph.D (Graduate) students. While for LIS professionals, OA course may be made a core course, for the researchers, it may be considered as part of the Research Methods, Technical /Scientific writing suite of courses. Given that future scholarly communication system is potentially in the hands of present day young academics, we need to target this group to create the next generation of OA leaders.

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Suber Peter Blog : <http://www.earlham.edu/~peters/fos/fosblog.html>

Tenopir, Carol and King, Donald W. (1997) Trends in Scientific Scholarly Journal Publishing in the
 United States, *Journal of Scholarly Publishing*, April 1997, pp. 135 - 170.

UNESCO Constitution, art. 1.2 c, [http://portal.unesco.org/en/ev.php-
 URL_ID=15244&URL_DO=DO_TOPIC&URL_SECTION=201.html](http://portal.unesco.org/en/ev.php-

 URL_ID=15244&URL_DO=DO_TOPIC&URL_SECTION=201.html)

UNESCO’s Open suite strategy, <http://www.berlin7.org/IMG/pdf/caine.pdf>)

Willinsky, John (2009) “The Stratified Economics of Open Access”, *Economic Analysis & Policy*,
 Vol. 39 No. 1, March 2009,
<http://lled.educ.ubc.ca/sites/lled.educ.ubc.ca/files/pdf/LLED565-951.pdf>

Appendix 1: SPARC-OA Forum Listing (key players)

Sl No	Name	No. of Postings	Details	Complete Affiliations	URL
1	<u>Peter Suber</u>	913	Earlham College	Peter Suber Senior Researcher, SPARC Berkman Fellow, Harvard University Research Professor of Philosophy, Earlham College Open Access Project Director, Public Knowledge http://www.earlham.edu/~peters/	http://www.earlham.edu/
2	<u>Stevan Harnad</u>	265	University of Southampton	Stevan Harnad, school of electronics and computer science, University of Southampton, SO17 1BJ, United Kingdom,	www.ecs.soton.ac.uk
3	<u>Jennifer McLennan</u>	161	Association of Research Libraries / Scholarly Publishing and Academic Resources Coalition	Jennifer McLennan Director of Programs & Operations SPARC jennifer@arl.org (202) 296-2296 x121 Fax: (202) 872-0884 http://www.linkedin.com/in/jennifermclennan http://www.arl.org/sparc	http://www.arl.org/
4	<u>Heather Morrison</u>	72	British Columbia Electronic Library Network	Heather Morrison, MLIS The Imaginary Journal of Poetic Economics	http://eln.bc.ca/
5	<u>Charles W. Bailey, Jr.</u>	43		Charles W. Bailey, Jr. Publisher, Digital Scholarship	http://digital-scholarship.com/
6	<u>Carol Minton Morris</u>	31	Cornell University	Communications and Media Director Fedora Commons http://www.fedora-commons.org Faculty and Research Staff Cornell Information Science 301 College Ave. Ithaca, NY 14850 607 255-2702 clt6@cornell.edu	http://cornell.edu/

7	<u>McKiernan, Gerard [LIB]</u>	26	Iowa State University Library	Gerry McKiernan Associate Professor Science and Technology Librarian Iowa State University Library Ames IA 50011 gerrymck@iastate.edu	www.iastate.edu
8	<u>Charlotte Webber</u>	25		Media Contact Charlotte Webber BioMed Central Press Office	http://www.biomedcentral.com/
9	<u>Sally Morris (Morris Associates)</u>	24	Morris Associates (Publishing Consultancy)	Sally Morris Consultant, Morris Associates (Publishing Consultancy) South House, the Street, Clapham, Worthing, West Sussex BN13 3UU, UK Tel: +44(0)1903 871286 Fax: +44(0)8701 202806 Email: sally@morris-assocs.demon.co.uk	www.morris-associates.net
10	Adrian Ho	23	The University of Western Ontario	Adrian K. Ho Scholarly Communication Librarian The University of Western Ontario (519) 661-2111 x87832 adrian.ho@uwo.ca	http://uwo.ca/
11	<u>Jean-Claude Guédon</u>	19	University de Montreal	Jean-Claude Guédon Professeur titulaire Littérature comparée Université de Montréal	http://www.umontreal.ca/
12	<u>David J Solomon</u>	18	Michigan State University	Professor (with Tenure), Department of Medicine and the Office of Medical Education Research and Development, College of Human Medicine, Michigan State University	http://msu.edu/
13	<u>Gavin Baker</u>	18	Association of Research Libraries / Scholarly Publishing and Academic Resources Coalition	Gavin Baker Intern Scholarly Publishing and Academic Resources Coalition 21 Dupont Circle NW, Suite 800 Washington, DC 20036 USA	http://www.arl.org/

