

Scholarly publishing within an eScholarship framework – Sydney eScholarship as a model of integration and sustainability

Ross Coleman

Sydney eScholarship

University Library

University of Sydney

New South Wales, Australia

r.coleman@library.usyd.edu.au

Abstract

This paper will discuss and describe an operational example of a business model where scholarly publication (Sydney University Press) functions within an eScholarship framework that also integrates digital collections, open access repositories and eResearch data services. The paper will argue that such services are complementary, and that such a level of integration benefits the development of a sustainable publishing operation. The paper describes the business model as a dynamic hybrid. The kinds of values considered include tangible and intangible benefits as well as commercial income. The paper illustrates the flexible operational model with four brief cases studies enabled by integrating repository, digital library, and data services with an innovative publishing service.

Keywords: eScholarship; scholarly communication; Sydney University Press; eResearch; data publication

1 Introduction

Hardly a week goes by without some new challenge to scholarly communication that demands attention, and occasionally, perhaps, a pause to get some bearings. Information technologies and the opportunities of the semantic web and Web 2.0 on one side, the complexity of rights and open or managed access on another, and on, yet another side, the need for sustainable and viable business or operational models. Beneath a yawning divide between the corporate publishing world and that of the institutions (and within the institutions the relationships between the traditional presses and the emerging e-presses), and overlaying all the power and omnipresence of the global search engines. Approaching over the horizon is the demands and complexity of e-research – as cyberinfrastructure, but also authoritative data itself as a form of publication.

The decisions being made now about how to best engage in this environment are not the final solutions. What we need is the best kind of foundations - flexible, responsive, light and open – on which to build the new scholarly publishing and communications structures of the future. A tired cliché, but true - continuing change is the only certainty.

Nor are there any single solutions – we need to work within innovative frameworks that accommodates this diversity and these challenges and opportunities; and frameworks that facilitate new partnerships. The framework we have chosen to work within is that of eScholarship

As there are no single solutions, this model must be a dynamic hybrid, seeking to respond and deliver to the diverse and changing set of demands and markets. A model providing solutions for the creators and the consumers of scholarly publications.

This paper will discuss an operational program and a business model or methodology where scholarly publication functions within an eScholarship framework that also integrates digital collections,

open access repositories and eResearch data services. The paper will argue that such services are complementary, and that such a level of integration benefits the development of a sustainable publishing operation. This argument will be illustrated with results in four brief case studies.

The primary platform for scholarly publishing at the University of Sydney – Sydney University Press – operates as an integral part of the University Library’s Sydney eScholarship program [<http://escholarship.usyd.edu.au>].

2 Discussion - on eScholarship, publishing, sustainability and integration

Sydney eScholarship operates as an integrated set of services, characterised by:

- commitment to standards for archiving and re-use
- delivery capabilities - publishing services for books, journals, conferences, new forms
- stable open digital repository services
- project analysis and planning advice
- digital library collections and services
- business planning, legal compliance and secure e-commerce capabilities
- partnerships, collaborations and opportunism

2.1 eScholarship

We at Sydney were inspired by the vision of eScholarship originally enunciated by the California Digital Library (CDL):

“eScholarship ... facilitates innovation and supports experimentation in the production and dissemination of scholarship. Through the use of innovative technology, the program seeks to develop a financially sustainable model and improve all areas of scholarly communication...” [1]

CDL continues to explore sustainable models, and acts as a leader in innovation developing services and tools. For example XTF (eXtensible Text Framework) being implemented across a number of digital library and publishing services, including at Sydney

The term “eScholarship” is used variously according to context or, indeed, convenience. Most common use is in regard to digital repository services (Boston, Queensland et al), and sometimes as a catch-all descriptor for services associated with digital activities in higher education. [2] If there is any commonality in usage it is in reference to a digital archive services.

At Sydney we have taken a broader understanding of eScholarship - as an overarching framework.

