

Executive summary

In mid 2007, the Australian Learning and Teaching Council (ALTC), formerly the Carrick Institute for Learning and Teaching in Higher Education, commissioned an intensive research project to examine the use of ePortfolios by university students in Australia. The project was awarded to a consortium of four universities: Queensland University of Technology as lead institution, The University of Melbourne, University of New England and University of Wollongong.

The overarching aim of the research project, which was given the working title of the Australian ePortfolio Project, was to examine the current levels of ePortfolio practice in Australian higher education. The principal project goals sought to provide an overview and analysis of the national and international ePortfolio contexts, document the types of ePortfolios used in Australian higher education, examine the relationship with the National Diploma Supplement project funded by the Federal government, identify any significant issues relating to ePortfolio implementation, and offer guidance about future opportunities for ePortfolio development.

The ePortfolio world is multifaceted: ePortfolios can be used in many diverse education and employment situations, inevitably with a wide spectrum of purposes and a range of different audiences, as well as implemented using a variety of software tools. A range of research methodologies was used to investigate current practice and to capture data about the scope and relative penetration of ePortfolios: an audit of educators, academic managers and human resources staff provided information about current practice in individual Australian universities, while a series of focus groups and semi-structured interviews amplified some of the key issues raised in the survey responses. While student surveys shed light on the initial expectations of and subsequent experiences with ePortfolios, the perspectives of learners who had used ePortfolios over a period of time were also reviewed. In February 2008, in order to engage the different stakeholder groups in the research activities, the project team hosted the Australian ePortfolio Symposium with an associated ePortfolio Showcase event, as well as a national policy meeting, which stimulated interest in further opportunities to share knowledge and experiences.

The research findings revealed that there was a high level of interest in the use of ePortfolios in the context of higher education, particularly in terms of the potential to help students become reflective learners who are conscious of their personal and professional strengths and weaknesses, as well as to make their existing and developing skills more explicit. There were some good examples of early adoption in different institutions, although this tended to be distributed across the sector. The greatest use of ePortfolios was recorded in coursework programs, rather than in research programs, with implementation generally reflecting subject-specific or program-based activity, as opposed to faculty- or university-wide activity. Accordingly, responsibility for implementation frequently rested with the individual teaching unit, although an alternative centralised model of coordination by ICT services, careers and employment or teaching and learning support was beginning to emerge.

The project investigation identified four individual, yet interrelated, contexts where strategies may be employed to support and foster effective ePortfolio practice:

- government policy
- technical standards
- academic policy
- learning and teaching.

At present, however, the state of play in Australian universities is fragmented. While it is not yet equal to leading edge practice in other countries, there is clear evidence of strong interest across the sector. Ideally, the higher education sector should strive to bring together the different pieces of the ePortfolio puzzle to build a cohesive composition that will benefit individual students, the quality of learning and the value of higher education outcomes.

The project report concludes with a series of recommendations to guide the process, drawing on the need for open dialogue and effective collaboration between the stakeholders across the range of contexts: government policy, international technical standards, academic policy, and learning and teaching research and practice.

Recommendations

The current policy environment of the Federal Government seeks to enhance the quality of education, encourage widened access to education opportunities, and stimulate integration between vocational education and training and higher education in order to support innovation and productivity to ensure ongoing national economic development and growth. Indeed, internationally, ePortfolio policy and practice seek to draw together the different elements of integrated education and learning, graduate attributes, employability skills, professional competencies and lifelong learning, ultimately to support an engaged and productive workforce. The recent proposal for an Australian Higher Education Graduation Statement seeks to provide an internationally acceptable format for presenting institutionally authenticated information about learners, while an ePortfolio can help them better understand the value of their achievements, not only through their academic studies, but also through formal and informal learning activities in other areas of their lives.

Recommendation 1

It is recommended that the government departments with responsibilities for education engage with peak industry, professional and employer bodies to develop a shared understanding of the potential of ePortfolio practice to articulate employability skills.

