

Aug 11th, 12:00 AM

## The Graduate Professional Portfolio as “synergy tool”: navigating the complex role of portfolios in future-focused design education

Deanna Meth  
*Queensland University of Technology, Australia*

Melanie Finger  
*Queensland University of Technology, Australia*

Dean Brough  
*Queensland University of Technology, Australia*

Follow this and additional works at: <https://dl.designresearchsociety.org/drs-conference-papers>

---

### Citation

Meth, D., Finger, M., and Brough, D. (2020) The Graduate Professional Portfolio as “synergy tool”: navigating the complex role of portfolios in future-focused design education, in Boess, S., Cheung, M. and Cain, R. (eds.), *Synergy - DRS International Conference 2020*, 11-14 August, Held online. <https://doi.org/10.21606/drs.2020.317>

This Research Paper is brought to you for free and open access by the Conference Proceedings at DRS Digital Library. It has been accepted for inclusion in DRS Biennial Conference Series by an authorized administrator of DRS Digital Library. For more information, please contact [DL@designresearchsociety.org](mailto:DL@designresearchsociety.org).



DRS2020  
BRISBANE, 11–14 AUG  
SYNERGY



# The Graduate Professional Portfolio as “synergy tool”: navigating the complex role of portfolios in future-focused design education

Deanna METH<sup>a\*</sup>, Melanie FINGER<sup>a\*</sup>, Dean BROUGH<sup>a\*</sup>

<sup>a</sup> Queensland University of Technology, Australia

\* Corresponding author e-mail: [deanna.meth@qut.edu.au](mailto:deanna.meth@qut.edu.au)

doi: <https://doi.org/10.21606/drs.2020.317>

**Abstract:** Development of a new design curriculum at Queensland University of Technology prompted a study to revisit the nature and purpose of portfolios. Always integral to design disciplines, more widely there has been rapid growth of portfolio use for student learning, assessment and showcase, with technological advancements adding impetus for these to move online. This aligns to pedagogic shifts linked to authentic learning, graduate employability, and fostering twenty-first century graduate capabilities such as collaboration and communication. Research findings conceptualise a Graduate Professional Portfolio as a living, digital “universal archive” for students’ storage, presentation of, and reflection on design processes and outputs, and a space for collaboration and showcasing selected work to peers and employers. The Behance online platform is proposed as suitable for these purposes. The study has relevance across the higher education sector where designing such learning activities with suitable flexibility for individual students’ developmental needs has proved complex.

**Keywords:** design education; employability; portfolio; behance

## 1. Introduction

Design education today faces a wide range of competing demands from stakeholders, including students, academics, employers and professional and accrediting bodies. As a fundamental part of developing a new Bachelor of Design curriculum at Queensland University of Technology (QUT), Australia, there was a need to examine such expectations and societal needs more closely, with the acknowledgement that courses will be of little value if graduating students are unable to gain the skills, knowledge and capabilities deemed necessary to practice as designers in the future.

Development of the new future-focused degree commenced in late 2017, with delivery to the first new cohort commencing in February 2019. The degree offers specialisation in seven



This work is licensed under a  
Creative Commons Attribution-NonCommercial 4.0 International License.

design disciplines, namely: Architecture; Interior Architecture; Landscape Architecture; Fashion; Industrial Design; Interaction Design and Visual Communication, and central to these are innovative studio based and theoretical disciplinary learning opportunities. Responding to future design needs articulated by stakeholders and sector-wide research evidence, the degree has a suite of four new transdisciplinary, collaborative and industry-linked Impact Lab units at its core, and scaffolded across the three years of study. In addition to providing direct access for students to work with community and industry partners, the Impact Labs provide a framework for students to develop a Graduate Professional Portfolio containing key elements related to their design process, outputs and reflection, and it is within this setting that the research problem was formulated.

Recognising the complex requirements of portfolios in design disciplines, as well as the multiple modes of portfolio outputs in existence, the aim of this action research study, conducted as a collaboration between academics, student partners and a learning designer, was to explore the purpose and shape such a Graduate Professional Portfolio might take. Additionally, a way to resolve the tensions implicit in each disciplinary area already having their own portfolio practices was sought. It was seen as critical not to duplicate or contradict these, but rather use the Impact Labs as a way to enhance additional designerly capabilities such as collaboration, impact, and working with partners, and thereby further enhance graduates' profiles. A feasible concept for how this may be achieved has emerged from the research, with broad applicability across design education, and the wider education sector. It takes notions of students' portfolios to a realm more closely linked to widely voiced requests for greater synergy between education and real-world contexts.