This vision enunciated by CDL enabled us to conceptualise, and implement a coherent approach to deliver the strategic and operational ambitions for many of the Library’s digital collection and publishing activities. It allowed us to articulate the relationships underlying these activities, and the new roles and expectations in integrating digital collections, open repository services and emerging eResearch support services at the University with a publishing operation.

Importantly it has allowed us to address these activities and relationships pragmatically, offering a set of services that we feel are operationally sustainable, beneficial and productive.

The service components of Sydney eScholarship and the business model underlying these operations will be discussed below, after briefly considering the concept of sustainability.

2.2 Sustainability

Sustainability is one of those comforting aspirational - but slippery - goals, depending on context. Some insight into the complexity of sustainability in the digital environment was gained through participation in the federally funded Australian Partnership for Sustainable Repositories (APSR) [3].

Digital sustainability is described by Kevin Bradley in his *Sustainability Issues Discussion Paper* for APSR [4] as being technical, social and economic.

Bradley describes the following as aspects of sustainability.

- The sustainability of the raw data - the retention of the byte-stream.
- The sustainability of access to meaning - content remaining meaningful for creator and user.
- The economics of sustainability – continued existence of the institutions that support the technology.
- The organisational structure of digital sustainability - relationships between the rights holder, the archive and the user.
- The economics of participation – matters of incentives and inhibitors.
- Sustainability and the value of the data – the value through the life-cycle
- Tools, software and sustainability

Central to any practical discussion of sustainability, and implicit in Bradley's discussion, is the need for organisational continuity. Such a key requirement also underlies similar topologies such as the attributes and responsibilities of the Trusted Digital Repository. [5]

The traditional purveyor of curatorial continuity for publication is the library. While this does not necessarily need to be so in the future, it does explain the repository role of many libraries – in terms of assertion and expectation [6]. In Australia, these roles have been formalised as libraries are funded to provide repository services for various government research assessment initiatives, such as the new Excellence for Research in Australia (ERA) program replacing the Research Quality Framework (RQF) [7], or in the UK for the Research Assessment Exercise (RAE) [<http://www.rae.ac.uk/>]

The library at many universities, like Sydney, is often the only organisational and curatorial entity that has existed (in one form or another) throughout an institution's history. The viability of services such as Sydney eScholarship, committed to the long term management and preservation of digital content, relies to a large extent on organisational continuity as part of the University Library,. Indeed, this association has raised the expectations by researchers of libraries having a central role in supporting such initiatives.

In a practical sense to have any ambition toward providing sustainable information services over the longer term organisational continuity and commitment is important. But this needs to be accompanied by the appropriate skills and expertise, infrastructure services with forward development plans, an innovative, proactive and responsive approach, and a viable and demonstrable operational or business plan to ensure future funding. Within a publishing environment the business plan is critical (even if the plan is 100% institutional subsidy)

2.3 eText to eScholarship

The Sydney eScholarship program was formally launched in 2006, but these services (and the appropriate skills sets) had been evolving over a decade, since the establishment of SETIS (Sydney Electronic Text and Image Service), in the mid 1990s.

SETIS was initially established as an eText centre in 1996, similar to many other in the US, and due in part to the missionary zeal of a visiting David Seaman, then at Virginia. The evolution of SETIS from a service networking commercial full text databases to a service creating etext collections was rapid. The skills translated easily from one service to the other. These services provided a platform for the creation of text and image based digital library collections.

The expertise built up during the 1990s gave SETIS a national reputation in creating and managing such text collections, with a focus on Australian studies [<http://setis.library.usyd.edu.au/oztexts/>] This reputation has grown through active partnerships in major research grants in Australian literary and historical studies. The first major project for SETIS to create and provide full text of primary (literary) and secondary (critical) texts for AUSTLIT, [www.austlit.edu.au] the major Australian literary bibliographical and biographical database, funded through Australian Research Council (ARC) grants. This commitment to AUSTLIT continues with ongoing digital conversion of selected literary works.

