Augmenting students' learning for employability through post-practicum educational processes

Round 1 and 2 project reports

Lead institution: Griffith University

Partner institutions: Flinders University, The University of Melbourne, Monash University, The University of Notre Dame Australia, University of Technology Sydney, Gold Coast Hospital and Healthcare System, Australian Catholic University, Flinders University, University of Tasmania, Edith Cowan University, Curtin University, Southern Cross University, The University of Newcastle, Sunshine Coast University, RMIT University, La Trobe University, The University of Sydney, Queensland University of Technology, University of Canberra

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Project team: Dr Melissa Cain (2015–2016) and Dr Anh Hai Le (project assistant)

External evaluator: Professor Janice Orrell, Flinders University

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Site for Round 1 and 2 reports
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Introduction

Project reports

This document comprises two sets of reports from the project 'Augmenting students learning for employability through post-practicum educational processes'. Much of the work of this project comprised a series of sub-projects being conducted across a total of 19 Australian universities in over 20 disciplinary areas. The first round of sub- projects was conducted within the healthcare sector because of its long-standing and diverse set of existing practicum -related activities. This round was used as a basis to inform and guide the activities of the projects undertaken in Round 2. It is the processes and outcomes of these reports which are contained in this document. The concern was not to present pristine and comprehensive accounts of effectively completed projects, but rather to describe what was undertaken, the issues that arose in their enactment and the findings related to augmenting post-practicum experiences that arose through them.

Round 1 (healthcare sector) sub-projects

The Round 1 participants and 14 sub-projects were all from the healthcare sector. The majority of these were part of the initial application. These participants were contacted and invited to participate based on securing a range of institutions, healthcare disciplines and localities.
Each of the sub-project leaders was provided with a project proposal template that was used to structure and guide the development of a proposal that had to include a consideration of what educational purposes were to be achieved, proposed means of achieving them and the procedures adopted for the implementation and evaluation of the post-practicum interventions. A related concern was to have a uniform approach to proposals and subsequent sub-project work. The grant work commenced in August 2015, and the shaping up of the project, the literature review and survey were undertaken in the remainder of that year.

Round 2 sub-projects

The participants for Round 2 were selected based on responses to a call for expressions of interest in May 2016 through the Australian Cooperative Education Network for up to 30 sub projects. These participants were from a range of institutions and represented a diverse set of disciplines. This allowed an investigation into whether the kind of findings that came from students in healthcare sector courses could provide insights that are more broadly applicable across a range of other disciplines.
The majority of the 30 sub-project leaders were interested in WIL and many of them held educational and/or administrative roles associated with WIL. Most of these already had identified a sub-project that they were interested in pursuing within this activity and had drafted their sub-project plan accordingly.
Across 2017 and into 2018 these sub-projects were enacted. Many had delayed commencements as there was a need to clarify the focus, secure ethical clearance and enact the interventions on one or more occasions. During this period, the project leader engaged with sub-projects individually and collectively but through sharing information and site visits and through other kinds of engagements. Ultimately, the completed sub-projects used the same format as used for the Round 1 sub-projects to produce reports, which were then collated as a report (see separate document).

Round 1 project reports (2016)

Here, the reports of the 14 Round 1 projects are presented as they were provided at the Development Conference held in February 2017.

	Project	Participants/contacts	Institution	Discipline
1	Evaluation of the Post-Practicum Clinical Reasoning Oral Exam	Tracy Levett-Jones, Helen Courtney-Pratt and Natalie Govind	UTS	Nursing
2	Peer group simulation activity post-practicum	Helen Courtney-Pratt and Tracy Levett-Jones	UTAS	Nursing
3	Post-practicum strategies to translate clinical experience to attributes of employability	Garry Kirwan, Neil Tuttle, Ben Weeks and Liisa Laakso	Griffith (AH)	Physiotherapy
4	Post-placement week – using students' experiences to enrich understandings of distinct kinds of nutrition and dietetics practice	Lauren Williams Lynda Ross, Lana Mitchel and Katherine Markwell	Griffith (AH)	Nutrition and dietetics
5	Post-practicum debrief focussing on the development of resilience and occupational identity	Andrea Bialocerkowsk, Libby Cardell and Shirley Morrisey	Griffith (AH)	Speech therapy
6	Integrating an Employability Intervention into Clinical Practicum Debrief Sessions	Kelly Clanchy; Grad Dip Ex Sci Teaching Team.	Griffith (AH)	Exercise Physiology
7	Individual student feedback: critical reflective piece of writing	Gary Rogers	Griffith	Medicine
8	Feedback from practicum using web-based engagements with peers	Julia Harrison and Liz Molloy	Monash/Melbourne	Medicine
9	Reflective learning circles	Julia Harrison and Liz Molloy	Monash/Melbourne	Medicine
10	Graduate entry students community practice/facilitating reflective group activities	Jenny Newton	Monash	Nursing
11	Midwifery continuity of care experiences: enhancing learning through reflective practice	Linda Sweet,Trudi Mannix, Kristen Graham, Janice Bass, Mary Sidebotham & Jenny Fenwick	Flinders/Griffith	Midwifery
12	Learning circles to develop inter-subjectivity	Laurie Grealish, Lyn Armit, Thea van de Mortel and Marion Mitchell	Griffith/GCH	Nursing
13	Using programmed de-briefs to augment students' experiences	Niamh Keane and Carole Steketee	Notre Dame	Medicine
14	Enhancing students' feedback literacy in the workplace: a learner-centred approach	Christy Noble, Lyn Armit, Leigh Collier Christine Sly and Liz Molloy	GCH/Melbourne	Medical, Allied Health, Nursing, Midwifery

Projects: Principal focus for teaching and learning strategies and participants

	Project	Actors	Principal focus (Day One)	Implementation (Day Two)
1	Post-Practicum Clinical Reasoning Oral Exam -	Tracy, Helen & Natalie	Peer feedback	Approximately 100 second year undergraduate nursing students
2	Peer group simulation activity post-practicum	Tracy & Helen Newcastle - Nursing	Simulation – pre-brief activity	60 first year nursing students
3	Post-practicum strategies to translate clinical experience to attributes of employability	Garry K, Neil, Ben & Liisa, Physiotherapy	Specific post-placement learning tasks	72 second year students
4	Using students' experiences to enrich understandings of distinct nutrition and dietetics practices	Lauren, Lynda, Lana and Katherine, Nutrition and Dietetics	Sharing and comparing group activities during week-long debrief event	All final year undergrad ND students
5	Debrief focussing on the development of resilience and occupational identity	Andrea, Libby & Shirley, Speech therapy	Debriefing workshops	All first and second year masters students 35-40 per year)
6	Integrating the Employability Framework into Grad Dip of Exercise Science Post-Practicum Debrief	Kelly & Grad Dip Ex Sci Teaching Team	Enhancing debriefing sessions	20 students enrolled in
7	Individual student feedback: critical reflective piece of writing	Gary Rogers, Medicine	Reflective writing pieces based on critical observation task	150 final year medical, ~30 pharmacy, ~80 physiotherapy, ~20 exercise physiology, ~30 clinical psychology students
8	Feedback from practicum using web-based engagements with peers	Julia & Liz, Medicine	Online engagement with critical thinking, reflection and peer discussion	500 final year medical students via on-line forums
9	Using reflective learning circle post clinical placement	Julia & Liz, Medicine	Facilitated learning circles	120 final year medical students
10	Students discussing placement experiences through producing a video clip	Jenny, Nursing	On-line discussion forums	60 masters level nursing practice students
11	Midwifery continuity of care experiences: enhancing learning through reflective practice	Linda, Trudi, Kirste, Janice, Mary & Jenny, Midwifery	Reflective writing and group discussion	1st year: 60 (approx.), 2nd year: 60 (approx.) and 3rd year: 40 (approx.) midwifery students
12	SUCCEED 2.1: Learning circles to develop inter-subjectivity	Laurie, Lyn, Thea & Marion, Nursing	Facilitated student appraisal of practice	2nd and 3rd year nursing students (70-120)

13	Using programed de-briefs to augment students' experiences	Niamh & Carole, Medicine	Debriefs of work activities	Two groups of 20 Fourth year medical students
14	Feedback strategies at end of practicums	Christy, Lyn, Leigh, Christine & Liz	Combination of self-evaluation and feedback from expert others	Three groups of 6-8 students from allied health, medical, nursing and midwifery

Evaluation of the Post-Practicum Clinical Reasoning Oral Exam

Tracy Levett-Jones[1], Helen Courtney-Pratt[2], & Natalie Govind[3]

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Abstract

Background – Nurses with effective clinical reasoning skills have a positive impact on patient outcomes. Conversely, those with poor clinical reasoning skills often fail to detect impending patient deterioration. It is vital for students to understand the process and steps of clinical reasoning and demonstrate their ability to 'think like a nurse'. However, teaching and assessing a complex cognitive skill such as clinical reasoning can be challenging for educators.
Aim – The aim of this project was to evaluate student performance in and perceptions of in a newly introduced post-practicum oral clinical reasoning exam.
Post-practicum experience being evaluated – Nursing students were provided with a verbal clinical handover and the health care records of four patients. In the individual oral exam that followed students were required to describe how they would prioritise, plan and manage the care of the four patients using a clinical reasoning cycle as their organising framework. The exam was marked by an academic staff member.
Method of evaluation – Following ethical approval and on completion of the oral exam, students were invited to complete a short evaluation survey with closed and open ended questions. Qualitative data was thematically analysed and quantitative data was statistically analysed.
Evaluation results – There were 471 students enrolled in the clinical course and invited to complete the evaluation survey. Of these, 181 participated giving a response rate of 38%. The mean satisfaction score was 3.03 out of a maximum of 5 indicating a moderate level of participant satisfaction with the oral exam. Three themes emerged from qualitative analysis: "Better than written assessment items", "Authenticity of the approach" and "The need for better preparation".