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Recommendation 2

It is recommended that government policy recognise ePortfolio practice as a strategy to build an integrated relationship between higher education and the vocational education and schools sector, in order to support the individual's lifelong and lifewide learning needs and to increase the potential for career progression.

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Recommendation 3

It is recommended that the higher education sector acknowledge the role of the Australian Higher Education Graduation Statement as an authenticated document reporting student achievement, compiled and verified by the academic institution at the time of graduation, while further acknowledging the value of the ePortfolio process to articulate the integrative aspects of student learning.

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Learner mobility within and between education, training and employment sectors requires processes that will allow data about individuals to be both exported and imported across different systems and services with the assurance that the data is both secure and accessible. Technical standards and interoperability issues developed through international collaboration (for example, the eFramework for Education and Research, and the IMS Global Learning Consortium) represent a key aspect of ePortfolio practice, supporting the exchange of information and data across institutional, sectoral and jurisdictional boundaries.

Recommendation 4

It is recommended that Australian ePortfolio stakeholders continue to develop the collaborative relationship with partners in the eFramework for Education and Research initiative in order to ensure that aspects of ICT in education and research are developed and implemented strategically.

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Recommendation 5

It is recommended that the international information standards for ePortfolio practice be adopted as an Australian technical framework, in order to facilitate the exchange of information and data across institutional, sectoral and jurisdictional boundaries.

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It is important for academic managers to have a broad understanding of the benefits and value that ePortfolios can bring to learning, teaching and career development processes, so there is scope for an ePortfolio culture to become an integral aspect of the academic environment. Those engaged in the institution's learning and teaching policy environment need to be conscious of the potential of ePortfolios, when integrated into current and future eLearning strategies, to contribute to student-centred learning strategies, transparent learning outcomes and the relevant employability skills for graduates. Significantly, the successful adoption and implementation of ePortfolios require strong alignment between the strategic, tactical and operational areas of academic management.

Recommendation 6

It is recommended that academic policy in higher education institutions recognises the value of ePortfolio practice as a component of different pedagogies that enhance the quality of learning and teaching across the institution.

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Many early adopters of ePortfolio practice have recognised the potential of the ePortfolio process, when it is embedded in learning and teaching activities, to help students move beyond the state of knowing *what* they have learned to consider *how* they have learned. By reflecting on their own learning and achievement, learners are encouraged to plan for their personal, academic and career development. Currently, ePortfolio practitioners in higher education are eager to break away from their sense of isolation and work collaboratively across disciplines and institutions to further their knowledge and understanding. There is scope to develop a community of practice that will provide valuable channels of communication between educators with shared interests and ideas, and encourage scholarship and research. Compared with many other countries such as the United Kingdom, United States of America and the Netherlands, Australia is in the early stages of ePortfolio practice and research. There is scope to undertake investigations into the impact of ePortfolios on key areas on learning outcomes within and beyond university.

Recommendation 7

It is recommended that the various stakeholders in higher education who are interested in ePortfolios utilise the ePortfolio Toolkit (under development) to guide and inform their practice.

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Recommendation 8

It is recommended that ePortfolio stakeholders establish a Community of Practice to share learning and experiences of quality ePortfolio practice in higher education, in order to foster scholarship and research and to provide a forum for dissemination about good practice.

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Recommendation 9

It is recommended that a regular Australasian conference be convened to explore and discuss ePortfolio research and practice.

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Recommendation 10

It is recommended that the Australian Learning and Teaching Council adopt a leading role to foster and support further research into the educational benefits of ePortfolio practice.

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If the higher education sector is to effectively fulfil its role in producing skilled professionals who, through continuous learning, career progression and coherent employability strategies, will play a significant role in the future success of the Australian community and economy, then the potential of ePortfolios to bring together educational technologies and quality learning processes, and to provide evidence of individual achievement and employability skills should not be ignored. Policies and strategies are required at both the sectoral and institutional levels to ensure that advantage is taken of the opportunities for connectivity and cohesion in the fragmented world of eLearning, flexible delivery, social networking and mobile technologies.