There is value to be gained in taking time to explore the background to portfolios as a pedagogic tool in higher education and design in particular, so this forms the focus of the opening portion of the paper, and linked to this, the specific context in which the research has been undertaken is elaborated upon. This sets the scene for presenting the research questions, following which the research approach is outlined. Results are presented as a set of propositions reflecting the key findings of the work, prior to concluding the paper with a brief discussion and closing points, including areas for future research.

## **2. Background and context**

This research in action is situated in a higher education environment in flux, where contested narratives around societal expectations and the purpose of universities abound. A heightened focus on graduate skills and employability has led the global higher education sector to consider more deeply its role in preparing students for life and work beyond the university, and equipping them with the skills of adaptability and the ability to cope with constant change (Ashwin et al., 2015, p. 353; FYA, 2015; Mackh, 2018, p. 223). Skills felt to be necessary in today's "twenty-first century" graduates include problem-solving, communication, self-management, teamwork, interdisciplinary collaboration and

understanding the importance of lifelong learning and ongoing professional and personal development (Cabau, 2017, p. 142; Mackh, 2018, p. 222).

Ashwin et al., (2015) note that active and experiential methodologies have been observed to facilitate in this process, whereby structured opportunities might be built within students' learning and assessment for them to develop such skills. Within experiential methodologies, where students have the opportunity to learn through real-world scenarios and commonly with connections to industry and community partners, there has been a growth in authentic learning and assessment. This brings into alignment learning outcomes with industry expectations, where from a constructivist educational point of view, students' competence is seen as “situational and personal” and linked to more meaningful contexts of performance (Ashford-Rowe, Herrington & Brown, 2014, p. 206).

Within this context, there is a need to acknowledge the complexity of students' skills acquisition, learning and development and the many “scattered” elements thereof, and the need to support students to undertake “personalised learning journeys” that will help them best establish themselves for their futures (Pegrum, 2017, p. v.). Students should be able to readily identify and articulate where and what skills they are acquiring, with the added ability to self-evaluate and reflect on this.

## *2.1 Portfolios in higher education*

Extending the discussion above related to authenticity in learning and students' skills development, portfolios in higher education have been noted as eliciting different learning outcomes to more traditional forms of assessment, such as essays and exams (Jones 2010, p. 293). Crowther (2012, p. 229) defines a portfolio as “a collection or collation of achievements, artefacts, creative works or examples of competencies, usually for the purpose of demonstrating a person's capabilities in a specific field of endeavour”.

Ashford-Rowe et al., (2014) note the affordances brought to authentic learning and assessment through digital developments and emerging technologies, and arising from these, Hallam and Creagh (2010) describe the evolution of portfolios from non-digital paper-based into online spaces, heralding the advent of the e- (electronic-) portfolio. Web 2.0 technological developments have recently sparked a further shift from bespoke e-portfolio systems (often institutionally owned, and generally restricted to the course environment) to a wide range of online platforms where students will own the space, and often open to the world beyond the university (ibid.).

Noting the e-portfolio as a direct response to universities needing to better prepare students for lifelong learning and employment, Cabau (2017) delineates three main categories of portfolio in higher education:

- Learning/developmental/reflection/formative/working
- Assessment
- Professional/formal/presentation/representation/career employment

Importantly, Jones (2010) makes the point that in using the portfolio as an innovative learning and assessment tool for quality, authentic learning, “collegial dialogue about practice is fostered and a bridge is built between the discourse of academia and the discourse of practice” (p. 309). This point tallies well with the statement by Cabau (2017) who notes the opportunity of e-portfolios as a ‘synergy tool’ straddling higher education and the real world (p. 144) – the point from which the title of this paper is derived.

## *2.2 Portfolios in design education*

Moving into the realm of design education more specifically, Crowther (2012) documents the historical use of portfolios in design and creative industries disciplines, noting the shifts towards multiple purposes. Returning to the importance of the ‘fidelity’ of assessment tools to real-world settings being authenticated (Ashford-Rowe, 2014, p. 209) and notions of synergy, in the instance of design, Orr and Shreeve (2018) note the ongoing interplay and negotiation between the university and the design and creative sectors (p. 44).