Brief description of academic area and students involved

This project was undertaken in a school of nursing situated within one large semi-metropolitan university in NSW. All undergraduate nursing students enrolled in a second-year clinical course were required to undertake the oral clinical reasoning exam as a mandatory course assessment item. Participation in the linked research project was voluntary and anonymous.

Particular purpose

What is clinical reasoning?

Clinical reasoning is defined as a 'process by which nurses (and other clinicians) collect cues, process the information, come to an understanding of a patient problem or situation, plan and implement interventions, evaluate outcomes, and reflect on and learn from the process' (Levett-Jones et al. 2010, p. 516). Clinical reasoning requires a critical thinking 'disposition' (Scheffer & Rubenfeld 2000) and is influenced by a person's assumptions, perspectives, attitudes and preconceptions (McCarthy 2003).

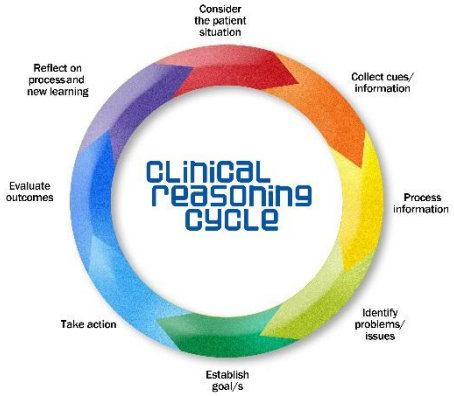
Clinical reasoning is often used interchangeably with terms such as 'clinical judgment', 'problem solving', 'decision making' and 'critical thinking'. While there are some similarities between

these terms, clinical reasoning remains a discrete, ordered and cyclical process that often leads to a series of linked clinical encounters, particularly in response to unpredictable, emergent and non-routine situations.

The clinical reasoning process

A diagram of the clinical reasoning cycle is shown in Figure 1. The cycle begins at 1200 hours and moves in a clockwise direction. The circle represents the cyclical nature of clinical interventions and the importance of evaluation and reflection. The clinical reasoning cycle consists of eight main stages or steps: *look*, *collect*, *process*, *decide*, *plan*, *act*, *evaluate* and *reflect*. In reality, however, the stages merge and the boundaries between them are often blurred. Although each stage is presented as a separate and distinct element in this diagram, clinical reasoning is a dynamic process and nurses often combine one or more stages or move back and forth between them before reaching a decision, taking action and evaluating outcomes.

Figure 1. The clinical reasoning cycle



Why is clinical reasoning important?

Nurses are responsible for a significant proportion of the judgments and decisions made in healthcare and they engage in multiple clinical reasoning episodes every day. For example, nurses on a medical ward have been observed engaging in up to 50 significant clinical reasoning encounters per shift (Thompson et al. 2004). Similar research findings were also identified by Bucknall (2000), who observed that intensive care nurses faced a clinical judgment or decision every 30 seconds.

The ability to respond to challenging and dynamic clinical situations requires, not only psychomotor skills and knowledge, but also sophisticated thinking abilities. Application of clinical reasoning skills has a positive impact on patient outcomes. Conversely, nurses with poor clinical reasoning skills often fail to detect patient deterioration, resulting in a 'failure-to-rescue' (Aiken et al. 2003). In fact, cognitive failure has been identified as a factor in 57 per cent of adverse clinical events (Wilson et al. 1995).

Too often new graduate nurses lack the requisite level of clinical reasoning skills needed to respond appropriately to clinical situations. For example, one American study showed that 70 per cent of graduate nurses scored at an 'unsafe' level of clinical reasoning despite having satisfactory content knowledge and adequate procedural skills (del Bueno 2005). The reasons for this are multidimensional and include the tendency to make errors in time-sensitive situations where there is a large amount of data to process, and difficulties in distinguishing between a clinical problem that needs immediate attention and one that is less acute (Hoffman 2007). Graduate nurses are frequently required to care for and make decisions about complex patients with diverse health needs; this requires effective and well-rehearsed clinical reasoning skills.

Enacted post-practicum interventions

Clinical reasoning requires practice and active engagement in deliberate learning activities. Educators must model, teach and assess students' developing clinical reasoning skills, in both academic and clinical settings. Written assessment items are not always an effective approach for students to demonstrate understanding and application of clinical reasoning in an authentic manner. However, an oral exam has the potential to facilitate students' ability to describe their practice more fully without the constraints imposed by formal academic writing.

The post practicum oral clinical reasoning exam was designed to assess nursing students' content knowledge (domain-specific) and process knowledge (clinical reasoning ability). The constructivist approach adopted allowed students to construct knowledge by being actively engaged in a learning activity that was situated, experiential and authentic. The clinical scenarios presented to students provided the opportunity for reiterative learning which leads to deeper levels of processing, thus improving retention and recall of information. This approach also promoted cognitive rehearsal of the clinical reasoning process; a method of mentally practising effective responses to specific situations in order to develop and integrate effective skills into one's repertoire of knowledge and skills.

On the day of the clinical reasoning exam nursing students met individually with an academic staff member who provided a verbal clinical handover and the health care records of four patients. Students then had 30 minutes to describe how they would prioritise, plan and manage the care of the four patients using the clinical reasoning cycle as their organising framework. The exam was marked using a structured rubric with clear performance criteria.

Data gathered and analysed

Following ethical approval and on completion of the oral exam students were invited to complete a 16 item evaluation survey with closed and open ended questions. Qualitative data was thematically analysed and quantitative data was statistically analysed. Student performance in the clinical reasoning exam was also examined.

Key findings

Participants – There were 471 students enrolled in the clinical course and invited to complete the evaluation survey. Of these, 181 participated in the survey, giving a response rate of 38%. The majority (91%) of participants were female and 63% were currently or previously employed in the healthcare industry mainly as assistants in nursing, enrolled nurses or healthcare assistants.
Student performance – The clinical reasoning exam was worth 30 marks. The mean mark for the assessment item was 20.36 and the median 20 (SD 4.46). Twenty-eight students achieved a mark of less than 15 and received a fail grade for this assessment item.
Student perceptions – as might be expected with this type of newly introduced and reasonably challenging assessment item, students' perceptions of the oral clinical reasoning exam varied. The mean satisfaction score was 3.03 out of a maximum of 5 indicating a moderate level of participant satisfaction with the oral exam. Table 1 lists the scores for students' degree of agreement with each of the 14 Likert scale survey items.
The three highest scores were for:
Item 1: *The educator made me feel comfortable and at ease during the oral assessment* (M 3.38); Item 4: *The oral assessment helped me to recognise my strengths and weaknesses in terms of problem solving* (M 3.58); and Item 6: *The oral assessment caused me to reflect upon my clinical reasoning ability* (M 3.56).
The three lowest scores were for:
Item 8: *I believed I performed better in the post-practicum oral assessment than I would have had I undertaken it prior to my clinical placement* (M 2.29); Item 12. *The oral assessment was an appropriate way to assess my clinical reasoning ability* (M 2.77); and Item 13 *The oral assessment was a fair way of assessing my clinical reasoning ability* (M 2.77).

Table 1
Scores for students' degree of agreement with each of the 17 Likert scale survey items

Answer Options	Strongly disagree	Disagree	Unsure	Agree	Strongly agree	Mean
1. The educator made me feel comfortable and at ease during the oral assessment	16	20	23	60	65	3.38
2. I was able to use what I learned from my clinical placement in the oral assessment	23	37	25	66	33	2.86
3. The oral assessment allowed me to demonstrate my knowledge about patient care	16	38	30	62	38	2.88
4. The oral assessment helped me to recognise my strengths and weaknesses in terms of problem solving	11	25	13	78	57	3.58
5. The oral assessment helped me to recognise my strengths and weaknesses in terms of prioritising and planning patient care	13	24	21	82	44	3.31
6. The oral assessment caused me to reflect upon my clinical reasoning ability	10	19	17	83	55	3.56
7. The educator's questions during the oral assessment helped me to learn	17	36	27	59	45	2.99
8. I believed I performed better in the post-practicum oral assessment than I would have had I undertaken it prior to my clinical placement	14	37	59	36	38	2.29
9. I will be able to use what I learned from the oral assessment in my future practice	14	23	22	80	45	3.29
10. The educator provided constructive feedback following the oral assessment	21	38	29	55	39	2.81
11. The oral assessment was a valuable form of assessment	39	27	22	39	57	2.90
12. The oral assessment was an appropriate way to assess my clinical reasoning ability	30	29	31	47	46	2.77
13. The oral assessment was a fair way of assessing my clinical reasoning ability	34	36	23	46	43	2.77
14. I preferred the oral assessment rather than a written assessment item for assessing clinical reasoning	43	24	22	21	74	2.96

Three themes emerged from qualitative analysis: "Better than written assessment items", "Authenticity of the approach" and "The need for better preparation". Participant quotes supporting each of these themes are provided below:

Better than written assessment items

- *I liked that it was face-to-face and individualised*
- *it took a lot less time than a written assessment item and there was no need for references!*
- *it was clearer than written assessment items as we could ask the assessor questions*
- *it was good being able to interact with the assessor*
- *I was able to able to articulate my clinical reasoning and provide justification for my answers*
- *feedback was immediately provided so we knew exactly how we were going*

Authenticity of the approach

- *the patient scenarios were realistic and authentic*
- *the oral assessment allowed me to carefully think about and prioritise patient care just like I would on the job*
- *I was able to articulate and demonstrate my knowledge and understanding of the patient situations*
- *it made you think and reflect*
- *undertaking the assessment item after my clinical placement allowed for practical application of what I had learned*

The need for better preparation

- *I would have benefited from some sort of preparation workbook prior to the assessment item*
- *there should have been something like a clinical handover provided before the exam to help us prepare*
- *a cheat sheet with the clinical reasoning cycle included would have helped us to structure our thinking*
- *a clearer and more detailed assessment description was needed to give us an idea of what to expect*
- *more information was needed each of the patients and could have been provided before the assessment*
- *I needed more time to think through each answer is I don't feel I was able to prepare well for this assignment*

Students' performance and evaluation feedback indicated that although this assessment item was positively received by many students, others found it stressful and difficult to prepare for. As this was the first time this type of oral exam had been introduced, these perspectives are valuable and can be used to improve future iterations of the post-practicum clinical reasoning exam.