14	<u>Gerry Mckiernan</u>	16	Iowa State University Library	Gerry McKiernan Associate Professor Science and Technology Librarian Iowa State University Library Ames IA 50011 gerrymck@iastate.edu	http://www.iastate.edu /
15	<u>David Prosser</u>	15	University of Oxford		http://www.bodleian.ox.ac.uk/bodley
16	<u>Armbruster, Chris</u>	14	European University Institute	Chris Armbruster SSRN Author Rank: 1,850 by Downloads Executive Director, PhD Research Network 1989 Berlin, Germany	http://www.eui.eu/Home.aspx
17	<u>JQ Johnson</u>	14	University of Oregon Libraries	JQ Johnson Director, Scholarly Communications and Instructional Support University of Oregon Libraries 1299 University of Oregon T: 541-346-1746; F: -3485 Eugene, OR 97403-1299 email: jqj@uoregon.edu http://libweb.uoregon.edu office: 115F Knight Library	www.libweb.uoregon.edu
18	<u>Paul Peters</u>	13	Hindawi Publishing Corporation	Paul Peters Head of Business Development Hindawi Publishing Corporation Email: paul.peters@hindawi.com	www.hindawi.com
19	<u>Ingegerd Rabow</u>	12	Lund University	Ingegerd Rabow Lund University Libraries Head Office P.O. Box 134 SE 221 00 LUND, Sweden	http://www.lub.lu.se/en.html
20	<u>Richard Poynder</u>	12	Journalist	Richard Poynder Freelance Journalist, UK	www.richardpoynder.co.uk
21	<u>Alma Swan</u>	11		Alma Swan Key Perspectives Ltd Truro, UK	
22	Randy S Kiefer	11	CLOCKSS	Randy S. Kiefer, Executive Director PO Box 301 Reisterstown, MD 21136 randy.kiefer@clockss.org Torg	http://www.clockss.org/clockss/Home

23	<u>George Porter</u>	10	Caltech Library California Institute of Technology	George S. Porter Sherman Fairchild Library of Engineering & Applied Science California Institute of Technology	http://library.caltech.edu/
24	<u>Sophia Jones</u>	8	University of Nottingham		www.nottingham.ac.uk
25	<u>Bayer-Schur, Barbara</u>	7		Barbara Bayer-Schur M.A. PEER ? Publishing and the Ecology of European Research Niedersächsische Staats- und Universitätsbibliothek Göttingen Tel: +49 551 39 5242 bayer-schur@sub.uni- goettingen.de www.peerproject.eu	http://www.sub.uni-goettingen.de/
26	<u>Dorothea Salo</u>	7	University of Wisconsin	Dorothea Salo dsalo@library.wisc.edu Digital Repository Librarian AIM: mindsatuw University of Wisconsin Rm 218, Memorial Library (608) 262-5493	http://library.wisc.edu/#books
27	<u>Gordon Tibbitts</u>	7	CLOCKSS	Gordon Tibbitts Executive Director Gordon.Tibbitts@clockss.org	http://www.clockss.org/clockss/Home
28	<u>Reme Melero</u>	7	IATA	Reme Melero Científico Titular CSIC IATA Avda Agustin Escardino 7, 46980 Paterna, Valencia Tel 963900022 ext 3121 www.accesoabierto.net	www.accesoabierto.net/
29	<u>Susanna Mornati</u>	7	Consorzio Interuniversitario	Susanna Mornati, CILEA, ELPUB 2009 General Chair	http://www.cilea.it
30	<u>Dana Roth</u>	6	Caltech Library California Institute of Technology	Dana L. Roth Millikan Library / Caltech 1-32 1200 E. California Blvd. Pasadena, CA 91125	http://library.caltech.edu/
31	<u>Frederick Friend</u>	6	University College London, Gower Street, London		http://ucl.ac.uk/

32	Nick Shockey	6	Scholarly Publishing and Academic Resources Coalition	Nick Shockey Director, Right to Research Coalition Director of Student Advocacy, SPARC nick@arl.org +01 202 296 2296 x116 http://www.righttoresearch.org http://www.arl.org/sparc	http://www.arl.org/sparc
33	Secretariat@isast.org	6	University of Piraeus	Dr. Anthi Katsirikou, Conference Secretary University of Piraeus Secretary of the Greek Association of Librarians and Information Professionals anthi@asmda.com secretariat@isast.org	www.isast.org
34	VyhnaneK, Kay Eileen	6	Washington State University	VyhnaneK, Kay Eileen Scholarly Communication Librn Libraries Terrell Lib 120f Pullman, WA 99164-5610 509-335-9514 kayv@wsu.edu	http://wsu.edu/
35	Andrew Murphie	5	University of New South Wales	Andrew Murphie - Associate Professor School of English, Media and Performing Arts, University of New South Wales, Sydney, Australia, 2052	http://www.unsw.edu.au/
36	Kim West	5	BioMed Central	KimWest Social Media Assistant BioMed Central 6thFloor 236Gray's Inn Road LondonWC1X 8HB	www.biomedcentral.com
37	Rick Anderson	5	The University of Utah	Rick Anderson Assoc. Dir. for Scholarly Resources & Collections Marriott Library University of Utah rick.anderson@utah.edu 801-721-1687	www.utah.edu
38	Amy Kohrman	4	Stanford University	Amy Kohrman Marketing Director CLOCKSS Stanford University Libraries 1450 Page Mill Road Palo Alto, CA 94304 akohrman@clockss.org	http://stanford.edu/