A production process for digital conversion was developed for this and other projects. To ensure the highest possible accuracy digital conversion involved the double-keying of texts. We eventually settled on a preferred vendor in Chennai, India, and this company remains our major production vendor for digital conversion. Texts were converted and XML files were returned in our established DTD with basic structural mark-up. Further mark-up to the TEI (Text Encoding Initiative) guidelines, and processing took place in SETIS and the XML files were rendered into HTML and web PDFs depending on requirements.

The textual corpora created by SETIS – XML based collections with a range of presentation options - provided Sydney with leadership and acknowledged expertise in creating primary source text collections in Australian studies. The role of SETIS as the primary full text manager in Australian literature also provided the opportunity to consider establishing a publishing operation to meet the demand for print versions. Our Indian vendor - also a production house for several major European publishers – provided additional services such as type-setting for potential print production.

The reputation of SETIS continues to bring new and exciting collaborations, consolidating our role, and providing the innovative impetus and funding for much of the new major project work done in Sydney eScholarship

2.4 Sydney University Press and Sydney eScholarship

Sydney University Press (SUP) had existed as a traditional print publisher and press. It was initially established by the University in 1962, but after 25 years of operation was effectively dismantled due to the heavy infrastructure costs. Over this period SUP produced a major list of over 600 titles and several major journals. In 1987 the SUP imprint was sold by the University to Oxford University Press. The imprint was then used mostly for textbooks, but eventually relinquished by OUP in the early 1990s, and the business name and imprint were abandoned. The University re-registered SUP in 2003 under Library management “to address the challenges of scholarly publication in the networked environment”

The reputation of SETIS as a digital library platform facilitated the re-establishment. *Case Study # 1 – digital library to publisher, Classic Australian Works*, 4.1 below describes how the operation and reputation of SETIS was fundamental to re-establishing SUP.

Sydney University Press [<http://www.sup.usyd.edu.au/>] was revived in the same milieu as a number of new e-presses (many associated with libraries). In Australia these included Monash e-Press, ANU e-Press and UTS e-Press.

Though SUP was re-established in this context a decision was made to stay with the name Sydney University Press, and not adopt an e-Press banner. There were several reasons for this: it was an established brand name, we were determined to be a print as well as electronic publisher, and we needed to present a business case that would include its operation as a commercial publisher generating income.

Sydney eScholarship was established as a set of innovative services for the University of Sydney to integrate the management and curation of digital content and research with new forms of access and scholarly publication. Within this framework a viable publishing operation was important to add value to the set of services. The business components of this ‘adding value’ are discussed in the methodology of the business model, section 3 below, but real and tangible value flows through all the services of Sydney eScholarship.

As a commercial publisher SUP publishes new editorially accepted and market tested titles, as well as a growing re-print list. All titles are electronically archived and sold print on demand or short run.

While publishing provides transactional value, the digital library collections and the repository manage content and provide the sound archival foundation to facilitate publishing services. In reality each service provides functional value to the other. Publications derived from associated data sets, described in *Case study # 2 – data to publication – from surf to city*, 4.2 below, are increasingly part of this value chain.

Within the digital environment the key to the value chain (or value circle) is the capacity to re-use, re-present or re-engineer content into different environments. Depending on circumstances this may be into an open access environment or a managed or commercial environment. This capacity to address different demands is an essential part of operational viability. The *Dictionary of Sydney* project, another ARC research project [www.dictionaryofsydney.org/] in which we are a partner, explicitly has such a model of content re-use and re-engineering in both open and commercial spheres, to ensure the sustainability of the project when research funding ceases. This includes forms of publication via SUP

In this operational context Sydney eScholarship can be broadly understood as an integration of the Sydney Digital Library (creating, managing and curating content) and Sydney University Publishing (providing associated business and publishing services). This is outlined in the table below

Sydney eScholarship	
<u>Sydney Digital Library</u> <ul style="list-style-type: none"> • eScholarship repository • SETIS digital collections • Sydney Digital Theses • Data project analyst and advisory services • hosting subject data services 	<u>Sydney University Publishing</u> <ul style="list-style-type: none"> • Sydney University Press • other imprints • digital / print on demand services • eStore, eCommerce and business services • experimental publication