Issues arising for discussion

- The oral clinical reasoning exam allowed students to apply what they had learned on the clinical placement, 'think on their feet' and cognitively process and prioritise patient care needs.
- An oral exam provides some advantages to the usual written assessment items and exams, particularly for assessment of cognitive skills.
- Students need adequate preparation and clear instructions for oral clinical reasoning exams, as well as opportunities to practice and rehearse these types of challenging assessments.
- The effectiveness of the oral clinical reasoning exam was influenced by the immediacy, quality, clarity and amount of feedback provided by the assessor.

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Peer Group Simulation Activity Post Practicum

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Intended Project

Background **–** The purpose of the simulation is to provide an opportunity post practicum to apply, explore, recognise, and consolidate learning that has resulted from participation in clinical practice. The focus is on communication skills and clinical safety through undertaking a patient assessment during the simulation. We elected to focus on first year undergraduates immediately following first clinical placement, a time recognised as challenging in relation not only to application of skill in the clinical environment but also communication and exposure to complex cultures, all impacting on areas of attrition, further placement experiences and preparedness to progress in the degree.

Aim **–** The aim of the pilot delivery of the simulation is to enable exploration of a clinical scenario likely to have been experienced in practice.

Post-practicum experience being evaluated

In a safe supported environment, undergraduates can explore past events, reconsider outcomes and alternate actions and determine new learning post-practicum. Providing an opportunity to explore a scenario immediately following placement will allow students to plan what they may do differently in future placement and to identify positive aspects with an aim to replicate in the clinical milieu. The approach is suitable for health care undergraduates and could be extended to a multidisciplinary simulation following pilot

Method of evaluation – Ethics approval was provided by the HREC TAS. Data to be collected included audio recording of debrief session and completion of a short validated survey (CARE inventory tool). Qualitative data will be thematically analysed and quantitative data statistically analysed.

Suspension of project -the project stalled post ethics. Delays in faculty support, student recruitment and timelines of clinical placement impacted in such a way that the project was suspended.

Timeline:

Dates	Action
June – July 2016	Ethics prepared and submitted to faculty
9th Sept 2016	Faulty approval to submit ethics after long delay related to perceived conflict with proposed implementation of faculty simulation program
9th Sept 2016	Ethics submitted for review to HREC
13th Sept 2016	Ethics approval received
21st Sept 2016	Invitation to participate (3rd October) sent to all first year students by third party (gatekeeper). Three students responded – cancelled session
1st Oct 2016	Rescheduled dates to 18th October and 7th November. Six participants recruited for 7th November with two subsequently cancelling

Reflections on Process

We have learnt valuable lessons in the process that include:

1. The difficulties of providing a simulation experience when students have limited prior exposure to such experiences.

   At this site undergraduate nursing students have had very limited exposure to simulation. This may have provided some uncertainty regarding participation.

2. The benefits or otherwise of the simulation are not immediate apparent to the student group.

   It is thought that if they had prior exposure (with positive experience) that students may have felt more confident about participation and may have positive perceptions regarding potential learning outcomes.

3. It is now evident that post practicum the focus for students is on completing assessment tasks and preparing for upcoming exams;

   Due to delays in ethics approval we were later in the scheduling of sessions and were competing with assessment task deadlines and exam schedules.

4. 'extra-curricular' activities (over and above usual course requirements) are difficult for student to prioritise and attend

   It may have been wiser to embed the requirement into course or unit assessment items in order to increase participation in the simulation and research.

Comments from Survey instrument: Post Practicum project from February 2016

Responses to the question of how post practicum experiences would occur and what would happen during them identified:

- Students had preference for small group activities led by an academic.
- Critical reflection was a highly regarded activity
- Non-judgemental, confidential environment was required

The proposed project met the requirements of students articulated in the survey however did so through a simulation and debrief. Marketing of the benefits of simulation and prioritising the timing of information and provision of the activity are paramount.

Post-practicum strategies to translate clinical experience to attributes of employability – Responding to graduate selection criteria

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Abstract

Graduate employability is important to students, educators and universities [1, 2]. Although students develop attributes essential for employment throughout their study, it is important that they are also able to effectively communicate those attributes to potential employers [3]. Therefore, the aim of the project was to enrich the skills of physiotherapy students in demonstrating university skills and knowledge and clinical placement experiences as attributes of employability.

Forty-seven final-year physiotherapy students volunteered and consented to participate. Each student wrote an application for a hypothetical new graduate position in one of four employment sectors. A sector representative evaluated each application, provided written feedback to the applicant and a score to the investigators. Guided by feedback, students were then able to improve the content and presentation of their applications, before subsequently applying for another hypothetical position in a different sector and undergoing a mock interview. Sector representatives scored written applications and interviews, and provided direction to the students on how to improve their application in both verbal and written formats.

Between the first and second rounds, written application scores increased from 6.2/10.0 ±1.8 to 7.2/10.0 ±1.7 ($p=0.01$), with a score of seven significantly more likely to result in an interview ($p\leq0.001$) according to employer comments. Student confidence in communicating attributes of employability through a written application increased from 1.6/5.0 (0.6) to 2.7/5 (0.6). Therefore, it appears the intervention was successful in improving student ability to translate clinical experiences into employable attributes through a job application process

Brief description of academic area

Students of the physiotherapy program in the School of Allied Health Sciences, Griffith University participated in the project. A total of f 47 students enrolled in 7037AHS Practice of Physiotherapy VI volunteered and the project was undertaken between April 2016 and September 2016 at the Gold Coast campus. The mean participant age was 25.1±5.3 years with 66.7% (n=30) of participants being female. Only 6.7% (n=3) of participants had undergone previous training in job application processes.

Particular purpose

Physiotherapy has a long history of incorporating Work Integrated Learning (WIL) into its programs under the term ‘clinical placement’. At present, students enrolled in the Griffith University Master of Physiotherapy program undertake six placements totalling 27 full-time clinical weeks. The placements are integrated throughout the program, with each one focusing on specific aspects of physiotherapy and healthcare practice.

The program provides successive levels of scaffolding. Students cover an area of content on campus followed by pre-placement planning sessions and, in some cases, simulated learning environments modelled on the placement that is to follow. Their clinical placement is directly

related to the preceding on-campus content and each placement is followed by a post-placement reflective practice session. Each subsequent on-campus block builds on the knowledge and skills from previous blocks and clinical placements. In summary, each on-campus block is followed by a related clinical placement which in turn supports the following on-campus block. Modules are in place to facilitate the transitions to and from clinical placements.

The entire program is structured to prepare students to being employed as qualified Physiotherapists. Some of the attributes of employability (such as the ability to effectively communicate, to work autonomously or to show leadership) have not been a part of the program to date. Although we have been diligent to assist transitions between on-campus blocks and clinical placements, student feedback has highlighted a perceived lack of readiness to successfully transition from university to employment.

One aspect of the transition to employment is the concept of employability. Although employability is complex and dependent on many factors, it is recognised that the skill of applying for a job is a critical component [1, 2, 4]. Generally, within the physiotherapy profession, new graduate physiotherapists engage with a competitive recruitment process involving a written application (with cover letter and response to key selection criteria), curriculum vitae and an interview. Competition for new graduate physiotherapy positions is increasing each year in Australia with a greater than 300% increase in numbers of university programs and concomitant number of graduates. Students undertake extensive training to acquire knowledge, skills and competency in the practice of physiotherapy. The ability to communicate these attributes and capabilities during the job application process, which is essential for employment success, has not previously been a focus of our program.

The aim of this project was to apply the same principles of scaffolding that we use to assist students to transition between on-campus teaching and clinical placements and apply them to the transition from university education to employment. Specifically we aimed to develop a set of post-placement learning tasks for students that were focused on translating previous clinical experiences into attributes relevant to new graduate employment. In line with current professional practice, the tasks included writing job applications and participating in simulated new graduate interviews based on key selection criteria typically found in new graduate applications.

Enacted post-practicum interventions

The intervention consisted of two stages. Historically, students attended one lecture on applying for physiotherapy positions and this took place prior to the project. In the first stage, final year physiotherapy students wrote an application for a new graduate position based on previously advertised selection criteria in one of four areas of practice. Applications were submitted and reviewed by one industry representative from each of the four areas of practice. Each representative had previous experience in the employment of new graduate physiotherapists. Students received individual written feedback as well as a score out of 10 based on standard written application criteria. Finally, applications were categorised to indicate if the application would likely progress to interview or not.

After students had reviewed their feedback, a facilitated focus group was conducted to discuss the elements of a written application that were considered more and less desirable. Furthermore, the key attributes of employability sought by employers were discussed. At the conclusion of the focus group, students identified personal goals to improve their attributes of employability based on the knowledge gained in the focus groups. The students then had the opportunity to develop these skills during clinical placements conducted between phase one and phase two.

In the second stage students selected a different area of practice and prepared a second, written application, incorporating the learnings and additional skills developed from the first stage. Students again received written feedback as well as a score out of 10 and an indication as to whether an interview would have been offered.

Finally, students underwent a simulated new graduate interview. The interview panel consisted of the same industry representative who reviewed the application, a member of academic staff and a student peer who was also involved in the project. The interview was rated and verbal feedback provided including aspects of their performance and strategies for improvement. The two stages were intended to iteratively replicate the application process for new graduate physiotherapy positions.

Data gathered and analysed

Both quantitative and qualitative methods of data collection were employed to evaluate the project. Firstly, written applications and interview performances were scored on a scale from 0 – 10, where 10 represented the best performance. The score was based on the student's ability to meet the employment criteria of the relevant clinical setting. The mean and standard deviation for applications from each phase of the project was calculated and compared using a paired samples t-test., Chi Squared analysis was conducted comparing the significance between an application score of seven or greater and the likelihood of achieving an interview.