39	<u>Graham Steel</u>	4		Glasgow	
40	<u>Ann Taylor</u>	3	The Berkeley Electronic Press	Ann Taylor Outreach and Scholarly Communications Berkeley Electronic Press ataylor@bepress.com	http://www.bepress.com/
41	<u>Daisuke Ueda</u>	3	Hiroshima University Library	Daisuke UEDA Hiroshima University Library Kagamiyama 1-2-2, Higashi-Hiroshima, Japan Tel: +81-82-424-6228 Fax: +81-82-424-6211 E-Mail: dueda@hiroshima-u.ac.jp	http://www.lib.hiroshima-u.ac.jp/index_e.html
42	<u>Stacie Lemick</u>	3	Association of Research Libraries / Scholarly Publishing and Academic Resources Coalition	Stacie Lemick Communications Assistant SPARC	http://www.arl.org
43	<u>Steve Hitchcock</u>	3	University of Southampton	Dr Steve M Hitchcock, school of electronics and computer science, University of Southampton, SO17 1BJ, United Kingdom,	www.ecs.soton.ac.uk
44	<u>Tara Cronin</u>	3	BioMed Central	Tara Cronin PR Assistant BioMed Central 236 Gray's Inn Road London, WC1X 8HB	http://www.biomedcentral.com/
	28 individuals	2			
	41 individuals	1			

Total number of people = 138

Total number of Postings = 1999

Appendix 2: Sample of Discussions (some examples)

Mailing List SPARC-OAForum@arl.org Message #5122

From: "AlanSingleton" <editor@alpsp.org>
Sender: <soalmgr@arl.org>
Subject: RE: Compact for Open Access Publishing Equity: key to transitioning to open access
Date: Fri, 18 Sep 2009 11:16:28 -0400
To: SPARC-OAForum

Mailing List SPARC-OAForum@arl.org Message #3965

FOR IMMEDIATE RELEASE

People on the Move: A Fedora-based Open Access Repository To Provide a World of Information on Forced Migration

Ithaca, NY, September 12, 2007-Anyone who has put a web site together about an interesting topic has seen its content expand in proportion to interest and use. Good information tends to become more complex over time as web site displays, interactive features, new kinds of content, web services, and access to multiple data storage facilities are added. Management of even modest online information facilities can end up being perceived by users as a patchwork of access and preservation-elegant pieces cleverly stitched together without a plan for how the information will persist-a liability for those who may need it most.

.....[Contents Deleted]

.....[Contents Deleted]

For more information on the OARS Project contact Mike Cave, Co-Director, mike.cave@qeh.ox.ac.uk, or Sean Loughna, Co-Director, sean.loughna@qeh.ox.ac.uk.

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Communications and Media Director
Fedora Commons <http://www.fedora-commons.org>

Cornell Information Science
301 College Ave.
Ithaca, NY 14850
607 255-2702
clt6@cornell.edu



Mailing List SPARC-OAForum@arl.org Message #5867

From: "Charles W. Bailey, Jr." <cwbailey@digital-scholarship.com>

Sender: <soalmgr@arl.org>

Subject: Institutional Repository Bibliography, Version 4

Date: Thu, 16 Jun 2011 15:35:29 -0400

To: SPARC-OAForum

Version four of the Institutional Repository Bibliography is now available from Digital Scholarship. This selective bibliography presents over 500 articles, books, technical reports, and other scholarly textual sources that are useful in understanding institutional repositories (see the scope note for details). All included works are in English. It is available under a Creative Commons Attribution-Noncommercial 3.0 United States License.

<http://digital-scholarship.org/irb/irb.html>

The bibliography has the following sections (all sections have been updated except "3 Multiple-Institution Repositories"):

- 1 General
 - 2 Country and Regional Surveys
 - 3 Multiple-Institution Repositories
 - 4 Specific Institutional Repositories
 - 5 Digital Preservation
 - 6 Library Issues
 - 7 Metadata
 - 8 Institutional Open Access Mandates and Policies
 - 9 R&D Projects
 - 10 Research Studies
 - 11 Software
 - 12 Electronic Theses and Dissertations
- Appendix A. Related Bibliographies
Appendix B. About the Author

Translate (oversatta, oversette, prelozit, traducir, traduire, tradurre, traduzir, or ubersetzen):

http://digital-scholarship.org/announce/irb_en_4.htm

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Best Regards,
Charles

Charles W. Bailey, Jr.