Table 1 : Sydney eScholarship services

Sydney University Publishing, while centred on SUP, does provide other services, many of a business nature. SUP is established as a commercial and scholarly imprint, and this identity needs to be maintained both as a quality publisher, and one that complies with formal ‘research publication’ requirements. We do provide other imprints, such as Darlington Press, for more popular or semi-academic titles. We provide print-on-demand services for other publishers such as Monash ePress and UTS ePress, as well as for administrative services, such as University Faculty Handbooks etc. We will also provide a secure eStore service for the sale of other published content, in print, and soon in electronic form.

A niche area of increasing interest is conference publication, as a form requiring rapid and open publication. The PKP Open Conference System (OCS) provides the publishing platform. We also provide an Open Journal System (OJS) platform. These are integrated into the repository services, as illustrated in *Case study # 3 - repository and publishing – open and managed access*, in 4.3, below

SUP is also interested in providing platforms for experimental types of publication, such as multi-media streaming. Toward this end SUP recently produced/published its first music CD, *Wurrurrumi Kun-Borr*. This CD was the joint winner of the 2007 Northern Territory Indigenous Music Awards, and the first in a series from the National Indigenous Recording research project.

The new Sydney University Press was established to integrate expertise in handling digital content with a production facility to provide a viable print-on-demand service, and a secure eStore service for commercial sale. It provided the production capacity to meet the formal requirements of research publications.

2.5 Nature of a research publication

In Australia there is currently a formal set of requirements that define (for funding purposes) a ‘research publication’. These requirements do proscribe different modes of scholarly publication, but at the

same time provide a useful and defensible set of criteria that provides (for good or bad) some benchmarks for research publication. Not surprising, meeting these requirements are fundamental elements in any scholarly publishing model. Publications that meet this definition generate research points that are converted into federal research funds – so publication output is important for both individuals and institutions.

The definition of a research publication is outlined in the Higher Education Research Data Collection (HERDC) 2008 specifications [8]

“For the purposes of these specifications, research publications are books, book chapters, journal articles and/or conference publications which meet the definition of research, and are characterised by:

- substantial scholarly activity, as evidenced by discussion of the relevant literature, an awareness of the history and antecedents of work described, and provided in a format which allows a reader to trace sources of the work, including through citations and footnotes
- originality (i.e. not a compilation of existing works)
- veracity/validity through a peer validation process or by satisfying the commercial publisher processes
- increasing the stock of knowledge
- being in a form that enables dissemination of knowledge” [print or electronic]

Publishing within an eScholarship framework enables us to both comply with these specifications and to investigate other types or modes of publication that still meet the fundamental characteristics of ‘research publication’. One area of growing pressure is the need for the creation of authoritative data sets to be recognised as a valid research activity, and perhaps recognised as a ‘publication’ for funding purposes. Appendix 1 illustrates how a data set may comply with the formal characteristics of a research publication

3 Methodology - the business model

The historical change in scholarly publishing is facilitated by technologies which have enabled new business and strategic approaches. This is an operational shift in publishing from retail-type single product (eg print-run, journal volume etc) to a dynamic services framework. This is more than multi-channel distribution; it is an ongoing process that allows for re-use and re-mix facilitated by archival formats that enable content to be used in different contexts and markets. This is illustrated in *Case study # 4 – literary re-use and customisation – APRIL*, 4.4 below.

3.1 A dynamic hybrid

The development of an operationally ‘financially sustainable’ model (that is, one that generates income) was fundamental to the medium term planning of Sydney University Press. The model needed to meet appropriate scholarly and market needs, provide commercial income generating services, as well as the capability to generate research points. It also needed to work in the new information environment that facilitates the benefits of open access, and the challenges and opportunities of packaging and re-use of eResearch as publication.

This business model is based on a hybrid operational and philosophical approach to scholarly publishing, and a broad recognition of the various elements of value in a business model.