Student perception of confidence and understanding in applying for new graduate positions was collected before and after each application. Student perception of their ability to demonstrate attributes of employability through a written application or interview process was also collected. Student responses were aggregated and descriptive statistics presented to determine how student perceptions changed over the course of the project.

Key findings

The primary outcome measure for the project was student performance on the written application based on the 10-point scoring criteria. The written application score directly represents the students' ability to meet the employers' expectations for the position description, hence, is the best predictor of a student's likelihood to progress to interview. Therefore, it was considered reasonable for the application score to be the primary measure to evaluate the effectiveness of the intervention. The mean written application score, significantly improved from 6.1±1.8 in the first phase to 7.1±1.7 in the second phase ($p=0.01$). This outcome demonstrates that the intervention was successful in improving student capabilities in demonstrating attributes of employability when writing a new graduate application. Furthermore, Chi Squared analysis demonstrated that a score of seven or greater on the written application was significantly more likely to result in an interview ($p<0.001$). As the mean score for written applications increased to a score more likely to result in interview demonstrates the practical importance of the intervention.

Over the course of the project, student self-rated confidence in applying for new graduate positions increased from 1.6±0.58 to 2.7±0.6 on a 5-point Likert scale where 5 represented 'very confident'. Student feedback at the end of the project also recognised the benefits of the focus group in improving written application skills (3.5±0.5) and the simulated interviews at improving confidence in undertaking an interview (3.5±0.5). Overall student satisfaction in achieving the project aim of improving employability was 89. 9%±10.6 indicating a high level of student satisfaction for the inclusion of this form of curriculum activity.

The findings of this project reinforce the importance of students engaging in practical employment activities to augment their likelihood of progressing through expected recruitment processes. Authentic activities, delivered by current employers of new graduates, appear to be an effective method to achieve such an outcome. In professions, where standardised new graduate

employment practices are common place, integrating strategies that develop skills for translating learning experiences into attributes of employability through a written application and interview application process are critical for maximising student success upon graduation.

Issues arising

There was a 12.8% (n=6) attrition of students across the project and only 61.8% (n=47) of the eligible student population volunteered to participate. The primary reason for not participating or to withdraw was competing academic and clinical placement requirements. Due to the fact the project was extracurricular, core academic and clinical tasks were required to be completed concurrently with the project. Therefore, in order to ensure maximum accessibility, integration of the project into the curricular would be ideal. This would allow students to dedicate time and thought to develop their job application skills.

A small number of students (n=2) reported the focus groups to be confronting when discussing undesirable aspects of their applications. A perception of failure was reported, which left the students with a perception that this may hinder their future opportunities in applying for employment opportunities. Our methodology was designed to blind employers from the identity of student's, however, within the focus group some students felt it was 'easy to figure out who it was'. In future practice, it would be important to ensure anonymity is maintained within the focus groups to ensure a safe opportunity for students to build competence is provided.

There was consistent student feedback that a greater opportunity for one-to-one guidance from the focus group facilitator would be highly valued. This was coupled with a perception that some of the focus groups were too large, which hindered the ability to address individual needs. Obviously, the main difficulty with reducing group size is the need for an increase in resources. In our situation, certain clinical areas were more popular than others. Thus, dividing these focus groups into two and providing two facilitators may be a solution in future iterations of the project.

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Reflections and Future Directions: Post-practicum workshops to assist Student Dietitians to Transition to Accredited Practising Dietitians

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Abstract

This project aimed to assist dietetic interns make the transition to practice through post-placement workshop activities. Bachelor of Nutrition and Dietetics students at Griffith University spend the final six months of their degree undertaking 20 weeks of placement followed by a week-long workshop (Post-placement week) upon return to University. We redesigned the existing Post-placement week using design-based research principles, to make it consistent with the overall pedagogy of the degree. Three particular activities were developed: reflection and debriefing from the hospital experience, goal setting for continued professional development and a simulated job application and interview process. The new version of the workshop was implemented in June 2016, evaluated then redesigned for implementation and evaluation in November of 2016. Process and impact evaluation data were collected by a series of questionnaires using Survey Monkey, which included Likert scale ratings and open-ended comments. Other qualitative data was collected through focus group discussions with students and reflections of small group facilitators.

The first iteration of the workshop was implemented as was intended, however student satisfaction scores were not as high as expected for some activities. Qualitative comments suggested that the introduction of written examinations as assessment items at the beginning of the week created a negative feeling among the group that coloured the way in which students perceived most activities. In semester 2, 2016 we altered the assessment tasks and better communicated the purpose of Post-placement week to the students prior to, and during, placement. Minor modifications were made to program delivery. Satisfaction scores were higher in this second iteration, with all students finding the sessions at least moderately useful and of above average interest. Evaluation of employability initiatives showed their perceived usefulness to be time sensitive. Several learnings about post-practicum interventions are evident from this work.

Brief description of academic area

Bachelor of Nutrition and Dietetics students at Griffith University undertake 20 weeks of professional placement at the end of their degree. The aims of fieldwork are for students to be able to demonstrate entry level competence as Dietitians according to national standards, and to have a positive experience that enhances future confidence in dietetic practice. After placement, students return to the University for a mandatory, week-long Post-placement workshop to complete final assessment and consolidate their learning. Two cohorts of students undertake placement each year, one in each semester. In semester 1, 2016, 31 students attended Post-placement week and 15 in semester 2.

Educational purpose

In the Bachelor of Nutrition and Dietetics at Griffith University, the major placement (20 weeks) occurs at the end of the degree program, predominantly in the acute hospital setting. Students are placed all over Australia with just one or two of their peers, and do not return to the University setting until placement is completed. Thus after 3.5 years as a co-located cohort, their experiential learning takes place in relative isolation from their peers and the academic team, and immediately prior to graduation. This constrained the opportunity to formally and collectively reflect on their placement learning in the stressful environment of the hospital setting, before seeking employment in that setting.

The highly competitive job market in Australian dietetics means that hundreds of new graduates are competing for advertised positions in hospitals, which are still the major employer of the dietetic workforce (Health Workforce Australia, 2014). The ability of final year dietetic students to reflect has been found to be important in developing the critical thinking and clinical reasoning essential for success in the hospital setting (Palermo et al, 2009). As health professionals in an evidence-based field, continuing professional development (CPD) is vital to high quality patient outcomes and development of the profession (Petrillo, 2003). In Dietetics, CPD is a professionally audited but self-directed process, and students need to make the transition from having their learning directed by academics to directing their own learning as graduates.

Skills in reflective learning, career planning and employability therefore have the potential to provide graduates with an edge in obtaining these highly contested positions and making a successful transition to the workforce. Such skill development would require a dedicated intervention program.

In 2015 a week-long Post-Placement workshop was created (prior to that students only attended a single day at University to each deliver an unstructured five minute presentation on their experiences).

The aim of the original version of Post-placement week was to provide students with the opportunity for reflection and preparation for employment. While student feedback was fairly positive, some key elements were lacking, including reflection on hospital based experiences, and we felt the event would benefit from redesign on pedagogic principles.

The aim of this project was to assist students to transition to the role of health professional by developing skills in hospital placement-focused reflection, career planning and employability in a post-practicum intervention (a redesigned version of Post-placement Week).

The educational goals of the post-practicum intervention were for students to be able to:

1. process their experiential learning in the hospital setting in order to integrate it with their learning from other sources such as their theoretical knowledge base and the experiences of other students
2. develop future career learning goals for CPD according to the program of the Dietitians Association of Australia necessary for their attainment of Accredited Practising Dietitian status
3. translate their coursework and practicum experience into marketable skills to enhance their employment opportunities.

Enacted post-practicum interventions

We redesigned the existing Post-placement workshop using design-based research principles, where development and research take place through continuous cycles of design, enactment, analysis, and redesign (Edelson 2002; van der Akker et al nd). This project was part of a broader initiative to

improve practicum consistency with the overall curriculum pedagogy (Ross et al, in press). Through seeking and acting on student feedback, the students become co-designers of the curriculum.

Given the relative isolation of students while on placement, a face-to-face delivery mode was chosen to bring students back to their learning environment, with their teachers and peers, for degree closure. Three activities were developed: reflection and debriefing on hospital experiences, CPD goal setting and a simulated job application and interview process (see Appendix 1 for the workshop program).

For the hospital experience reflection and debriefing, we used critical incidents and stages of critical reasoning (Delany & Watkin, 2009). Trained dietitian facilitators led 60 minute small group discussions with 6-8 students per group. Small group format was chosen to create an atmosphere of trust and honesty to debrief over what may have been difficult experiences. Key learnings from the small groups were then considered by the entire group in a facilitated discussion for a further 45 minutes, to reflect on commonalities and differences in the hospital experience.

A 30 minute session on setting CPD career goals was led by a facilitator, and each student developed three individualised goals.

The simulated job application and interview was held over 1.5 days, with a full day workshop from a Careers professional then a half day simulated interview process. Prior to Post-placement week, students submitted a job application in response to their choice of one of four advertisements and learned how to modify this CV in the full day workshop. Interviews were conducted by real Dietitian Managers and careers staff to enhance networking and create a realistic interview environment.

Data gathered and analysed

Process, impact and outcome evaluation materials were developed at the time of planning. Outcome evaluation (employment success) will be conducted outside the time frame of this project.

Process evaluation

- Data was collected from students (satisfaction with program materials and delivery) at the end of each workshop day via an online survey (Survey Monkey). Items included 5-point Likert scales and open-ended questions.
- Focus group discussions were held with students at the end of the workshop.
- Data was collected from group facilitators (implementation record and reflections) and careers staff (reflections) in the form of documents.

Impact evaluation

The following data was collected to measure whether each educational goal was attained:

- Written reflection completed by students after participation in small group discussion for hospital debriefing to examine learning integration.
- Learning contracts addressing CPD goals using the format of the Dietitians Association of Australia were collected from students.
- Students submitted a CV after a CV writing workshop and prior to the simulated job interview
- Feedback on student performance at interview was collected from Dietitian Managers and careers staff.