Publisher, Digital Scholarship

<http://digital-scholarship.org/>

A Look Back at 22 Years as an Open Access Publisher

<http://digital-scholarship.org/cwb/22/22years.htm>



Appendix 3: Digital Library Course Listing

Sl. No.	Course Code	Subject Name	University	URLs
1	553	DIGITAL LIBRARIES	The State University of New Jersey	http://comminfo.rutgers.edu/~tefko/Courses/553/553%20Fall%2002%20syllabus.htm
2	L566	Digital Libraries	OCLC Online Computer Library Center, Inc.	http://www.slis.iupui.edu/courses/syllabi/L566_su07_gemmiill.pdf
3	LIS 7410	Digital Libraries	Louisiana State University	http://slis.lsu.edu/syllabi/7410.pdf
4	CS 5244	Digital Libraries	National University of Singapore	http://www.comp.nus.edu.sg/~kanmy/courses/5244_2004/syllabus.html
5	ILS 655	Digital Libraries	Southern Connecticut State University	http://www.southernct.edu/~brownm/655_sp09_syllabus.html
6	INLS 235	Seminar in Digital Libraries	University of North Carolina at Chapel Hill	http://www.ils.unc.edu/~march/courses/235_s04/syllabus.html
7	CS 502	Computing Methods for Digital Libraries	Cornell University	http://www.cs.cornell.edu/Courses/cs502/2000sp/syllabus.html
8	LIBR 581	Digital Libraries	The University of British Columbia (School of Library, Archival & Information Studies)	http://www.slais.ubc.ca/courses/syllabi/10-11-wt1/1581.htm
9	CPSC 689/604	Special Topics in Digital Libraries	<u>Center for the Study of Digital Libraries</u> , Texas A&M University	http://www.csdl.tamu.edu/~furuta/courses/00c_689dl/syllabus.html
10	4IZ250	Digital Libraries	Integrated Study Information System University of Economics, Prague	https://pluto.vse.cz/katalog/syllabus.pl?predmet=72508
11		An automated syllabus digital library system for higher education in Ireland	University of Limerick, Ireland	http://www.emeraldinsight.com/journals.htm?articleid=1810760&show=pdf
12		Digital Library Education in Computer Science Programs	School of Information and Library Science, University of North Carolina	http://citeseerx.ist.psu.edu/viewdoc/download?doi=10.1.1.139.5069&rep=rep1&type=pdf
13	CS 745/845	Introduction to Digital Libraries	Old Dominion University	http://www.cs.odu.edu/~mln/cs745/syllabus.html
14	L576	Digital Libraries	School of Library and Information Science, Indiana University Bloomington	http://findsyllabus.com/430706/law-syllabus-digital-libraries-l576
15	e553	Digital Libraries	School of Communication & Information, The State University of New Jersey	http://comminfo.rutgers.edu/~tefko/Courses/e530/Course%20home/e553-Spring10Syllabus.doc
16		Digital Libraries	University of Iowa	http://www.uiowa.edu/~libsci/faculty/lu/digita

				l_libraries/syllabus.html
17	INFO 653	Digital Libraries	College of Information Science and Technologies, Drexel University	http://vll.ipl.org/learningobjects/syllabi/Digital%20Libraries%20Syllabus%20Dr.%20Lin%202011.doc
18			Digital Library Learning, University of Parma, Italy	http://dill.hio.no/programme/semester-3/
19		MSc in Electronic and Digital Library Management	The University of Sheffield	http://www.sheffield.ac.uk/is/prospectivepg/courses/edlm
20	MLIS 558	Digital Library Technologies	School of Communication and Information, Rutgers, The State University of New Jersey	http://comminfo.rutgers.edu/~jacekg/teaching/MLIS558e/Syllabus.htm
21	SI 640	Digital Libraries and Archives	University of Michigan School of Information	http://www.si.umich.edu/class/fall-2011/digital-libraries-and-archives
22	BMDD 1		Swedish School of Library and Information Science	http://www.hb.se/wps/portal/!ut/p/c0/04_SB8K8xLLM9MSSzPy8xBz9CP0os3hXX49QSydDRwMD10BzAyNjd_cwPx9PFzN3c_3g1Dz9gmxHRQBHflk5/
23	LIS 5472	Digital Libraries	Florida State University	http://shoh.cci.fsu.edu/DL-fa10-Syllabus.pdf
24	IRLS574	Digital Libraries	School of Information Resources and Library Science, The University of Arizona	http://sirls.arizona.edu/sites/sirls.arizona.edu/files/IRLS574_fall09_Botticelli.pdf
25	LIBR 559H	Planning and Managing Digital Collections	Simon Fraser University, Canada	http://interoperating.info/courses/libr559j/LIBR559H_Planning_and_managing_syllabus.pdf
26		Metadata & Digital Library Development	Library of Congress	http://www.loc.gov/catworkshop/courses/metadatadl/index.html

(Detailed contents of some of the courses are available with the author)