The hybrid approach is demonstrated in the capacity to deliver both digital and print (including on demand) content as appropriate, and in a capacity to mix both open-access and paid delivery of publications as appropriate. This dynamic hybrid model enables response to different demands, requirements and markets. Publication outputs will take the forms appropriate for the work, the readership and the market.

There is a continuing market demand for printed works which is serviceable in a digital print environment.. Electronic delivery is currently downloadable free PDFs because of functional constraints with the eStore. A current eStore upgrade will provide the capacity to extend services to sell e-versions in whole or in part.

As a delivery mechanism print on demand (PoD) from stored files ensures that theoretically a work is never out of print. In a business sense this provides the long tail for publishing, where production is most cost-effective, and where a long list with low inventory and turnover contributes towards a viable business proposition. This is part of the business strategy behind Amazon BookSurge, and is also – on a more modest scale – a business strategy behind SUP. A business strategy enabled through text archiving processes of the digital library. It is a point where the digital library crosses into business.

This dynamic hybrid model does provide a flexible approach. Importantly it allows us to alter and adapt the mix of delivery modes as technology, demands and markets shift. In a context of continual change this flexibility is critical.

Another advantage of a business approach is that it - ironically perhaps - provides a particular credibility with authors, partners, the media and the trade.

When SUP was first conceptualised we envisaged that most sales would be via the web site, direct to customers. However, currently about half of sales are into the trade, to both retail bookshops and library suppliers. This did require a review of how pricing was structured to include a margin for trade discount, and some careful thought about price points etc.

SUP is not exclusively a Sydney University publisher; to be so would only be self-serving, and ultimately self-defeating for a scholarly publisher. In 2007 only about half of new titles were associated with University of Sydney staff.

Our first goal in terms of business viability is operational self-sufficiency. That is, from direct and indirect income we cover all production costs including editorial, copy-edit, indexing where needed, design, layout, proof copies and final copies for legal deposit, review, authors etc, and some internal staff costs. This goal has largely been achieved. Core staffing (business manager) is currently provided by the Library.

3.2 Types of value

We take a broad view of business planning and strategies, and recognise that that the values in this model are more complex than only forms of income, we must consider other real value and benefits that also accrue to individuals and institutions.

The value elements of this model can be expressed in a simple matrix form

Direct income (sales etc)	Tangible benefits (metrics etc)
Indirect income (subsidies, points etc)	Intangible benefits (authority, brand etc)

The nature these value elements

- **Direct income** - from SUP publishing sales and diversified income from print-on-demand services. This income accrued via eStore sales is split between SUP, and the Library for infrastructure
- **Indirect income** - to SUP in the form of subsidies to assist with publication, common in scholarly publishing. Although preferring a level of subsidy, SUP has taken the whole commercial risk with several titles, and recouped through sales or royalty sacrifice. Another, more, substantial indirect income - though not necessarily to SUP - is accrual to the individuals and universities through research publication points funding by the government (2.5 above). This underwrites some subsidies.

- **Tangible benefits** - to individuals include higher metrics and profiles for citations and downloads due to open access, internal institutional efficiencies by utilizing services such as PoD; and the potential rationalisation of diverse publishing operations
- **Intangible benefits** - relate to prestige and recognition through an active scholarly press, and increased individual and institutional research publication productivity

3.3 Practicalities – legals, marketing and risk

Fundamental to the business process is the contractual basis under which publication is facilitated. All SUP contractual templates comply with University legal requirements, and have been developed with external intellectual property legal advice. Within all these contracts authors retain their copyright, SUP only licences for publication. This enables authors to deposit their content in other repositories. This complies with an open access orientation, as described in Case study 4.3

Marketing remains a major issue, as SUP does not operate in the traditional trade, high advertising, high inventory and distribution environment. Marketing is to the niche with a tailored marketing plan for each title, with little general advertising. SUP uses targeted media releases and media networks. Publication details are added to all the book-trade lists, and have a small number of preferred independent book retailers. Like many publishers, SUP is negotiating to join GoogleBooks and have signed with AmazonBooksurge for delivery into the North American markets. Marketing is still an area requiring more effort and lateral thought.