It has long been the case that students and practitioners of design disciplines such as the architectures, fashion and visual arts maintain a body of work as evidence of their skills and practice in portfolio form, traditionally paper-based or as tangible media. This aspect of portfolio creation remains integral to design disciplines as evidence of a designer’s professional capabilities and practice. In relation to digital and online advancements highlighted earlier, the 2013 Design Institute of Australia large-scale research publication (Robertson, 2013) also details the shifting focus of design disciplines and rapid growth in multimedia, web, and technology design fields of employment and the importance of socially connected, networked and digitally agile graduates. This is further endorsed in large-scale research undertaken by the Foundation for Young Australians (2015) and supports the move of some portfolio outputs into digital spaces.

If one key aim of design education is to aid students in gaining synergy between the spaces where they are learning and spaces where they will work as future professionals, the question then arises as to what becomes of the traditional portfolio and its contents, some of which need to, and should remain personal to the emerging designer alone? In a large-scale study which investigated necessary skills sets for practising designers in Australia, Doloswala (2013) notes that “portfolios developed through education and employment [should] represent a demonstration of capabilities, technical skills, knowledge and creativity” (p. 417). Acknowledging the multiple intents of education and employment, this issue is addressed within the research, in particular to guard against “throwing the baby out with the bathwater” and destroying what is fundamental to design disciplines and quality design education. What therefore is the difference between the erstwhile traditional portfolio, and any future-focused output? What might a portfolio of a future-focused design graduate look like and encompass? To set the scene for asking and answering these questions, discussion now moves to the specific context and rationale for this research.

### **2.3 Research context**

In 2019 a new undergraduate curriculum commenced in the School of Design at QUT across seven disciplinary areas of study, namely: Architecture; Interior Architecture; Landscape Architecture; Fashion; Industrial Design; Interaction Design and Visual Communication. Whilst some readers may interpret these as belonging to a wider defined group of disciplines, for example, also including the Built Environment (as in Savage, Davis & Miller, 2010), for the purposes of this research, it is this set of disciplines to which the term ‘design’ refers. This does not negate the fact that the research findings may be equally applied to other allied disciplines and professions, such as Engineering, Urban Planning, Law and Business, four areas with which the Bachelor of Design, recognising changing employer needs, now offers a suite of double degree options.

As with its previous iteration, the new course provides students with innovative studio based and theoretical learning opportunities. However, taking on board the shifting higher education and practice landscape described above, and feedback from both internal (students, staff) external (alumni, employers, practitioners) stakeholders, it has been enhanced through the addition of a series of four transdisciplinary ‘Impact Lab’ units delivered across all year levels of the undergraduate program. In keeping with institutional strategic imperatives of “real world learning” opportunities underpinning students’ educations, the Impact Labs, which sequentially address the themes of place, people, planet and purpose, are a direct pedagogic response to the gap identified in design education of students’ application of skills and knowledge to “real problems and contexts”. This includes engagement with broader and more open-ended external client briefs, adapting to collaborative workplace practices and working in interdisciplinary teams (Doloswala, 2013, p. 418), areas also identified as lacking in sufficient authentic assessment opportunities (ibid. p. 420). Through the Impact Labs, students from all study areas participate in problem-based, collaborative learning and idea generation alongside community and industry partners.

Implicit in these units is a developmental approach where students have the support and space to fully reflect on and articulate skills gained, scaffolded across the three years of their degree. In a bid to ensure authenticity of learning outcomes and assessment, there is an explicit focus on students building networks and individual narratives of “impact” as designers, as well as each student developing a Graduate Professional Portfolio as an assessable learning outcome. As discussed above, this is an overt attempt to offer an opportunity to develop a future-focused portfolio thus deliberately introducing real-world synergy.

### **2.4 Formulating the research questions**

Whilst the Graduate Professional Portfolio was a purposeful introduction as an entity within the new course due to clear drivers described above, less thought was given in the early stages of course development as to the shape and nature of such an entity. In commencing more rigorous curriculum and learning design, an urgent imperative therefore arose for

deeper consideration of how it might be seen to function and interact across the whole course. Specifically, research questions included:

1. What is the current status of and thinking around portfolios in design education?
2. What is the role and nature of a Graduate Professional Portfolio in the Bachelor of Design degree?
3. How might this work where the portfolios are being developed from within a transdisciplinary space, whilst discipline-focused portfolios (e.g. for an architect or fashion designer) are simultaneously arising from design studio work?
4. Might they be one and the same thing where connectivity with discipline-specific requirements of a portfolio are also honoured?