Appendix 4: Digital Library Course Listing – India

SNo	Name of University/Institution	Core paper/Optional	D.L. Course content
1	D.R.T.C., Bangalore	Core Semester II Paper IX Digital Libraries	DLs; Digitization: S/W, H/W; OCR; Open Standards and File Formats, Metadata; DL S/W DSpace, Eprints and Fedora; Harvesting Metadata; Digital Library Architectures; Digital Preservation; Multilingual digital repositories and Cross-language information retrieval
2	Karnatak University, Dharwad	Core Semester IV Paper: 4.2 Digital library and Multimedia theory	Unit 1: Digital library Unit 2: Design and Organization of DL Unit 3: Digital library Initiatives Unit 4: Digital Resource management Unit 5: Overview of Multimedia Unit 6: Multimedia authoring tools Unit 7: Web technology
3	NISCAIR, New Delhi	Core AIS Paper 7: Library Automation and Digital Libraries Short term training programme: Design and Development of Digital Libraries using DSpace	UNIT 1 – Library Automation UNIT 2 – Digital Libraries - Overview of digital library UNIT 3 – Digital Preservation Lab (Practical) Digital library: Installation, configuration & working in Greenstone/D Space Short term training programme: Digital Library: Concepts and software; Metadata: Linux; DSpace; Metadata Harvesting, Case studies, etc.
4	North Eastern Hill University (NEHU)	Core Semester IV: Paper: LIS-C402 Digital Libraries	(Details not available)
5	University of Mysore	Core Semester IV 4.3. Digital Libraries Paper 4.4. Digital Libraries – Practicum	Unit 1: Introduction to digital libraries. Unit 2: Content creation scanning, OCRing Unit 3: Creating Web documents- Mark Up Languages Unit 4: DL architecture. Unit 5: DL software. GSDL and DSpace.
6	Pondicherry University, Pondicherry	Core Semester IV Paper 4.2. Digital Libraries	Unit 1: Digital Libraries: Definitions, Fundamentals and Theoretical Aspects; Digital Library collections Major D L Initiatives, OAI Unit 2: Design and Organization; Architecture, Interoperability, Protocols & Standards Unit 3: Digital content creation: Electronic documents, files & formats & conversion to PDF Unit 4: Digital Resources Management; Access to and Use of Digital Libraries; Storage,

			Archiving and Preserving Digital Collections Unit 5: Digital Libraries Technology: Digital Software - D-Space, E-Prints, GSDL
7	University of Madras, Chennai	Core Semester IV Paper: CIS C215	Unit 1: Digital libraries – definition, fundamentals Unit 2: Design and Organization Unit 3: Major DL Initiatives, OAI Unit 4: Digital libraries Technology Unit 5: Digital Resource Management; Access to and Use Archiving
8	Sambalpur University, Burla	Core Semester III XXI: Digital Library and Information Sys XXII: Library Software practical	Unit 1: Digital library Organization Unit 2: Digital Preservation and Archiving Unit 3: Collection of Digital Libraries Unit 4: Trends in Digital Library R & D Unit 3: DL Software GSDL, DSpace
9	SHPT School of Library and Information Science, SNDT, Mumbai	Core Semester I (1+1)* Paper II: Digital Libraries (Theory) Semester II (1+1)* Paper VII: Digital Library (Practical)	Theory: Unit 1: Introduction Unit 2: Collection Development Unit 3: Collection Organization – HTML and XML; Unit 4: Access and Services Unit 5: Technology – Basics of H/W, S/W; Networks Unit 6: Management Planning, evaluation, IPR
10	Utkal University, Bhubaneswar	Elective Semester IV Paper XIV A: Digital Libraries	Unit 1: Digital Libraries – definition and characteristics etc. Unit 2: Digital Library Collections Unit 3: Digital Information Infrastructure Unit 4: Digital Users and Services Unit 5: Digital Library Initiatives and Projects
11	University of Mumbai, Mumbai	Core Semester I (1+1)* Paper II: Digital Libraries (Theory) Semester II (1+1)* Paper VII: Digital Library (Practical)	Theory: Unit 1: Introduction Unit 2: Collection Development Unit 3: Collection Organization – HTML and XML; Unit 4: Access and Services Unit 5: Technology – Basics of H/W, S/W; Networks Unit 6: Management Planning, evaluation, IPR
12	Jadavpur University, Kolkata	P.G. Diploma in Digital Library Management Semester 1: 4 Courses Semester 2: 4 Courses Semester 3: 4 Courses Semester 4: 4 Courses	D.L. Environment I and II (2 Papers) Info System Management I and II (2 Papers) Digital Document Management I and II (2 Papers) Information Technology and Library I and II (2 Papers) System Installation and Content Development I and II (2 Papers) Multimedia & Digital Archiving I and II (2 Papers) Digital Library Creation and Use I and II (2 Papers) Project I and II

(Detailed contents of some of the courses are available with the author)