Issues of risk have been considered from several perspectives. Legal risks and exposure across all the activities of Sydney eScholarship have been canvassed at length with the University Office of General Counsel. The outcomes of these discussions often takes the form of approved templates for contracts, deeds, agreements, memos of understanding etc with project partners, for repository contributors, for data hosted on our servers, and for authors. These discussions have sometimes involved the need to resolve differing views about exposure through open access and assumed loss of intellectual property rights. SUP does need to comply with university legal requirements (including copyright), and, despite some frustrations, often arrive at a level of common agreement that enables services to operate largely as we envisage. It is very important that we liaise closely with legal counsel, and continue to have a good and open relationship with them.

The other level of risk is around the publishing operation itself. At the time of establishment SUP was subject to a risk assessment, in terms of production services, internal relationships, external partnerships, and initial support. We have been cognisant of these risks, and at all times have contingencies and alternatives planned for technical, production and business disruption.

However, it has been accepted that developing new and innovative services does require the University and the Library to accept a degree of risk. This has been minimised as much as possible in legal terms. The benefits of these services and the value they add in terms of improved access and communication of university research in the new information environments has been embraced over any risks that may emerge

4 Results – the case studies

While, for SUP, print services and sales continue to be a key part of business operations, the importance of integration within the eScholarship framework is fundamental to success. The working relationships through these kinds of integration, and the benefits in terms of productive scholarly outcomes, are described in the case studies, below.

4.1 Case study #1 – digital library to re-print publisher – *Classic Australian Works*

As already noted SETIS had built a reputation for creating and managing literary full text in the scholarly environment. As part of a digital library collection these texts were maintained in archival forms

(XML) for rendering into a range delivery modes. In 2003 the Library was approached by the Copyright Agency Ltd (CAL), the national agency for overseeing copyright enforcement to discuss a project to bring back to the market in a cost-effective way works of literature that were out of print, but still in copyright. CAL had initially approached the National Library of Australia (NLA) to partner the project, but they had referred CAL to Sydney because of our reputation in text creation and archiving (we had partnered with the NLA in other digital projects). The project proposed by CAL was for them to contribute to the establishment of a print-on-demand publishing operation, and to clear the reproduction rights of the books to be re-printed. In return we would convert and archive the works, establish a publishing operation, a secure web-based eStore for commercial sale, and production service to facilitate print-on-demand.

So the revival of Sydney University Press was set. It was re-established as a light infrastructure integrated on top of existing university services: the SETIS digital text expertise; the digital print capacity of the University Printing Service; and the secure e-commerce transaction service of central IT.

The *Classic Australian Works* series was established as a partnership between SUP and CAL, and twenty-five major 'classics' from twenty authors were selected as the initial tranche. After the series launch we were faced with the challenges of managing a commercial operation, marketing and a whole host of related challenges. The *Classic Australian Works* series continues with new reproduction of works and a new editorial presence.

The infrastructure developed through this initiative provided the initial production and business foundations for the new Sydney University Press. It is important to appreciate that SUP was re-established through an actual business opportunity and demand, not as the result of an administrative decision. This has set the tone and direction of SUP as a viable business operation.

4.2 Case study # 2 – data to publication – from surf to city

While a data set itself is not recognised as a form of research publication [though it is possible to peg the characteristics of a research publication against a data set, appendix 1], it is possible for some forms of data set to be converted into research and commercial publication. Publication of some data does work well within the context of re-use and re-mix. SUP has published works derived from research data sets. Associated with this is action to also ensure the technical sustainability of the data, as described by Bradley (2.2, above)

The major example is the “*Beaches of the Australian Coast*” series, currently published in seven volumes, representing states or regions in Australia. This series was derived from a substantial scientific data base detailing every one of the over 10,600 beaches around Australia. The data base covered over 30 elements for each beach including geomorphology, tidal and surf data, safety and recreational data, as well as images of all beaches. While used primarily as a marine data base, the possibilities for publication were obvious, in the form they are now published, but also potential for re-use or re-mix around particular themes (fishing beaches etc). The state of the data base itself (on a myriad of excel files with little back-up) is the subject of re-building into an XML based data base which will be archived by the Library for current and future research. The data base does provide benchmark data on beaches important for climate change studies.