The quantitative data was analysed using descriptive statistics. Qualitative data was thematically analysed.

Key findings

Semester one 2016 implementation of the Post-practicum intervention: Post-placement week

The first iteration of the workshop was implemented as intended according to the Semester 1 program (shown in Appendix 1), including the new components of the hospital experience reflection and debriefing, the CPD goal setting and the simulated job application.

The student satisfaction scores (see Table 1) were not as high as we had hoped for the hospital experience reflection and debriefing or for the CPD goal setting. The item evaluating the hospital experience debrief asked only about the activity as a whole, so it was difficult to determine whether the students found the small group discussion or the large group discussion component more useful. Qualitative comments varied with individuals, with one students stating '*The individual group reflection sessions were good but the one with everyone was a waste of time'* and another saying *'The smaller group sessions are probably unnecessary. We could have just had a longer, larger group session'*.

The small-group facilitators found these sessions to be useful and felt that the students reflected well in terms of both positive and negative hospital experiences. Students who had emotion-provoking experiences (such as a patient having a cardiac arrest in their presence) were able to release some of that emotion and be supported by their peers who described similar experiences. As one facilitator said '*I should have brought tissues'.* They described other students as having 'lightbulb moments' in the small group session where students were able to see how they might have done things differently or how they might learn in future. The large group facilitator found that it was difficult to draw responses out of the group, but that the summary by those who did participate was very insightful.

The focus group discussions held at the end of the week revealed that the introduction of written examination as assessment items at the beginning of the week had created a negative feeling among the group, which coloured the way in which students perceived the debrief and goal setting activities. This suggested we had not successfully communicated the importance of the workshop activities to the students and that we were expecting too much of them in a one-week period.

In contrast, the semester one students found the simulated job application process to be highly useful, interesting and engaging. Several of the students reported having already applied for advertised positions, so this was timely in terms of their interest, but perhaps slightly late in terms of the real job application process. Students perceived these workshops as being offered by other sections of the university so they escaped the overall negative evaluation effect of assessment introduction.

Changes made to the Post-practicum intervention because of semester one evaluation

According to design-based research principles, we considered student feedback and impact on their learning in the redesign of Post-placement week before implementing it in semester two.
The key changes made were that we:

- communicated the purpose of the new assessment tasks and post placement weeks to the students prior to placement, and throughout the placement in the lead up to Post-placement week
- removed the written examination components and introduced OSCE formats instead
- created separate evaluation items to individually assess the small-group and large-group components of the hospital experience reflection and debrief on the survey

- engaged only experienced clinical educators to facilitate the small group debriefs and arranged for a University counsellor to offer a drop-in session for students following the debrief
- asked the Dietitians Association of Australia speaker to introduce the importance of goal setting for CPD in their session
- trialled the delivery of the simulated careers component prior to placement rather than post-placement.

Semester two 2016 implementation of Post-practicum intervention: Post-placement 'week'

An improved version of the workshop was implemented in November-December of 2016 for the 15 students completing placement in Semester two. The new versions of the reflection and debriefing on the hospital experience and the CPD goal setting were implemented as intended. Improvements to the session content and communication around the purpose of these activities resulted in much higher mean satisfaction scores (see Table 1), and more positive qualitative comments being made by the semester two students: '*I enjoyed these sessions and found them very helpful. Particularly the DAA speaker and the small group debrief* "and '*The small group debrief was a good amount of students to reflect with*. Separating the assessment of the small and large-group activities revealed that the students found the small-group activity to be more useful and engaging.

Table 1: Mean (SD) scores for student satisfaction on a 5 point scale for semester 1 and semester 2 versions of post-placement week (number completing survey/total students participating)

Process evaluation criterion (mean (SD))	Usefulness of session		Interesting and engaging	
	S1 (26/31)	S2 (14/15)	S1 (26/31)	S2 (14/15)
Goal setting for career continuing professional development	2.4 (1.16)	3.27 (1.01)	2.79 (1.06)	3.45 (0.69)
Debrief about hospital placement (both activities)	2.5 (1.27)	NA	3.19 (1.39)	NA
Small group debrief about hospital placement	NA	3.18 (0.6)	NA	4.36 (0.5)
Whole group debrief about hospital placement	NA	2.82 (0.6)	NA	3.73 (1.47)
Simulated interview process as a whole	4.37 (0.50)	3.86 (0.36)	4.47 (0.61)	4.64 (0.50)
Simulated interview feedback from dietitian managers	4.6 (0.50)	3.71 (0.47)	NA	NA
Careers service feedback on CV	4.19 (0.75)	3.6 (0.52)	4.31 (0.79)	4.27 (0.64)

NA= not asked

The simulated job application activity was not part of this workshop and this Post-placement 'week' was actually conducted over three days. The simulated interview had already been implemented prior to placement for these students, so they only had a 'careers refresher' session. This was for resource, rather than pedagogic reasons, although the variation allowed us to evaluate alternative timing for this activity. The simulated interviews are resource intensive to organise and conduct, and it was not feasible to conduct the activity for only 15 students. Thus the semester two placement students attended the same simulated job application sessions as the semester one students in June. While they made positive comments about this activity: '*…discussing my CV … was very helpful. Feedback from interview was very helpful and insightful' and 'Very hopeful and confidence building'* scores were not as high as for the semester one students who completed the activity post-placement.

Implementation feasibility

The teaching team met regularly to revise the Post-Placement week program and materials. However, it was imperative to have a project officer to drive the changes given the teaching team was understaffed. While they were interested in the activities, they did not feel they had the capacity to introduce the new initiatives themselves.

Issues arising for discussion

- Contrary to some findings in the literature, these students were interested in hearing the practicum experiences of other students provided they could learn from the experience, which requires skilled facilitation
- High quality activities will only be perceived by students as useful if conducted at a relevant point in student development
- External agencies can help increase perceived relevance of activities for students
- It is important to obtain both quantitative and qualitative feedback on new activities, and to ensure that feedback is obtained on each individual component of an activity being evaluated
- Changing assessment processes can negatively impact student satisfaction and counteract any positive initiative we can introduce. Students need to see the relevance of assessment at this stage with sensitive delivery of the message.

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Appendix 1: Post-placement week program Semester 1 &2 with OLT activities shown in blue

PROFESSIONAL PLACEMENTS POST PLACEMENT WEEK: Monday 20 to Friday 24 June 2016

DAY 1: Mon 20th June

8.30 Welcome to Post Placement Week
9-4 Exams and Placement Portfolio Submission
4:30 Briefing for Days 2 and 3

DAY 2: Tues 21st June

7:55 CPHN and FSM project presentations and panels
3:15 Conclude and Sign Off

DAY 3: Wed 22nd June

8:00 ICM Panel
11:30 Post placement hospital experience reflection and debrief- small group
12:30 Post placement hospital experience sharing and discussion- large group
1:30 DAA Guest speaker (Sally Moloney, APD Program)
2:30 How to get that job! (Guest Speaker panels)
4:00 Learning Goals Presentation and Creation
4.30 DAY 3 Survey & Briefing for Day 4

DAY 4: Thurs 23rd– Careers part 1 Semester 1 and 2 students: Paul Fitzmaurice, Careers Service
8:30 Your Career Portfolio: identifying strengths, weaknesses, transferable skills
11:00 Resume Workshop: CV writing
2:00 Application and selection criteria
4:30 Day 4 Survey & Brief for Day 5

DAY 5: Friday 24th June. Post Placement Week – Careers day part 2

Students wear professional interview attire and bring: pen, paper, hard copy of CV and job application

7:30 Simulated Interviews
12.30 Focus Group Evaluation Sessions
2:15 Day 5 Survey
2.30 Farewell Afternoon Tea

PROFESSIONAL PLACEMENTS POST PLACEMENT WEEK Tuesday 29 Nov – Dec 1st 2016

Day 1: Tuesday 29th November: FSM and CPHN Assessment

Day 2: Wednesday 30th November

8-12 ICM Assessment. Congratulations on Completing Assessment.
1:00 DAA Guest speaker (APD Program) **visitor:** Dr Paul Wilkinson
2:00 Setting your CPD Goals
2:30 Hospital placement reflection and debrief - 2 groups of 7
3.30 Hospital placement whole group discussion
4:00 Survey, Day 3 briefing

Day 3: Thursday 1st December: How to get that job! Guest Speakers & Careers Day

9.00 Dietitians in different roles to present on their career paths
1.30 Careers CV Feedback AND/OR Counselling Catch up with Patrick (optional)
2.30 Careers Refresher
3.30 Day 3 Survey & Congratulations from Course Convenors

Bouncing Forward: A clinical debriefing workshop in professional identity, self-efficacy, and resilience in Master of Speech Pathology students

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Abstract

Intensive professional preparation programs, such as the 2-year Master of Speech Pathology program at Griffith University, require rapid development of knowledge, skills, and attributes. Students report high levels of stress associated with this accelerated learning trajectory which focuses on professional knowledge and clinical competencies. Although often not targeted, resilience, self-efficacy, and professional identity are central qualities for successfully managing tertiary education demands and those in the workplace. This project developed and piloted a post-practicum workshop to facilitate students' self-awareness of professional identity, self-efficacy, and resilience to enable students to actively identify targeted strategies to "handle the unexpected" using their recent practicum experiences as a reference point. Twenty-nine second-year speech pathology students completed three questionnaires (resilience, self-efficacy, professional identity) 1-week prior to their Semester 1, 12-week practicum and in the final week of this practicum in Week 13. The students participated in the 2-hour "Bouncing Forward" post-practicum workshop, which was specifically developed to address these three areas. Students strongly engaged in all activities, openly sharing conversations about less positive clinical experiences, their reactions, strategies used, and their effectiveness.