On deeper reflection, readers may also note the implied expectations and complexities within the words “graduate”, “professional” and “portfolio” which intimate moving beyond notions of a simple “portfolio”. This knotty problem brought impetus and weight to the case for undertaking a detailed piece of research. The section following outlines the research approach taken to address these questions.

### **3. Research approach**

#### *3.1 Curriculum development as action research*

This work has been undertaken using an action research approach to curriculum development. Researchers note the suitability of this mode of research in situations where a change or implementation is desired (O’Leary, 2010; Cohen, Manion & Morrison, 2011). In keeping with definitions of action research (ibid.), this research was grounded in the practical situation described above, involved stakeholders as collaborators (students, staff and practicing designers), and had the aim of having a direct impact on professional practice, in this instance, specifically related to the design disciplines. As an “experiential learning approach to change” (O’Leary, 2010, p. 150) the research presented here forms one part of a cyclical process of identifying a problem, collaboratively researching the situation, planning for and undertaking proposed action, evaluating this and reflecting on and preparing for further possible action.

Gibbs et al., (2017) highlight the importance of informed pedagogic practices in higher education and the growth of action research activities to contribute towards this effort (p. 4). Meth et al. (2020) detail this across a range of curriculum development activities at QUT, including in the School of Design, where ensuring a scholarly evidence base to all aspects of curricular development has been essential. In particular, the findings of Robertson (2013) regarding the changing focus of design disciplines and employers’ needs of graduates have shaped developmental conversations. Noted as a common oversight in action research taking place within the normal guise of institutional work (Gibbs et al., 2017, p. 9) to bring greater transparency and ensure adherence to standards of ethical research, approval was gained from the institution for this work prior to commencement.

### **3.2 Co-creation and the student voice**

As a significant part of the research approach, acknowledging the proven value of working with student partners in curriculum development (Cook-Sather, Bovill & Felten, 2014, pp. ix-x) where increased rigour and deeper understandings might be gained, it was seen as critical to do so here for co-production of any potential solutions.

Seven student partners were employed from across all design disciplines to undertake primary research data collection and work collaboratively with academics and a learning designer. The productive nature of such a three-way curriculum development relationship has been elaborated upon by Fitzgerald et al. (2019). Additionally, student partners brought their disciplinary expertise and experiences as students who themselves were on the cusp of graduating and developing their own portfolios, as well as a window to fellow student voices school-wide.

### **3.3 Research methods**

As part of an action research cycle in progress, and drawing on the main research questions above, research data were gathered through:

- desk-based literature and web-based searches
- informal conversations between design academic staff, students and their peers
- semi-formal interviews with design practitioners and employers of designers.

The main method for considering and analysing the data, was through a series of intensive co-production workshops, where academic collaborators, student partners and a learning designer brought together shared knowledges in order to progressively develop and propose a workable model of a feasible way forwards. This needed to be appropriate to the contexts of all seven discipline areas in the degree.

At the outset of the work, and to better situate solutions proposed, part of early conversations centred around defining intrinsic designerly capabilities, those less tangible aspects which in addition to “harder” design skills and knowledge one would expect graduates of design to possess. Unsurprisingly, many of these are not dissimilar to themes presented in this paper. This offers a potential topic for deeper exploration elsewhere, and is set to one side for the purposes of this paper, where the focus is the design portfolio.

## **4. Results**

Data from the literature review on current thinking related to portfolios in higher education has been presented within the Background and Context section above, and mirrors closely the views gleaned from conversations with students and practitioners. Results discussed here relate to the latter questions posed on what constitutes a Graduate Professional Portfolio and how might it be seen to work in a design degree. These have been clustered within a suite of points which highlight what the authors believe to be the dominant findings.



#### 4.1 For truly authentic learning and assessment, there cannot be a single prescribed portfolio format for design students – an online element is crucial.

In striving for unanimity on a portfolio platform to use within the Impact Labs across all seven disciplines, one key set of research data collected was on the range of ways in which designers present portfolios. Table 1 below presents the findings from this exercise. Readers should note that this list is merely representative rather than exhaustive.