Another example of publication is from a data set (also being archived) is on urban planning legislation and practice in Australia. Parts of this data base were rendered to publication as *Australian Urban Land Use Planning: Introducing Statutory Planning Practice in New South Wales*. This work is used both as a text and a reference work (and data base) by planners.

4.3 Case study # 3 - repository and publishing – open and managed access

The Sydney eScholarship repository – a DSpace installation – provides a secure open access repository service. It provides the storage foundation of the Sydney Digital Library, and the SUP archive. While SUP does operate as a commercial publisher we are committed and oriented to open access wherever possible.

The publishing contract templates we use, which comply with university general counsel requirements, permit authors to retain their rights and allow deposit of content in other repositories. All conference papers and chapters in edited works (unless specifically blocked by the author) are openly accessible via the repository, and are regularly harvested by services such as GoogleScholar. The full work or conference is still available as a completed print work, and remains so as a print-on-demand file, with a link between the repository and the SUP eStore. There is demand for both the print volume and open access at the paper level. Print-on-demand (PoD) satisfies the low print demand in a cost-effective way.

In the publication process we do need to ensure that the editorial processes meet the formal requirements of peer review so that individual authors receive due research publication recognition. This recognition is provided irrespective as to whether it is distributed in print or electronic form, as long as the criteria of research publication are met.

A repository service does fit neatly into a publishing operation, indeed it is a fundamental part of the operational model to ensure that content remains continually available over the long term.

4.4 Case study # 4 – literary re-use and customisation - APRIL

A project funded by the Australian Research Council (ARC) with industry linkage with CAL (Copyright Agency) is the *Australian Poetry Resources Internet Library (APRIL)*. [<http://april.edu.au/>]. This has been funded as a research project to study the reception and readership of Australian poetry. The project involves the digitisation of the complete works of over 300 Australian poets in the first phase (with associated video and audio of interviews, readings etc). About half of these works are still in copyright, and permissions will be cleared by CAL. This project is one of several supported by CAL from its Cultural Fund to encourage the study and appreciation of Australian poetry and plays.

The text of the poems will be double-keyed and also represented as images. The text will be archived in SETIS as TEI tagged XML. The content will be rendered via Cocoon from within an XTF framework. It will be RDF (Resource Description Framework) capable for semantic web environments.

Several publication options are also being investigated as part of the project. These are looking to the re-packaging and delivery of anthologies in different contexts, including education and general readership. The processes of producing and selling client customised anthologies of poems by print on demand through SUP are being investigated as part of the project. This is a design and production challenge for publication. At the rights and business level the use of DOIs (Digital Object Identifiers) will articulate and record the transactions for each poem and poet. This work is in the first year of a three year project, but again illustrates the benefit in integrated digital library and publication services to enable new and experimental modes of publication.

5 Conclusion

The four case studies illustrate the kinds of benefits and synergies that are enabled by integrating repository, digital library, and data services with an innovative publishing service. The capacity of that service to deliver diverse content required the dynamic hybrid operational and business model described in this paper.

As hypothesised at the start of this paper, there are no single publishing solutions. These case studies illustrate the need to be able to deliver in different circumstances - to be able to provide appropriate publishing solutions in different contexts.

Managing a commercial publishing operation does raise questions whether this is a proper role for a library. At the University of Sydney Library it is regarded as an appropriate role, an extension of the traditional roles of preservation and access. A publishing service is regarded as integral to the Library providing leadership in addressing the challenges of communicating research and scholarship in the new contexts of networked information services.

The services integrated through Sydney eScholarship provide the fundamental components to facilitate and support innovative digital projects within the semantic web, and provide stable archival

platforms for research. The association with a publishing enterprise that operates in both commercial and open environments provides a service that is attractive to researchers requiring recognized 'research publications' and the benefits of secure archiving and open access.