Over the semester, positive changes occurred in professional identity and self-efficacy from participation in the Master of Speech Pathology program. Having established that the questionnaires furnished useful information and that the workshop created a safe environment which stimulated active learning, the workshop's specific effect on building students' resilience, self-efficacy, and professional identity will be evaluated in 2017. Feedback suggests that this workshop might also be well positioned pre-practicum, as an inoculation, with post-practicum evaluation regarding the impact of the workshop. Furthermore, the workshop has generic transferability across health disciplines, and was successfully piloted with undergraduate nutrition and dietetic students.

Brief description of academic area and students involved

The Master of Speech Pathology program at Griffith University is a 2-year accredited professional preparation program which admits approximately 40 high-performing students per year (i.e., minimum GPA of 5.0) from any undergraduate background. Currently, the majority of students are female (> 95%). Gaining the competencies and capabilities required to be an entry-level speech pathologist must occur very quickly, and students report high stress levels associated with the intensive workload.

Particular purpose

There is a paucity of evidence underpinning the development of heath students' attributes related to professional identity, self-efficacy, resilience, which are central to student success in professional preparation programs. Professional identify is developed over the course of study and consists of a range of beliefs and attitudes about the chosen profession, its boundaries and interactions alongside other professionals.[1,2]. Self-efficacy refers to people's beliefs about their own capabilities to produce designated levels of performance that have influence over meaningful events in their lives.[3] Bandura (1994)[3] argues that a strong sense of efficacy enhances performance and a sense of well-being. Resilience can be defined as the ability to cope with life's uncertainties and challenges, and to be able to rebound quickly to a positive, productive state following a negative event.[4] Arguably, self-efficacy and resilience are the cornerstone of being able to handle higher education and workplace demands and well-being, more generally.[3,5]

Intensive professional preparation programs, such as the Master of Speech Pathology (MSpPath), require students to develop their professional identify, as well as knowledge, skills and attributes of the profession in a short time frame (2 years). Students in the Griffith University program have reported that their former identities are deconstructed then reconstructed, and have reported high levels of stress associated with this accelerated learning trajectory that has a focus on professional knowledge and clinical competencies. While attrition rates are not high, feedback from students has indicated that some of the attrition can be attributed to the intensive nature of the program and students' stress levels. Historically, attrition has been the greatest at the end of semesters 1 in Year 1 and 2. Therefore, the introduction of targeted post-practicum (and potentially pre-practicum) activities on professional identity, self-efficacy, and resilience may provide support to students in areas which are typically neither identified nor specifically targeted but are important to successful student outcomes. This in turn may aid student retention.

Although standardised tools have been developed and are implemented to evaluate student competencies in the MSpPath, no routine evaluation focuses on attributes and capabilities such as professional identity, self-efficacy, and resilience which are known to enhance student outcomes. A long-term goal is to understand changes in students' perceived levels of professional identity, self-efficacy and resilience across the entire program. As a first step towards this, the aim of this project was to develop and pilot a post-practicum workshop to facilitate knowledge and self-awareness of professional identity, self-efficacy, and resilience, and for students to build upon these by identifying strategies to "handle the unexpected" in the context of clinical placements. The next stage of this project is to investigate whether the workshop (1) has a positive effect on student managing challenging situations in the clinic or in their lives, more broadly (2) enables students to reflect on past negative clinical experiences and understand strategies that are helpful for the future and/or reframe these experiences in a different light.

Enacted post-practicum interventions

A 2-hour post-practicum workshop developed for clinical debriefing was implemented following students' practicum in Year 2, Semester 1, a placement in which students must reach entry-level across a range of competencies. This practicum, therefore, has the capacity to place additional stress on students. The workshop, "*Bouncing Forward*", employed a constructivist approach to create a collaborative and supported learning environment to facilitate reflections, awareness, learnings, and sharing about professional identity, self-efficacy, and resilience.

The workshop consisted of three modules: professional identity, self-efficacy, resilience. At the start of each module, an appropriate questionnaire was completed. The *Personal Resilience Questionnaire* was scored by students so that they gained a profile of

their performance across various resilience domains, to reflect upon and use as a reference point. Students were then invited to pair-and-share their insights and learnings, and then to share with the larger group, resulting in whole group discussion of trends, differences, and themes. Mini-lectures consisting of key definitions and strategies were then provided. Students were invited to pair-and-share any strategies that they use, then invited to share with the larger group.

Following the third module, a summative interactive small-group session (6-8 students) required groups to outline a clinical dilemma that one student had faced. Then the following prompt questions discussed:

- How did you react initially (feelings and behaviours)?
- What did you do to resolve this dilemma?
- Did it help? Why, why not?
- Can the team come up with some other helpful strategies?
- What could you do differently next time?

Groups shared their dilemma which was then followed by large group discussion. Finally, students were asked to write down 2-3 specific strategies that emerged from the workshop that they would take to their next (final) clinical placement to include in their Learning Contract.

Data gathered and analysed

Twenty-nine second-year speech pathology students (all female) participated in the workshop. The following data were collected

1. *Student and Professional Identity in Speech Pathology* (developed in another study in 2015). Six questions on student identity and the program of study (rated on a 0 – 10 scale) and 10 questions on the profession (rated on a 1 – 6 scale) were completed. 2015 data (end of O-week and end of Semester 1) were combined with data collected at the start of the workshop and analysed using one-way ANOVA.
2. *Professional Attributes.* During the workshop, each student produced 5 words which exemplified qualities and attributes of a practising speech pathologist. Counts of words were undertaken and themes clustered to produce a list of professional attributes.
3. *General Self-Efficacy Scale*.[6] Students rated themselves (on a 1 – 4 scale) on 18-questions 1-week prior to the practicum and at the workshop. Descriptive statistics compared pre- and post-means.
4. *Personal Resilience Questionnaire.* The 42-item *Personal Resilience Questionnaire* was completed 1-week prior to the Semester 1 practicum. Means for each of the 7 domains were calculated. Students also completed this questionnaire during the workshop and self-scored it for their own reference point for the workshop activities.

Key findings

A post practicum workshop targeting professional identity, self- efficacy, and resilience appears to be a useful additional to the MSpPath curriculum.

Professional Identity

- Student identity: Significant increases in feeling like a speech pathology student (F=4.261, p=0.000) and having strong ties with other students (F=2.847, p=0.008) occurred compared to historical data. Data also demonstrated a decrease in connectedness to former student/professional identify. This occurred rapidly; by the end of Semester 1, Year 1
- Professional identity: Students were very proud to be members of the speech pathology profession. For 5 out of 10 questions (i.e., *I feel like I am a member of the speech pathology*

profession; I feel I have strong ties with the speech pathology profession; *I can identify positively with the speech pathology profession; Being a speech pathologist is important to me; I feel I share characteristics with people in the speech pathology profession*), professional identity increased compared to historical data, from earlier in the students program of study. It is thus hypothesised that knowledge and experience gained from studying in the MSpPath translated to a generalised positive increase in professional connectedness

Professional attributes

The top five group of words (based on frequency $\geq$ 15) which exemplify a practising speech pathologist's professional attributes were 1) empathetic, sympathetic, compassionate, genuine (n=18); 2) professional, confident, competent, capable, hardworking (n=17); 3) knowledgeable, intelligent (n=16); 4) good communicator, good listener, friendly, personable, approachable (n=15); 5) patient, caring, warm (n=15). This group of words exemplify many of the principles detailed in the Speech Pathology Australia's Code of Ethics.

Self-Efficacy

Overall, students presented with moderate-to-high levels of self-efficacy across many areas pre-workshop. Self-efficacy increased slightly post workshop in 11 out of 13 areas. Of the 13 positively-framed questions, questions 16 (*Some aspects of the program are easier than expected*) and 17 (*I generally find the clinical demands to be more stressful than the academic demands*) were the lowest across both time points. Additionally, of the negatively-framed questions, question 7 (*Coping with the academic demands of this program is difficult*) reinforces the responses from question 17. These findings suggest that the program is challenging, and that academic demands invoked higher stress than clinical demands. The highest means occurred in questions 1(*I can always manage to solve difficult academic and/or clinical problems if I try hard enough*), 11 (*I can solve most academic problems if I invest the necessary effort)*, and 15 (*If I am in clinical or academic trouble, I can usually think of something to do*). This demonstrates that the students have reported high-levels of coping, taking responsibility for their learning, and appreciate the value of effort indicates that the development of students' capabilities in these areas is relatively on track.

Resilience

Six domain scores were calculated from the Personal Resilience Questionnaire data. The majority of students agreed that they had a moderate *sense of purpose* (mean=4.05 from a maximum of 5). This finding aligns with the professional identity data. For the other domains (*connected with others*=3.84; *determination*=3.82; *looking after yourself*=3.64; *taking control*=3.61; *positive mental attitude*=3.35) on average students presented a neutral orientation which trended towards positive. These findings suggest that further resilience data should be collected to gain insight into these results. However, this data justifies the need for a workshop with resilience as a focus, and highlights areas to target.

It must be noted that the workshop mode was effective in its constructivist approach, with guided facilitation, offering reflection and safe environment. This mode was aligned with the current MSpPath curriculum, which adheres to a relatively purist PBL pedagogy, and therefore is underpinned by collaborative, shared learning and authorship. Students strongly engaged and shared in all activities. During informal verbal feedback elicited at the completion of the workshop, in response to the question, "How useful was this workshop?" there was a consensus that the workshop was very useful, and that it would have been good to have this at the start of the semester, before this critical entry-level placement. This workshop has since been piloted in Week 13 in Bachelor of Nutrition and Dietetic, as a pre-placement activity.

Issues arising for discussion

When is the most appropriate time to introduce a workshop on professional identity, self-efficacy and resilience in relation to the timing of clinical placements?

1. How can positive mental attitude and looking after yourself be further facilitated during post graduate study?
2. What are the most appropriate methods to evaluate the effect of the clinical debriefing workshop in professional identity, self-efficacy, and resilience?