Dissemination and communication of project activities

Conference presentations

Higher Education Research & Development Association (HERDSA), Rotorua, New Zealand, 1–4 July 2008; <http://conference.herdsa.org.au/2008>

Hallam, G., & Harper, W. (2008, July 1–4). Picturing the future: Exploring the opportunities to develop an ePortfolio community of practice in Australasia. In *Proceedings Engaging communities*. Conference of The Higher Education Research and Development Society of Australasia (HERDSA).

29th International Association of Technological University Libraries (IATUL) Conference, Auckland, New Zealand, 21–24 April 2008; <http://www.aut.ac.nz/iatul2008>

Hallam, G., & McAllister, L. (2008, April 21–24). Self discovery through digital portfolios: A holistic approach to developing new library and information professionals. In *Proceedings Digital discovery: Strategies and solutions*. 29th annual conference of the International Association of Technological University Libraries (IATUL).

5th International Lifelong Learning Conference, Yeppoon, Qld, 16–19 June 2008; <http://lifelonglearning.cqu.edu.au/2008/index.htm>

McAllister, L., Hallam, G., & Harper, W. (2008, June 16–19). The ePortfolio as a tool for lifelong learning: Contextualising Australian practice. In *Proceedings International Lifelong Learning Conference* (pp. 246–252). Retrieved (n.d.), from <http://lifelonglearning.cqu.edu.au/2008/index.htm>

ATN Evaluation and Assessment Conference, Brisbane, 29–30 November 2007; <http://www.eac2007.qut.edu.au>

Hallam, G., Harper, W., & McAllister, L. (2007, November 29–30). *The journey to work: The impact of the ePortfolio on student learning*. Paper presented at the ATN Evaluation and Assessment Conference.

Conference proposals

Australasian Society for Computers in Learning in Tertiary Education (ASCILITE) Conference to be held 30 November to 3 December 2008 in Melbourne; <http://www.ascilite.org.au/conferences/melbourne08/cfptheme.htm>

Australian Association for Research in Education (AARE) Conference to be held 30 November to 4 December 2008 in Brisbane; <http://www.aare.edu.au/conf2008/index.htm>

European Institute for E-Learning (EifEL) ePortfolio Conference to be held 22–24 October 2008 in Maastricht; <http://events.eife-l.org/ep2008>

Effective Learning and Teaching (ETL) Conference to be held 30–31 October 2008 in Brisbane; <http://www.etl2008.qut.edu.au>

Symposia and other invited speaker sessions

IDEA 2007: Integrated Education Infrastructure, Brisbane, 8–11 October 2007; <http://www.linkaffiliates.net.au/idea2007>

University of Melbourne ePortfolio Workshop, Melbourne, 11 October 2007

AICTEC Forum, Sydney, 8 November 2007

University of Queensland, Brisbane, 20 May 2008

education.au ePortfolio Symposium, Adelaide, 10 June 2008; <http://www.educationau.edu.au/jahia/Jahia/home/pid/637>

Reports and discussion in the media

- Carrick Institute for Teaching and Learning in Higher Education Ltd. (2008, February). Spotlight on eportfolio practice. *Carrick Communiqué* (p. 6). Retrieved July 12, 2008 from http://www.altc.edu.au/carrick/webdav/site/carricksite/users/siteadmin/public/feb08_communique%204145KB.pdf
- Cervini, E. (2007, November 26). Time to polish up the career ePortfolio. *Australian Financial Review*.
- Cervini, E. (2007, November 27). Polishing the ePortfolio. *CIO New Zealand*. Retrieved July 12, 2008, from <http://cio.co.nz/cio.nsf/focus/A1C85E17E9D92FE4CC25739E006C609E?Opendocument&HighLight=2,eportfolio>
- Trounson, A. (2008, July 23). E-portfolios signal new digital dawn for universities. *The Australian*, p. 40.
- Ward, R., & Hallam, G. (2008, February). The Australian e-Portfolio symposium: Perspectives from another place. *CRA Newsletter*, p. 8. Retrieved July 12, 2008, from <http://www.recordingachievement.org/pdpuk/newsletter/Issue13.pdf>