*Table 1 Preferred forms and digital platforms for capturing, storing and showcasing design work across design disciplines included in the study.*

<b>Disciplinary area</b>	<b>Output form or digital platform</b>	<b>Comments</b>
Architecture	Physical and pdf portfolio of work + digital presence (Instagram/Behance)	Whilst mixed messages were received on portfolio modes, the architecture disciplines were unanimous in the need for physical (paper) portfolios of work.
Landscape Architecture	Physical print + digital presence (website/Instagram/LinkedIn)	
Interior Architecture	Physical and pdf portfolio of work + digital presence (Instagram/Behance)	
Fashion	Physical print + digital (website/Instagram)	Website often includes an online shop component; Instagram follows designers' process and evolution of work; print as a physical "lookbook"
Industrial Design	Website/Instagram/LinkedIn	Something to compete in market; Instagram is used for styling and aesthetic appeal; most have LinkedIn as well for connections
Interaction Design	Predominantly digital: interactive pdfs/ website/Behance/LinkedIn	Behance utilised to house portfolio; LinkedIn holds profile and connections
Visual Communication	Physical print with visual diaries + Digital (Instagram/ Behance/ LinkedIn/Wix/Squarespace)	No set template as output is part of your professional image. Behance as bare minimum

Findings above evidence that the seven disciplinary design areas already have ways of constructing portfolios and personal profiles. Furthermore, there was little unanimity across the seven design-related disciplines on a single mode of portfolio, and also a question of potential duplication and cross-purposes by the Impact Lab units, potentially in direct conflict with the disciplines.

Given the results gathered, if truly striving for authenticity, the question was then posed as to why then we might seek to impose any rigid portfolio structure on students as emerging design professionals? Considering synergy between design students and the world of work, the point was made that different pieces of work and angles would be needed for different audiences i.e. portfolios should be audience and employer specific.

It was clear from the exercise undertaken that no definitive format should exist for designer portfolios and that there could therefore be no singular model for a Graduate Professional Portfolio. Background research undertaken on the PebblePad and Mahara online portfolio systems and a fairly restrictive bespoke institutional portfolio platform deemed them unsuitable for the purposes required. Hallam and Creagh (2010) note that moving beyond institutionally-specified and often institutionally owned e-portfolio products which may be restrictive, Web 2.0 developments have allowed for portfolio models which bring “dynamic and unguided” innovative spaces, often user-owned and with a higher chance of stakeholder engagement, as well as opportunities for social networking and collaboration (p. 189).

These were difficult messages for the curriculum development team to hear since it had been assumed during course design that a single solution for a portfolio model would be defined. What was evident was the ongoing need for designers to be able to draw on a combination of portfolio outputs, and Baron (2009) endorses this view, noting that they may be in both digital and analogue modes as findings have suggested.

A solution to this conundrum came through the in-depth examination of what each of the platforms had to offer, as well as discussion on what the foundation needed to be for all forms of evidence offered in these various formats. The concept of a “universal archive” was thus developed, which should have the capacity to target and draw from content and sections as required for specific audiences, be it for course assessment, a job application or collaboration with other designers. The space should also have the ability to keep reflections and process information private to the individual owner, should they wish to do so.

#### *4.2 A “universal archive” is needed to capture the multiple elements that will be needed for portfolios in action.*

The research team decided on Behance (behance.net), part of the Adobe Creative Cloud suite of applications as a universal archive space which offers the most flexibility for being able to do this. In addition to being an online space which is easy to use and free to access, Behance offers a way to foster many of the future-focused skills asked of designers, but with capacity for staying true to the Impact Lab educational model developed, including:

- offering privacy settings so that projects and sub-spaces may remain private to users as desired, fulfilling the need to also be a developmental tool;
- being owned by the student in perpetuity and fulfilling the skills need related to sustaining lifelong learning and ongoing professional and personal development;
- providing a holistic space where work and reflections from any curricular or extra-curricular, and work activities may be captured;
- allowing users to submit work in teams, fulfilling the need for collaborative online spaces;
- allows other users to “like” your work, offering interaction and verification
- providing links to employment opportunities, as employers scout these sites; and
- having the capacity for users to link their account to other social media platforms,

connecting designers' profiles worldwide - it is socially connected and networked and therefore a good way for students to form networks, access workplaces and bring the synergy desired to their educational experiences.

These additional features which bring flexibility and are easy to use, have been noted by Chaudhuri (2017) as key to platforms where lifelong learning and individual ownership thereof are desired (p. 16).