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Integrating an Employability Intervention into Clinical Practicum Debrief Sessions

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Abstract

Career development learning is proposed to "inform, guide and assist students to critically appraise not only the world of work, but also the specific occupation they have selected.... and may be deployed to raise students' awareness of employability and how to self-manage their studies and extra-curricular activities to optimise their employability."[1] This report details the outcomes of integrating an employability intervention into the post-practicum debrief sessions of a postgraduate Exercise Physiology program through the development of employability skills in the context of work-integrated learning (clinical practicum). Employability strategies utilised included: participation in employment skills and career development seminars; case-conferencing and panel discussions with practising Exercise Physiologists; and delivery of learning modules on key practice-based areas. Twenty participants (9 male, 11 female), with a mean age of 25.3 ± 4.0 years, participated in the study. All were full-time domestic students enrolled in the Graduate Diploma of Exercise Science at Griffith University. The outcomes of the intervention are presented which include participants' perceptions of the intervention on their perceived employability, the perceived effectiveness of the strategies included in the intervention, and participants' engagement in extra-curricular employability activities while enrolled in university study. This study demonstrated that an employability intervention integrated into post-practicum debrief sessions improved indices of work readiness and provided valuable learning outcomes including improved decision making (mean change 0.25 ± 0.46; p= .042), transition awareness (mean change 0.63 ± 0.67; p= .001) and self-awareness (mean change 0.42 ± 0.66; p= .016). Ranking of the intervention activities from 1 = very ineffective to 5 = very effective indicated an overall ranking of the employability intervention at 4.5 ± 0.5. Fifteen (94%) participants indicated they participated in extra-curricular employability activities while enrolled in university study.

Brief Description of Academic Area

Participants were students enrolled in a clinical practicum subject in the Graduate Diploma of Exercise Science, an 80 credit-point postgraduate degree (in Exercise Physiology) at Griffith University. Students enrolled in this degree need to have completed, at a minimum, an undergraduate degree in Exercise Science or equivalent. While enrolled in the clinical practicum subject, students completed: two 6-week practicum placements tailored towards gaining competency in key areas of practice; and five 3-hour debrief sessions, each separated by a 6-week period.

Particular Purpose

The importance of integrating employability-related activities into a curriculum is highlighted by studies indicating that economic motivation is more important than the pursuit of knowledge for students undertaking higher degree learning.[2] Consequently, it can be hypothesised that the inclusion of activities relating to employability will promote higher student engagement in learning and increased student satisfaction. Furthermore, it is proposed that there has been a shift in

industry expectations relating to university graduates, from academic excellence to the demonstration of workplace-specific skills.[3] As a result of these factors, activities directed towards employment are increasingly expected of higher education degrees.

Previous studies evaluating the integration of an employability intervention for undergraduate Exercise Science students demonstrated the following perceived benefits: improved ability to synthesise their key strengths; a demonstrated understanding of their goals and motivations as they apply to job searching; improved understanding of the requirements of graduate recruiters; improved self-awareness of different employment opportunities; and a demonstrated understanding of effective job search strategies.[4] Despite the perceived importance and benefits of these interventions for the students, this type of intervention has not been evaluated in postgraduate students enrolled in a profession-specific program in Exercise Physiology. This study sought to address this knowledge gap.

The employability intervention evaluated in this study was designed with the following desired outcomes: Enhanced integration of theoretical and practical coursework in clinical practicum;

- Facilitation of stronger engagement in practicum activities and extra-curricular activities for career development;
- Development of a database of extra-curricular learning opportunities for career development in order to target student learning towards their intended career path;
- Improved student outcomes and satisfaction; and
- Identifying generic employability skills and providing a framework for the tailoring of their content to different streams to improve employability outcomes across the School of Allied Health Sciences and beyond.

Specifically the primary aim of this study was to evaluate the efficacy and perceived importance of an employability intervention integrated into practicum debrief sessions. Secondary aims include identifying opportunities for improvement of the included intervention activities.

Enacted post-practicum interventions

The employability intervention undertaken was evidence-based and was constructed on the key research findings of Reddan (2012) in which gaining experience in being interviewed; developing job application writing skills; gaining insight into professional work; the enhancement of research and/or practical skills; and improved development of a career path were the employability skills ranked as having the highest perceived importance. [4] Additionally, a recent survey of students from the health discipline regarding their preferences for employability activities indicated that 43.6% of students would prefer access to employability interventions after every practicum experience with the activities included relating to: feedback regarding workplace experiences (46.2%), identification on how the experiences result in the student being more employable (44.6%), promoting informed decision making regarding career, work options or specialisations (44.6%) and learning more about their preferred occupation (44.6%).[5]

The employability intervention was conducted during 5 x 3 hour modules separated by a 6 week period. The modules included in the employability intervention were as follows:

- Module 1: Pre-practicum briefing session including information regarding the successful completion of practicum and accreditation as an Clinical Exercise Physiologist; clinical reasoning and reflective writing skills and an introductory module relating to the resources available to maximise securing graduate employment. Introduction of these activities prior to practicum will allow participants to: a) map their current skills and

experiences and identify curricular and extra-curricular opportunities/ required areas for further career/ skill development; b) continue to develop their resumes while engaging in practicum activities; and c) identify key practice areas of interest and tailor their documentation and extra-curricular learning towards this area.

- Module 2: Clinical Practice Presentations including modules relating to key areas of clinical practice including insurance and duty of care requirements, business models and marketing, and superannuation. The purpose of this module is to encourage participants to think beyond graduation to their first year as a practicing clinician.
- Module 3: Employment Essentials Workshop including information relating to resume writing, answering selection criteria, participating in interviews, undertaking professional networking and developing an e-Portfolio.
- Module 4: Establishing communities of practice through the presentation of case studies of interest in order to improve the high-order learning outcomes of the participants by facilitating problem-based learning. Additionally, sharing the case studies provides participants with a community of support regarding their developing clinical practice.
- Module 5: Professional panel of practicing exercise physiologists in order to discuss their career paths including professional development undertaken and lessons learnt, their process for selecting employees, criteria for excellent practitioners, common mistakes made in job applications, their perceptions of the future of clinical practice, advice for first year practitioners etc. The purpose of this module was to provide professional context for the participants' academic and practical skills.

Participants were also provided with a series of online videos depicting interviews conducted with practicum supervisors discussing the expectations for students undertaking clinical practicum and also the requirements to transition to an entry level practitioner. It was proposed that these interviews will allow students to identify skills achievable through curricular and extra-curricular means and hence begin to contemplate participating in extra-curricular activities tailored towards their chosen field.

Data gathered and analysed

The efficacy of the employability intervention was evaluated from the participants' perspective using a variety of outcome measures:

- Measure of Guidance Impact Scale [6] with subscales including self-awareness, opportunity awareness, improved decision making, and transitional learning;
- Work Readiness Scale [7] with subscales including commencement readiness, collaboration, informed decision making, life-long learning, professional practice and standards, and integrating theory and practice;
- A custom-designed survey consisting of ten Likert-scale questions on the perceived intervention efficacy and four open-ended questions on the effectiveness of post practicum debriefs to assist in career development, the most beneficial activities, perceptions of how the activities improved their employability and suggested workshops ideas for improved employability; and
- A custom-designed survey using open-ended questions designed to evaluate the participants' engagement in self-initiated extra-curricular employability activities.

All outcome measures were administrated prior to and immediately after participating in the employability intervention except those relating to the participants' perception of the employability intervention and participation in extra-curricular employability activities.

Analyses were conducted on an intention-to-treat basis, with missing follow-up data (for 2 participants) inputted using the last observation carried forward method. Wilcoxon signed-ranked tests were used to evaluate the differences pre- and post- intervention. An α level of .05 was set. Descriptive content analysis was used to determine key themes from open-ended questions.

Key Findings

Participant Characteristics:

Twenty (9 male, 11 female); age 25.3 ± 4.0 years; full-time domestic students enrolled in the Graduate Diploma of Exercise Science at Griffith University participated in the study. 75% of participants (n=15) enrolled in this program of study immediately following their undergraduate Exercise Science degree. Prior to participating in the intervention, 10 (50%) participants had engaged in career development services, with 70% of this engagement being a mandatory component of their undergraduate degree. Prior to enrolling in the Graduate Diploma of Exercise Science, 10 (50%) participants had undertaken paid work experience in the field of Health, Fitness and Exercise Science or Exercise Physiology, with 90% of this work being in the field of personal training and group fitness.

Employability Outcomes:

The overall score of the Work Readiness Scale increased significantly from baseline to post-intervention (mean change = 0.58 ± 0.54; p= .001), with significant improvements in all subscales: commencement readiness (0.69 ± 0.69; p= .001), collaboration (0.43 ± 0.53; p= .002), informed decision making (0.74 ± 0.81; p= .002), life-long learning (0.58 ± 0.48; p= .001), professional practice and standards (0.56 ± 0.57; p= .001), and integrating theory and practice (mean change= 0.58 ± 0.95; p= .020). These results indicate that the participants reported greater work readiness following the completion of the employability intervention.

The overall score of the Measure of Guidance Impact Scale increased significantly from baseline to post-intervention (mean change = 0.25 ± 0.48; p= .044), with significant improvements in subscales including decision making (mean change 0.25 ± 0.46; p= .042), transition awareness (mean change 0.63 ± 0.67; p= .001) and self-awareness (mean change 0.42 ± 0.66; p= .016) and non-significant improvements in opportunity awareness (mean change 0.13 ± 0.85; p= .657). The results of this measure indicated that the employability intervention was effective in providing valuable outcomes relating to career guidance.