Audio: Podcasts

Talking VTE (Episode 8) 17 February 2008; <http://talkingvte.blogspot.com/search/label/eportfolio>

Blogs

- e-Portfolios (ePF): Tool or concept?* 8 February 2008; <http://rajmmiller.blogspot.com/2008/02/e-portfolios-epf-tool-or-concept.html>
- e-Portfolios: A user perspective?* 10 February 2008; <http://blogs.educationau.edu.au/jleeson/2008/02/10/eportfolio-a-user-perspective>
- Australian ePortfolio Symposium 2008*; <http://www.tomw.net.au/blog/2008/02/australian-eportfolio-symposium-2008.html>

Citations of project activities

- Leeson, J. (2008). *ePortfolios: Policy issues and interoperability*. Retrieved June 20, 2008, from <http://www.avetra.org.au/AVETRA%20WORK%2011.04.08/CS3.2%20-%20Jerry%20Leeson.pdf>

List of tables

- Table 1.1:** Categories of ePortfolio system
- Table 5.1:** The Hallam, Harper and Hauville model of ePortfolio factors, stakeholders and relationships
- Table 6.1:** Institution-wide ePortfolio practice
- Table 6.2:** Diversity of ePortfolio practice across an institution (example for University of Wollongong)
- Table 6.3:** Students' feelings about the prospect of using an ePortfolio: Pre-course survey responses
- Table 6.4:** Comparison of students' expectations for and experiences of the ePortfolio: Pre-course and post-course survey responses
- Table 7.1:** Relationship between the ePortfolio and the Australian Higher Education Graduation Statement

List of figures

- Figure 1.1:** Attributes of an ideal ePortfolio system
- Figure 1.2:** The ePortfolio process as a 'Plan–Do–Review' cycle (adapted from Pallister, 2007)
- Figure 2.1:** Scenarios for the future
- Figure 6.1:** Definitions of ePortfolio: Learning and teaching survey responses
- Figure 6.2:** Definitions of ePortfolio: Management survey responses
- Figure 6.3:** Definitions of ePortfolio: Human resources survey responses
- Figure 6.4:** Definitions of ePortfolio: Respondents from University no. 1
- Figure 6.5:** Definitions of ePortfolio: Respondents from University no. 2
- Figure 6.6:** Use of ePortfolios by coursework students: Learning and teaching survey responses
- Figure 6.7:** Use of ePortfolios by research students: Learning and teaching survey responses
- Figure 6.8:** Type of technology used: Learning and teaching survey responses
- Figure 6.9:** Use of ePortfolios: Learning and teaching survey responses
- Figure 6.10:** Review or assessment of ePortfolios: Learning and teaching survey responses
- Figure 6.11:** Context of review or assessment of ePortfolios: Learning and teaching survey responses
- Figure 6.12:** Responsibility for ePortfolio implementation: Learning and teaching survey responses
- Figure 6.13:** Responsibility for ePortfolio policy: Learning & Teaching survey responses
- Figure 6.14:** Responsibility for ePortfolio strategic direction: Learning and teaching survey responses
- Figure 6.15:** Degree of importance of factors contributing to ePortfolio implementation: Learning and teaching survey responses — 'Very important' and 'Important'
- Figure 6.16:** Degree of importance of factors contributing to ePortfolio implementation: Management survey responses — 'Very important' and 'Important'
- Figure 6.17:** Impacts resulting from ePortfolio use: Students and staff learning and teaching survey responses
- Figure 6.18:** Philosophy underpinning ePortfolio use in the institution: Learning and teaching survey responses
- Figure 7.1:** Example of the Australian Higher Education Graduation Statement
- Figure 9.1:** Strategies to support and foster ePortfolio practice