Looking within the universal archive, research revealed a common core of elements that should be present. These are not dissimilar to those components noted by Doloswala (2013) of capabilities, technical skills, knowledge and creativity (p.417), but also stretch to those aspects listed in Crowther (2012) where one's creative process and design products are present, with additional opportunities to house self-assessments and promote self-understanding through reflective pieces. One additional theme that emerged strongly from the research as an important element of the portfolio which partially fits the theme of creativity, is the need for a portfolio to also reflect a designers' individuality and for students to establish their own personal branding through profiles and position statements as well as their chosen "look and feel". This chimes well with employer messages received.

Some elements may remain personal and hidden from view whilst others may be formative or summative pieces open to specific audiences for specific purposes e.g. assessment or external profile raising. Within such a conceptual model, potential tensions with disciplinary area portfolios are resolved, as any and all digital content may also be housed in the Behance archive, and merely deployed appropriately to specific units of study at specific times, or link out to content stored elsewhere.

Related to the topic of linking out, and networked graduates, whilst student partners initially scoffed at the notion of LinkedIn (linkedin.com) as a social media platform, they all admitted to having live LinkedIn professional profiles. There was general agreement across views gathered, that whilst LinkedIn was not a space for showcasing design work, it was a key way for creating networks, being found, and linking out to other spaces where one's work might be. It was therefore deemed to be a useful tool when coupled with Behance.

#### *4.3 Students should form good archival habits from the outset of their degree, with multiple opportunities given to evidence their professional capabilities, and the agility to navigate these.*

The point was made that students need to be guided through the process of developing their portfolios in order for it to become habit-forming for them as emerging professionals. This requires support, clear learning expectations, and learning outcomes aligned with assessments within Impact Labs and other design units across the life of the degree. Additionally, as lifelong learners who are self-managed, students should seek to sustain such a living space in an ongoing way where they are able to show how their design processes and work have evolved over time.

Recognising the volume of work they will ultimately collect, to guard against feeling overwhelmed by content in the archival space, Baron (2009), broaching the issue of the ‘multiple portfolio’ problem describes the following concepts which help to manage the content and deploy it appropriately: “duplicating, dispersing, dividing, doubling and developing.” These key concepts encapsulate well the notions surfaced by this research that students will need to be able to easily create and showcase new portfolios and bodies of work in multiple ways, drawing on a central archive of their work. Upon reaching the final Impact Lab related to “purpose”, design students should then be able to extract and tailor a set of different portfolios for different employment opportunities identified, and potentially as a range of outputs (digital and physical). This employer-focused output is the final professional-oriented portfolio category listed by Cabau (2017) and discussed earlier. By this stage, students have worked through portfolios as developmental tools for learning, reflection and assessment, and the balance of purpose shifts outwards beyond the university.

## **5. Discussion and conclusion**

This research has presented a new, transferable model for consideration in the use of portfolios by design educators. Recognising the diversity of requirements now asked of portfolios in design (no longer a folder of drawings only), the authors believe that there cannot be one type of Graduate Professional Portfolio. Rather, this is a conceptual entity that describes a living, evolving and multifaceted archival space, preferably linked to other online spaces from which selected portfolios, or portfolio elements may be drawn. To return to the complex expectations inferred in the concept, “Graduate” denotes something that students have when they leave university, “Professional” is in the sense that it provides a direct link to their chosen professional network/s following graduation, and “Portfolio” is because it encapsulates all possible requirements that may be asked of any portfolio at different stages of their careers and for different audiences.

“Preparing young people for the new future of work is an issue of national importance” (FYA, 2015, p. 3)

Behance has been selected following in depth research of requirements specific to one context, and we propose that whilst in this instance it has been deemed to be most appropriate, in other contexts this may be less about using the same platform, and more about the concept itself. It may also be the case that students schooled in habit-forming archiving of their collective works are themselves able to move away from the Behance platform as appropriate.

### **5.1 Additional considerations**

It should not be assumed that all students wish, or are ready to face the “real world” by opening their portfolios for scrutiny. Orr and Shreeve (2018) note the critical role that art and design schools must play in combining educational and professional spaces, where they might “offer protection from the world whilst at the same time preparing students

to be part of the world” (p. 44). Achieving synergy may be a slower process for some, or even achieved by different means. So whilst evidence points to the need for designers to have some online presence, in the undergraduate learning environment, it is not possible or appropriate to force students to have online profiles and participate in sites with social networking elements. There are privacy options in Behance, but alternatives need to be offered to students who wish to retain their privacy from online spaces, for example to develop an anonymous ‘persona’ which can be deleted later, or submit pdf versions of similar content. The former was offered as an option to all students in the course. Quality assurance implications of hosting student work in spaces not owned by the university also need ongoing consideration. It is suggested that issues such as ownership, be that intellectual property with external partners or students’ individual versus group work, are fully considered within the design and typical quality management processes of the course and encompassing units of study.