Appendix 5: Details of the OA Workshops

Dominant Training Organizations and their list of Training Workshops

Sl. No.	Organisation	Details	URL's
1	GRDI - Global Research Data Infrastructures	5 Workshops	http://www.grdi2020.eu/Default.aspx
2	Open AIRE	5 Workshops	http://www.openaire.eu/en/news-a-events/news/295-open-access-co-ordination-workshop
3	CERN	7 Workshops	http://indico.cern.ch/conferenceDisplay.py?confId=103325
4	Open Access Week	7 Workshops	http://openaccessweek.org/events/open-access-workshop
5	EIFL	15 Workshops	http://www.eifl.net/eifl-OA-training
6	Association of African Universities	1 workshop, 1 Webinar	http://www.aau.org/
7	ENCES - European Network for Copyright in support of Education and Science	2 Workshops	http://www.ences.eu/
8	INASP (International Network for the Availability of Scientific Publications) and PERii	2 Workshops	http://www.inasp.info/
9	M S Swaminathan Research Foundation	2 Workshops	http://www.mssrf.org/
10	OASPA -Open Access Scholarly Publishers Association	2 Conferences, 1 Webinar	http://www.oaspa.org/
11	European Federation for Information Technology in Agriculture	1 workshop	http://www.efita.net/
12	NECOBELAC - Network of Collaboration between Europe and Latin America-Caribbean countries	4 Workshops	http://www.necobelac.eu/en/index.php

GRDI - Global Research Data Infrastructures

SL NO.	NAME	DETAILS	Url
1	Co-ordination Workshop on Open Access to Scientific Information	4 th May 2011 DG Information Society & Media, Avenue de Beaulieu 25, Brussels	http://www.grdi2020.eu/Pages/SelectedDocument.aspx?id_documento=0cd1dbee-5f9f-4472-868e-f54f66d7e508
2	Digital Libraries and Open Access. Interoperability strategies	The British Academy in London on 4 February 2011	http://www.grdi2020.eu/Pages/SelectedDocument.aspx?id_documento=b5079e58-95f6-4161-8002-f434fabd6f03
3	Open e-IRG Workshop	4-5 April 2011, The historical building of the Hungarian Academy of Sciences, Roosevelt-tér 9, H-1051 Budapest, Hungary	http://www.grdi2020.eu/Pages/SelectedDocument.aspx?id_documento=47252f8b-6683-4797-8720-91232f7871ca
4	The Sixth International Conference on Open	June 7 - 11 in AT&T Executive Education & Conference	http://www.grdi2020.eu/Pages/SelectedDocument.aspx?id_documento=217f15cd-



	Repositories (OR11)	Center, Austin, Texas	1dda-4d7d-8eff-eb68d1963146
5	Open Repositories 2010	6-10 July 2010, Madrid, Spain	http://www.grdi2020.eu/Pages/SelectedDocument.aspx?id_documento=0ae9212e-f7fa-4bac-b931-3bf8ec96c99d

OpenAIRE

SL NO.	NAME	DETAILS	URI's
1	Open Access co-ordination workshop	May 4, 2011 in Brussels	http://www.openaire.eu/en/news-a-events/news/295-open-access-co-ordination-workshop
2	OpenAIRE workshop for repository managers and Open Access advisors	Technical University of Denmark 09 September 2011. The event is open for all but the language of the workshop will mainly be in Danish.	http://www.openaire.eu/en/news-a-events/events/icalrepeat.detail/2011/09/09/51/-/openaire-workshop-for-repository-managers-and-open-access-advisors-
3	OpenAIRE @ Informatie aan Zee	Oostende, Belgium, 16 September 2011	http://www.openaire.eu/en/news-a-events/events/icalrepeat.detail/2011/09/16/52/-/openaire-informatie-aan-zee
4	OpenAIRE at COASP 2011	Tallinn, Estonia, 21 September 2011	http://www.openaire.eu/en/news-a-events/events/icalrepeat.detail/2011/09/21/49/-/openaire-at-coasp-2011
5	OpenAIRE at FREDOC Days 2011	Bordeaux, France, 11 October 2011	http://www.openaire.eu/en/news-a-events/events/icalrepeat.detail/2011/10/11/50/-/openaire-at-fredoc-days-2011

CERN

SI No.	NAME	DETAILS	URL's
1	CERN Workshop on Innovations in Scholarly Communication (OAI7)	The University of Geneva on 22-24 June 2011	http://indico.cern.ch/conferenceDisplay.py?confId=103325
2	CERN Workshop on Innovations in Scholarly Communication (OAI6)	The University of Geneva on 17th-19th June 2009	http://indico.cern.ch/conferenceDisplay.py?confId=48321
3	CERN Workshop on Innovations in Scholarly Communication (OAI5)	The University of Geneva on 18 th – 20 th April 2007	http://oai5.web.cern.ch/oai5/
4	CERN Workshop on Innovations in Scholarly Communication (OAI4)	The University of Geneva on 18 th – 20 th April 2007	http://oai4.web.cern.ch/OAI4/
5	CERN Workshop on Innovations in Scholarly Communication (OAI3)	The University of Geneva on 12 th – 14 th February 2004	http://oai3.web.cern.ch/oai3/
6	CERN Workshop on Innovations in Scholarly Communication (OAI2)	The University of Geneva on 11 th – 13 th October 2002	http://library.web.cern.ch/library/
7	CERN Workshop on Innovations in Scholarly Communication (OAI1)	The University of Geneva on 22 nd – 24 th March 2001	http://indico.cern.ch/conferenceDisplay.py?confId=a01193