List of acronyms

AAF	Australian Access Federation
AARE	Australian Association for Research in Education
AHEGS	Australian Higher Education Graduation Statement
ALIA	Australian Information and Library Association
ALTC	Australian Learning and Teaching Council (formerly Carrick)
ASCILITE	Australasian Society for Computers in Learning in Tertiary Education
ASLA	Australian School Library Association
ASMS	Australian Science and Mathematics School
ATN	Australian Technology Network of Universities
Becta	British Educational Communications and Technology Agency
BIHECC	Business, Industry and Higher Education Collaboration Council (Australia)
Carrick	The Carrick Institute of Teaching and Learning in Higher Education (Australia)
CDP	Competence development plan
CDS	Centre for Digital Storytelling — based in Berkeley, California
CETIS	Centre for Educational Technology and Interoperability Standards (UK)
CETL	Centres for Excellence in Teaching and Learning (UK)
CHEMP	Centre for Higher Education Management and Policy (University of Wollongong)
CILIP	Chartered Institute of Library and Information Professionals (UK)
CLA	Collegiate Learning Assessment (USA)
CMEC	Council of Ministers of Education Canada
CMS	Content Management System
CPD	Continuing professional development
CRA	Centre for Recording Achievement (UK)
CSHE	Centre for the Study of Higher Education (University of Melbourne)
CWO	Career Wales Online
DBI	Discipline-based Initiatives
DEAMES	DEEWR EU Australia Mobilisation of Engineering Students project
DEEWR	Department of Education Employment and Workplace Relations (Australia)
DEST	Department of Education Science and Training (Australia)
DETA	Department of Education Training and the Arts (Queensland)
DETYA	Department of Education, Training and Youth Affairs (Australia)
DfES	Department for Education and Skills (UK)
eCDF	eLearning Collaborative Development Fund (New Zealand)
Educause	Non-profit association whose mission is to advance higher education by promoting the intelligent use of information technology
EEG	E-Standards Expert Group (Australia)
EIFEL	European Institute for E-Learning
ELE	Electronic learning environment
EPAC	Electronic Portfolio Action and Communication
EQF	European Qualification Framework
EU	Council of the European Union
FE	Further education
HE	Higher education

HEA	Higher Education Academy (UK)
HEFCE	Higher Education Funding Council for England
HERDSA	Higher Education Research and Development Society of Australasia
HRSDC	Human Resources and Skills Development Canada
HRSDC	Human Resources and Skills Development Canada
IATUL	International Association of Technological University Libraries
ICT	Information and Communication Technology
IMS	IMS Global Learning Consortium Inc.
JISC	Joint Information Systems Committee
JOSEPH	Joining up Organisations to Support new Engineering Pathways into Higher Education (UK)
LifLA	Learning Innovations Forum d'Innovations d'Apprentissage (Canada)
MOSEP	More Self-Esteem with my E-Portfolio (European project)
NADE	Norwegian Association for Distance and Flexible Education
NBCT	National Board Certified Teacher
NBPTS	National Board for Professional Teaching Standards (USA)
NCEPR	Inter/National Coalition for Electronic Portfolio Research
NL Portfolio Group	Special interest group of the SURF Foundation
OECD	Organisation for Economic Co-operation and Development (International)
OSPI	Open Source Portfolio Initiative
OUNL	Open University of The Netherlands
PDP	Personal development planning
QAA	Quality Assurance Agency for Higher Education (UK)
QCA	Qualifications and Curriculum Agency (UK)
QNC	Queensland Nursing Council
RPL	Recognition of prior learning
SEDA	Staff and Educational Development Association (UK)
SEDA	Staff and Educational Development Association (UK)
SIG	Special interest group
SURF	SURF Foundation (The Netherlands)
TAFE	Technical and Further Education (Australia)
TDM	Tailored Design Method
TENCompetence	The European Network for Lifelong Competence Development
UR	Swedish Educational Broadcasting Company
VET	Vocational Education and Training (Australia)