Another important point arising from research discussions is that the journey as an emerging design professional starts when students join the university. It is the case for some design disciplines such as Landscape Architecture, that many undergraduate students are already employed in professional practices across the city well before they graduate. This necessitates early considerations of this area within design education, not as a single-touch experience which may be easily forgotten but as a developmental process which should commence at the start of students’ studies and threaded across the degree.

## *5.2 Concluding points*

This work has introduced new data to an area with which most universities are currently grappling (Chaudhuri & Cabau, 2017), forging new ground in both design education and online portfolios, with the potential to shift sector-wide thinking on these aspects.

2019 has seen the implementation of this portfolio model to over 600 students at a first year level, working in interdisciplinary teams across all seven disciplines on authentic design problems together with community and industry partners. In acknowledgement of new ground successfully forged, the work has recently received a Vice-Chancellor’s Award for Excellence in the Contribution to Student Learning and Research.

In keeping with the cyclical nature of action research, future work will focus on connectivity between design discipline areas and their use of portfolios, capturing and evaluating student and staff feedback on the implementation of this concept as the degree is progressively rolled out, and as part of this, examining the changing nature and focus of students’ portfolio spaces as they progress through their degrees.

**Acknowledgements:** The authors wish to thank: student partners for course design who undertook background research and were integral to conversations in developing this model: Eleni Fuller-Weimar, Osman Garelnabi, Steven O’Hanlon-Rose, Kiara Quig, April Steedman, Sean Wanna, Emma Wright; other stakeholders who engaged willingly in conversations, including academics, practitioners and employers.

## 6. References

- Ashford-Rowe, K., Herrington, J., & Brown, C. (2014). Establishing the critical elements that determine authentic assessment. *Assessment & Evaluation in Higher Education*, 39(2), 205-222. <https://doi.org/10.1080/02602938.2013.819566>
- Ashwin, P., Boud, D., Coate, K., Hallett, F., Keane, E., Krause, K., ... & Tooher, M. (2015). *Reflective teaching in higher education*. London, England: Bloomsbury Academic.
- Baron, C. (2009). *Designing a Digital Portfolio (2nd edition)*. Berkeley, California: New Riders.
- Cabau, B. (2017). E-portfolio as a tool to respond higher education ambitions and societal expectations. In T. Chaudhuri, & B. Cabau (Eds.), *E-Portfolios in Higher Education: A Multidisciplinary Approach* (pp. 21-34). Singapore: Springer Nature. [https://doi.org/10.1007/978-981-10-3803-7\\_10](https://doi.org/10.1007/978-981-10-3803-7_10)
- Chaudhuri, T. (2017). (De)Constructing student e-portfolios in five questions: experiences from a community of practice. In: T. Chaudhuri, & B. Cabau (Eds.), *E-Portfolios in Higher Education: A Multidisciplinary Approach* (pp. 3-20). Singapore: Springer Nature. [https://doi.org/10.1007/978-981-10-3803-7\\_10](https://doi.org/10.1007/978-981-10-3803-7_10)
- Chaudhuri, T. and Cabau, B. (Eds.), *E-Portfolios in Higher Education: A Multidisciplinary Approach*. Singapore: Springer Nature. [https://doi.org/10.1007/978-981-10-3803-7\\_10](https://doi.org/10.1007/978-981-10-3803-7_10)
- Cohen, L., Manion, L., & Morrison, K. (2011). *Research methods in education (7th edition)*. Abingdon, England: Routledge.
- Cook-Sather, A., Bovill, C., & Felten, P. (2014). *Engaging students as partners in learning and teaching*. San Francisco, California: Jossey-Bass.
- Crowther, P. (2012). Portfolio review. In: H. H. Askland, M. J. Ostwald, & A. Williams (Eds). *Assessing Creativity: Supporting Learning in Architecture and Design* (pp. 229-240). Sydney, Australia: Australian Government Office for Learning and Teaching (OLT).
- Doloswala, K.N., Thompson, D., & Toner, P. (2013). Digital based media design: the innovative contribution of design graduates from vocational and higher education sectors. *International Journal of Technology and Design Education*, 23, 409-423. <https://doi.org/10.1007/s10798-011-9186-0>
- Fitzgerald, F., Huijser, H., Meth, D., & Neilan, K. (2019). Student-staff partnerships in academic development: The course design studio as a model for sustainable course-wide impact. *International Journal for Academic Development*. <https://doi.org/10.1080/1360144X.2019.1631170>
- Foundation for Young Australians (FYA) (2015). *The new work order: Ensuring young Australians have skills and experience for the jobs of the future, not the past*. <https://www.fya.org.au/report/new-work-order/> (Accessed 15 December 2019).
- Gibbs, P., Cartney, P., Wilkinson, K., Parkinson, J., Cunningham, S., James-Reynolds, C., ... & Pitt, A. (2017). Literature review on the use of action research in higher education. *Educational Action Research*, 25(1), 3-22. <https://doi.org/10.1080/09650792.2015.1124046>
- Hallam, G., & Creagh, T. (2010). E-portfolio use by university students in Australia: A review of the Australian e-portfolio project. *Higher Education Research & Development*, 29(2), 179–193.
- Jones, E. (2010). A professional practice portfolio for quality learning. *Higher Education Quarterly*, 64(3), 292–312.
- Mackh, B.N. (2018). *Higher Education by design: best practices for curricular planning and instruction*. New York: Routledge.