Open Access Week

Sl. No.	Name	Details	URL's
1	Zukunftsgespräche Open Access 2010	October 18th and 19th, 2010 - Berlin, Germany	http://openaccessweek.org/events/zukunftsgespraeche-open-access
2	Open Access Week at Texas A&M	October 18th to 22nd, 2010 - Texas A&M University	http://openaccessweek.org/xn/detail/5385115:Event:41643
3	Open Access Week in Poland	October 18th to 24th, 2010 - Warsaw, Toruń, Gorzów, Poland	http://openaccessweek.org/events/open-access-week-in-poland
4	Open Access Week at JKUAT	October 18th to 24th, 2010 - Nairobi, Juja	http://openaccessweek.org/events/open-access-week-at-jkuat
5	Open Access Week at RECOLECTA	October 20th to 24th, 2010 - Spain	http://openaccessweek.org/events/open-access-week-at-recolecta
6	Open Access Week at the University of Minnesota	October 18th to 22nd, 2010 - University of Minnesota, Twin cities	http://openaccessweek.org/events/open-access-week-at-the
7	Open Access Week (and beyond) and UC Berkeley	October 20th to November 4th, 2010 - University of California, Berkeley	http://openaccessweek.org/events/open-access-week-and-beyond

EIFL

SL No.	NAME	DETAILS	URL's
1	Open Access 2011: Laos	Laos Library and Information Consortium (LALIC), National University of Laos and EIFL hosted a five-day workshop on Open Access and Digital Libraries using DSpace Software, on March 21-25, 2011, at the Central Library, National University of Laos. The workshop was funded by UNESCO and EIFL.	http://www.eifl.net/open-access-2011-laos
2	Open Access 2010: Botswana	Open Access and the Evolving Scholarly Communication Environment workshop, September 1 - 2, 2010, University of Botswana. Organised by EIFL, the University of Botswana, Botswana Libraries Consortium and Public Knowledge Project and funded by Carnegie Foundation and EIFL	http://www.eifl.net/open-access-2010-botswana
3	Open Access 2010: Kenya	Benefits of Open Access for Research Dissemination, Usage, Visibility and Impact workshop, August 30, 2010, Jomo Kenyatta University of Agriculture and Technology, Kenya.	http://www.eifl.net/open-access-2010-kenya

4	Open Access: 2010 Nairobi	Open Access and the Evolving Scholarly Communication Environment February 17 – 19, 2010, University of Nairobi. A workshop organised by Bioline International, eIFL.net and Kenya Libraries and Information Services Consortium.	http://www.eifl.net/open-access-2010-nairobi
5	Open Access: 2010 Senegal	Atelier national sur l'Accès Ouvert aux publications scientifiques et techniques au Sénégal (Open Access) Language - French 9 -10 février 2010 UCAD II, Dakar, Université Cheikh Anta Diop Le Consortium des Bibliothèques de l'enseignement supérieur du Sénégal (COBESS), organise en collaboration avec eIFL.net dans le cadre de son programme «Open Access », un atelier national sur les archives ouvertes (OA) au Sénégal, les 9 et 10 février 2010 à la salle multimédia de l'UCADII de l'Université Cheikh Anta Diop de Dakar.	http://www.eifl.net/open-access-2010-senegal
5	Open Access: 2009 Nigeria	2nd – 4th November, 2009, Ahmadu Bello University, Zaria, Nigeria. The workshop organized by Department of Library and Information Science, A.B.U Zaria, Nigeria in collaboration with eIFL.net and Nigerian Universities Library Consortium.	http://www.eifl.net/open-access-2009-nigeria
6	Open Access: 2009 Malawi	Open Access Advocacy Workshop: Maximising Research Quality and Impact 29-30 October 2009 organised by Malawi Library and Information Consortium (MALICO), Malawi Research and Education Network (MAREN), Southern African Regional Universities Association (SARUA) and eIFL.net.	http://www.eifl.net/open-access-2009-malawi
7	Open Access: 2009 Nepal	Open Access: Maximising Research Quality and Impact workshop in Nepal July 22-23, 2009, Kathmandu. Organised by Nepal Library and Information Consortium (NELIC) and eIFL.net. Supported by the Foundation Open Society Institute.	http://www.eifl.net/open-access-2009-nepal
8	Open Access: 2009 Crimea	Open access repositories seminar at Crimea 2009 Organised on June 11, 2009, by eIFL.net and GPNTB at the Sixteenth International Conference Crimea 2009: Libraries and Information Resources in the Modern	http://www.eifl.net/open-access-2009-crimea