Within this integrated eScholarship framework each service adds value to the other – each benefits the other. This is the kind of framework that can contribute to sustaining the new models of scholarly publishing

Notes and References

- 1 accessed from CDL site in October 2005
- 2 For example, in Australia the eScholarship Research Centre at the University of Melbourne is a research and data archive group within an ITC unit, and no publishing agenda - www.esrc.unimelb.edu.au/
- 3 Australian Partnership for Sustainable Repositories (APSR) - <http://www.apsr.edu.au/>
The APSR Project aims to establish a centre of excellence for the management of scholarly in digital format. The project has four interlinked programs:
Digital Continuity and Sustainability
Centre of excellence to share software tools, expertise and planning strategies.
International Linkages Program
Participate in international standards and maintain a technology watching brief.
National Services Program
Support national teaching and research with technical advisory services; knowledge transfer; consultation and collaboration services.
Practices & Testbed
Build expertise in sustainable digital resource management through partner relationships.
 - The Australian National University: Develop and populate a broad-spectrum repository.
 - The University of Sydney: Sustainability of resources in a complex distributed environment.
 - The University of Queensland: Develop an integrated gateway to a range of repositories of research output.
- 4 Bradley, Kevin *Sustainability Issues Discussion Paper* APSR (2005). dspace.anu.edu.au/handle/1885/46445, accessed May 2008
- 5 <http://www.oclc.org/programs/ourwork/past/trustedrep/repositories.pdf>
- 6 It is an interesting sidelight that the role of librarians in taking leadership in these areas has generated some derisive comments from higher education administrators about 'agenda stealing'. This has only been conversational but quite explicit - an interesting tangent that may be worth further consideration.
- 7 <http://minister.innovation.gov.au/SenatortheHonKimCarr/Pages/NEWERAFORRESEARCHQUALITY.aspx> [accessed 4 May 2008]
- 8 http://www.dest.gov.au/sectors/research_sector/online_forms_services/higher_education_research_data_collection.htm#2008_Specifications , retrieved 6 May 2008

Appendix 1 –data as research publication

The HERDC definition of a research publication can be adapted outside of those traditional – mostly textual - publication forms or categories (be they in print or electronic form). The table below identifies - at first cut - a range of requirements that could meet publication criteria and be applied to the development of datasets as a recognised research activity and as a new form of publication output.

HERDC research publication criteria	Data set publication requirements
substantial scholarly activity, as evidenced by discussion of the relevant literature, an awareness of the history and antecedents of work described, and provided in a format which allows a reader to trace sources of the work	<ul style="list-style-type: none"> • credibility of the researchers, • authority of platform/organisation (aka publisher) • significance of the subject matter • conceptualisation of data collection • meeting data and metadata (descriptive, technical, provenance, etc) standard requirements, • relationship/linkage to other datasets • persistent citability
originality (i.e. not a compilation of existing works)	<ul style="list-style-type: none"> • unique data collection • replicated data necessary for testing or verification
veracity/validity through a peer validation process or by satisfying the commercial publisher processes	<ul style="list-style-type: none"> • use of recognised data and metadata standards • peer review process for data inclusion • credible/authoritative review panel • usability/functionality for research community
increasing the stock of knowledge	<ul style="list-style-type: none"> • unique primary data
being in a form that enables dissemination of knowledge	<ul style="list-style-type: none"> • persistence of citation • being an identifiable set of data for citation purposes • IP licence model • OAIS compliance for harvesting (OAI-PMH)

These requirements may raise many practical questions and many researchers could add other discipline specific standards and requirements. However the table does indicate it is possible to develop an acceptable set of requirements that would provide defensible criteria for recognition as a research publication.

Source: Coleman, Ross.. Field, file, data, conference: towards new modes of scholarly publication. In *Sustainable Data from Digital Fieldwork*. Proceedings of the conference held at the University of Sydney, 4-6 December 2006. <http://hdl.handle.net/2123/1300>