- Meth, D., Russell, H. R., Fitzgerald, R., & Huijser, H. (2020). Enabling scholarship of teaching and learning activities across a curriculum design framework: a lever for faculty engagement. In R. Plews, & M. Amos (Eds.), *Evidence-Based Faculty Development Through the Scholarship of Teaching and Learning (SoTL)* (pp. 347-364). Hershey, PA: IGI Global. doi:10.4018/978-1-7998-2212-7.ch018
- O’Leary, Z. (2010). *The essential guide to doing your research project*. London, England: Sage.
- Orr, S., & Shreeve, A. (2018). *Art and design pedagogy in higher education: knowledge, values and ambiguity in the creative curriculum*. Abingdon, England: Routledge.
- Pegrum, M. (2017). Promoting diversity through e-portfolios. In: T.Chaudhuri & B.Cabau (Eds.) *E-Portfolios in Higher Education: A Multidisciplinary Approach*. Singapore: Springer Nature, pp. v-viii . [https://doi.org/10.1007/978-981-10-3803-7\\_10](https://doi.org/10.1007/978-981-10-3803-7_10)
- Pegrum, M., & Oakley, G. (2017). The changing landscape of e-portfolios: reflections on 5 years of implementing e-portfolios in pre-service teacher education. In: T. Chaudhuri & B. Cabau (Eds.) *E-Portfolios in Higher Education: A Multidisciplinary Approach* (pp.21-34). Singapore: Springer Nature. [https://doi.org/10.1007/978-981-10-3803-7\\_10](https://doi.org/10.1007/978-981-10-3803-7_10)
- Robertson, D. (2013). *Australian design 2013: Issues and concerns in the design professions*. Melbourne, Australia: Design Institute of Australia PN034 (Issue B). <https://www.design.org.au/documents/item/127> (Accessed 17 July, 2019).
- Savage, S.M., Davis, R.M., & Miller, E. (2010) Professional education in built environment and design. Sydney: Australian Learning and Teaching Council. <https://eprints.qut.edu.au/31328/> (Accessed 13 November, 2019).

About the Authors:

**Deanna Meth** (PFHEA, Senior Lecturer, Curriculum & Learning Design) has experience leading strategic projects and research spanning higher education policy, curriculum development and student engagement. Her current work focuses on developing digitally-enabled transdisciplinary, authentic curricula in Creative Industries disciplines.

**Melanie Finger** (QUT lecturer Transdisciplinary Design) has a key role in the School of Design connecting academia with industry, creating job opportunities and fostering long-term partnerships. Working with student partners she develops design curricula, pioneering online portfolio development in the School of Design.

**Dean Brough** (QUT Academic Director Design) has a wealth of experience in design practice and tertiary education contexts. His creative practice has been exhibited at numerous prestigious design venues both nationally and internationally receiving a *Design Institute of Australia* award.