		World of Science, Culture, Education, and Business, Sudak, Autonomous Republic of Crimea, Ukraine.	
9	Open Access: 2009 Palestine	Open Access: Maximising Research Impact workshop in Palestine May 25-26, 2009. Birzeit University Library, Palestine. Organisers: Palestinian Library and Information Consortium, Birzeit University Library, Telemark University College Library, Norway, and eIFL.net.	http://www.eifl.net/open-access-2009-palestine
10	Open Access: 2009 South Africa	Gaining the momentum: Open Access and advancement of science and research 14 May 2009, CSIR Conference Centre, Pretoria, South Africa. Workshop in the frames of African Digital Scholarship & Curation 2009	http://www.eifl.net/open-access-2009-south-africa
11	2009 Bulgaria	Open Access: Maximising Research Impact workshop in Sofia April 23-24, 2009, New Bulgarian University Library, Sofia, Bulgaria.	http://www.eifl.net/open-access-2009-bulgaria
12	Open access: 2008 Italy	Program Details Open Access publishing and repository design for science electronic Information For Libraries www.eIFL.net Open repositories: case studies and check lists Open Access potential and advantages Open Access journals: case studies Open Access policy and advocacy Open content licenses Creative Commons for open repositories	http://www.eifl.net/open-access-2008-italy
13	Open access: 2008 Moldova	June 23-24, 2008, Chisinau, Moldova Language - Russian	http://www.eifl.net/open-access-2008-moldova
14	Open access: 2008 Ukraine	June 19, 2008, Kyiv, Ukraine Language - Ukrainian	http://www.eifl.net/open-access-2008-ukraine
15	Open access: 2008 Georgia	May 14-15, 2008, Tbilisi, Georgia Language - Georgian	http://www.eifl.net/open-access-2008-georgia

Association of African Universities

Sl. No.	Name	Details	URLs
1	Open Access Institutional Repository Sensitization Workshop	18th-19th July, 2011 - Accra, Ghana	http://events.aau.org/introduction.php?id=32&/lang=en
2	Open Access Repositories: Capacity Strengthening Programme for Africa (OA - IRCSP) Webinar	27th July, 2011	http://www.ir-africa.info/

ENCES - European Network for Copyright in support of Education and Science

Sl. No.	Name	Details	URLs
1	Copyright and Open Access book publishing	15th February, 2010 - Amsterdam	http://www.ences.eu/workshop-10-amsterdam/
2	Open Access Workshop	20th October, 2010 - Tartu, Berlin	http://dspace.utlib.ee/dspace/bitstream/handle/10062/17012/tartu_oa_kuhlen.pdf?sequence=1

INASP (International Network for the Availability of Scientific Publications) and PERii

Sl. No.	Name	Details	URLs
1	Institutional Repository Workshop / Dspace	1-3 October, 2008 - Pretoria, South Africa	http://www.inasp.info/file/348f087311c354f26b306e51421af6f4/institutional-repository-workshop-dspace.html
2	National Institutional Repository Workshop	4-6th May, 2010 - Zimbabwe	http://www.inasp.info/file/5098d76bf8fd2eae71d3d4939a65b543/zimbabwe-events.html

M S Swaminathan Research Foundation

Sl. No.	Name	Details	URLs
1	Open Access and Institutional Repository Workshops	2-4 May, 2004 - Chennai	http://www.utsc.utoronto.ca/~chan/oaindia/
2	Open Access and Institutional Repository Workshops	6-8 May, 2004 - Chennai	http://www.utsc.utoronto.ca/~chan/oaindia/

OASPA -Open Access Scholarly Publishers Association

Sl. No.	Name	Details	URLs
1	The 3rd Conference on Open Access Scholarly Publishing (COASP 2011)	21-23 September, 2011 - Tallinn, Estonia Language - Estonian	http://www.oaspa.org/coasp/index.php
2	The 2nd Conference on Open Access Scholarly Publishing (COASP)	22-24 August, 2010 - Prague, Czech Republic	http://www.oaspa.org/coasp2/index.php
3	Open Access week webinar	20th October, 2009	http://www.oaspa.org/webinars/oaweek2009/

European Federation for Information Technology in Agriculture

Sl. No.	Name	Details	URLs
1	Virtual Open Access Agriculture & Aquaculture Repository (VOA ³ R) workshop	13th July, 2011	http://voa3r.blogspot.com/2011/04/welcome-to-2011-efitavoa3r-workshop.html



**Network of Collaboration Between Europe and Latin America-Caribbean Countries – Project
NECOBELAC**

SL NO.	NAME	DETAILS	URL's
1	1st Luso-Brazilian Conference on Open Access	Minho, Braga, Portugal , 25-26 November 2010	http://www.necobelac.eu/projects/index.php?event=2010-11-25-Minho.html&la=en
2	Building Knowledge Europe: the Role of Open Access	Rome, Italy, 18 October 2010	http://www.necobelac.eu/projects/index.php?event=2010-10-18-Rome.html&la=en
3	Open Access to Science Information	Policies for the Development of OA in Southern Europe, Granada, Spain, 12-14 May 2010	http://www.necobelac.eu/projects/index.php?event=2010-05-12-Granada.html&la=en
4	Open Access to information for the safeguarding of public health: Which opportunities from the NECOBELAC network?	1st Workshop IILA-ISS, Rome, Italy, 19 October 2009	http://www.necobelac.eu/projects/index.php?event=2009-10-19-Rome.html&la=en