Perceptions of the Interventions Importance and Efficacy:

The average rating for the effectiveness of the intervention was 4.5 ± 0.5 from a maximum of 5 (very effective), with all participants rating the intervention as either very effective or effective. Themes on the perceived importance of the employability intervention centred on:

- Value: *"I believe all of the presentations were valuable, and we were provided with a variety of information that will be beneficial for us as developing practitioners."*
- Confidence: *"I feel confident about getting a job after graduation and now have the resources to achieve this and make a solid plan."*
- Preparation: *"Effective in preparation for the "real world."*

Participants were asked to rank all intervention strategies relating to the perception that the included strategy "improved my employability" on a scale of 1 (strongly disagree) to 5 (strongly agree). All strategies included in the intervention received a mean rating of 4 or more out of a possible 5. Comments relating to the specific intervention activities included:

- Panel Discussion: *"Sharing perceptions through the panel discussion and case study presentations helped me as a student to bring me down to earth and reduce some of the anxiety when going on placement for the first time. I was able to become aware of the things that I would be expecting and it allowed me to settle in well."*

- Workshop- Employment Essentials: *"Overall, the employability program was helpful and everyone probably got different things out of different aspects of it... I do feel more prepared to enter the world of being employed as an AEP though as a result of this program!"*
- Panel Discussion: *"It was really great to hear first-hand from potential employers what they look for in candidates and how they all have slightly different business models, they essentially all want the best for the clients and how important relationships are."*
- Workshop- Legal Requirements of Professional Practice: *"It is easy to grasp and research exercise guidelines and the latter, however I found it very beneficial understanding the behind the scenes legality of what also comes with our profession."*
- Workshop- Introduction to Employability: *"Employment essentials was a good professional development presentation that provided information regarding the formalities and necessities when applying for jobs. After looking at my resume straight after this presentation I noticed my resume was rife with problems."*

Suggestions from participants relating to activities that would be perceived as being beneficial for improving employability included: information regarding commercialisation of business ideas; more detailed information regarding the requirements for starting a new business; more panel discussions with practicing exercise physiologists; role plays to increase motivation in clients; and transition career plans while waiting for accreditation.

Engagement in Employment Services:

Fifteen (94%) participants indicated having participated in activities geared towards improving their employability that were not a core component of the learning activities included in the Graduate Diploma of Exercise Science. Fourteen (88%) participants reported that they participated in two or more extra-curricular activities, with networking (n=11; 55%), additional work experience (n=10; 50%), and engagement in educational seminars (n=8; 40%) the most frequently reported activities.

Issues Arising For Discussion

- Employability interventions can be integrated into existing curriculum utilising existing relationships in the university environment.
- Employability interventions are best integrated in the context of work-integrated learning to allow participants to apply the principles discussed to practice.
- Participants' perception of the importance and value of employability interventions are high, with activities such as practitioner panels, clinical reasoning and employment seeking workshops reported as improving employability-related skills.
- Possible future intervention activities including modules relating to: effective team building; effective communication and navigating work place structure; and developing career plans for early career practitioners (including identifying professional development opportunities) could improve the efficacy of the employability intervention delivered.
- Extracurricular activities undertaken by participants indicate that structured opportunities for networking, professional development and additional work experience may be perceived to be beneficial.

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Consolidating Interprofessional Collaborative Practice Understanding through Critical Observation during Clinical Placement

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Abstract

Interprofessional education (IPE) occurs when health professional students learn 'with, from and about each other to improve collaboration and the quality of care' (CAIPE, 2002). It aims to ensure that health professional graduates have the capabilities required for collaborative interprofessional practice (IPP), which is essential for the effective care of the complex health problems that face individuals and communities into the future.

Griffith University's programmatic approach to IPE (Teodorczuk et al., 2016) aims to assist health professional students to acquire collaborative practice capabilities through a planned sequence of activities across their learning program, utilising a three-phase pedagogy. This begins with the development of health professions literacy (an understanding of the history, philosophy and practice of each of the major health professions, including their own) before undertaking and reflecting upon carefully-crafted simulated interprofessional practice experiences. The third phase (the focus of this report) involves experiential learning in real patient or client care settings. Ideally, this would be achieved through working in an interprofessional student service team, according to the IPE model developed at the University of Linköping (Wilhelmsson et al., 2009), but this approach has been challenging to implement at scale.

We report on the implementation of a simple, individually-completed, assessment task that places senior health professional students in a critical posture in relation to an interprofessional practitioner team into which they have been placed as part of their conventional clinical placements. Candidates in medicine (149), pharmacy (61) and exercise physiology (21) were asked to recall such a team that they had the opportunity to observe closely, then provide examples of effective and less effective IPP, as well as offer suggestions on how the team might improve its IPP in the future. The text of candidates' reports was analysed using a phenomenologically-oriented thematic qualitative approach. Some learners were also interviewed subsequently to gain further insights into the learning impact of the assessment activity.

The writings of students in all three professions demonstrated rich evidence of the achievement of interprofessional learning (IPL) outcomes during their health professional programs,

as well as a consolidating effect of the critical assessment exercise on their ability to apply these learnings in their evaluation of real clinical care team experiences. Analysis of the interview transcripts provided further support to these findings.

Brief description of academic area and students involved

This activity focused on placements into interprofessional practitioner teams undertaken by students in three health professions (medicine [149], exercise physiology [21] and pharmacy [61]) as part of conventional clinical placements in the senior years of their programs.

Particular purpose

Effective collaboration between practitioners in different health professions is an essential component of contemporary health and social care and health promotion. It enables the increasingly complex health issues of current times to be addressed effectively and with optimal safety for patients and clients. The IPE and IPP movement in health care began more than thirty years ago but its impact has been accelerated by reports into health care misadventure in multiple countries that detailed adverse outcomes and findings associated with poor interprofessional communication and collaborative practice. An emerging literature on the positive impacts of effective IPP also underlines the importance of effective IPE (Reeves, 2010). In 2010, the World Health Organization published a global *Framework for Action on Interprofessional Education & Collaborative Practice* and the *Sydney Interprofessional Declaration*, formulated at the fifth world All Together Better Health Conference in the same year, asserted a universal entitlement to 'fully integrated, interprofessional collaborative health and human services' (Article 1). The *Declaration* went on in Article 3 to place a responsibility on the providers of health worker education and training to provide 'significant core elements' of interprofessional education that 'include practical experiences' and are 'formally assessed' (All Together Better Health V International Conference participants 2010, p. 1).

Griffith University has developed a programmatic approach to IPE (Teodorczuk et al., 2016) that aims to assist health professional students to acquire collaborative practice capabilities through a planned and scaffolded sequence of activities across their learning programs. They first need to develop health professions literacy (an understanding of the history, philosophy and practice of each of the major health professions including their own) through 'Phase I' activities. Ideally, this would be undertaken through interactive workshops involving students from multiple professions but logistic and budgetary constraints may preclude this. In our experience, this learning can be achieved through individually-completed, online activities, provided that they are engaging and require student reflection.

The major learning under a programmatic approach is undertaken around the middle of students' learning programs through simulated IPP experiences within 'Phase II' activities, undertaken with students from multiple health professions, which have been carefully designed to achieve the desired learning outcomes and include reflection following participation. Activities in this phase need to meet the CAIPE (2002) definition of IPE, ensuring that students learn 'with, from and about' each other.

The final 'Phase III' involves learning from IPP experiences in real patient or client care settings. Ideally, Phase III would be achieved through work in an interprofessional student service team according to the model developed at the University of Linköping (Wilhelmsson et al., 2009), but this approach has been demonstrated to be difficult to implement and sustain at scale.

The activity that is the subject of this report sought to consolidate and apply the outcomes from students' experience of an IPE program, through an individually-completed critical assessment task related to activities observed during clinical placements that already formed part of their

degree programs. If effective, this would represent a much more logistically feasible and sustainable approach to Phase III of an IPE program.

Enacted post-practicum interventions

We report on the implementation of a simple, individually-completed, written assessment task that placed senior health professional students in a critical posture in relation to an interprofessional practitioner team into which they have been placed as part of their conventional clinical placements. Candidates in medicine, pharmacy and exercise physiology were asked to recall such a team that they had the opportunity to observe closely whilst on placement, then provide examples of effective collaborative IPP between team members, as well as the reasons for this evaluation. They were also asked to identify and critique examples of less effective collaborations, before offering suggestions about how the team might improve its IPP into the future.

The rationale for this approach was that IPP capabilities are critical for effective professional practice in the health professions. The *Griffith University Implementation Framework for Interprofessional Learning* specifies ten threshold learning outcomes to be achieved by all health professional graduates and the three-phase pedagogy that facilitates this learning. The first two phases (acquisition of 'health professions literacy' and participation in simulated IPE activities) are already well developed for many health professional programs but implementation of Phase III (real patient or client care IPE activities) and the assessment of higher order learning in this area have proven more difficult to implement. Students in some professions (medicine in particular) undertake multiple, continuous practical placements in a wide variety of clinical settings. Consequently, large and small group activities are extremely difficult to organise across the whole cohort. This assessment approach is feasible and is partially self-evaluative. It is intended to both bring about the consolidation of the IPL described above, through placing the student in a critical posture, and also to allow assessment of the learning engendered.

Data gathered and analysed

The assessment pieces were marked (with written feedback) in the second half of 2016. In addition, group interviews with medical student volunteers who had participated in the activity were conducted after marks and feedback had been provided to the students. Summative assessment was undertaken according to the following marking schema:

- 25% - Description of examples of effective collaborative practice within the team;
- 25% - Description of examples of less effective collaborative practice within the team;
- 25% - Suggestions of measures to improve the interprofessional function of the team; and
- 25% - Degree to which the writing demonstrated understanding of the critical components of collaborative IPP.

We utilised a phenomenologically-oriented thematic qualitative methodology to look for evidence of IPL in the student writings. Additionally, we conducted post-activity interviews with a small sample of the medical students and the transcripts were also subjected to qualitative analysis. Examples of the prompt questions used by phenomenologically-trained interviewers included:

- What was it like to put yourself into a critical posture to critique the functioning of a team into which you had been placed?
- How did you draw on your IPL understanding and how effectively were you able to undertake your critical evaluation of the team in which you were placed?
- How did this assessment activity impact on your understanding of interprofessional collaboration?

- How do you think this activity will impact on your future practice?

Key findings

All but four of the 231 students (98%) demonstrated sufficient evidence that they had achieved the required IPL outcomes during their programs to achieve a passing grade or better in the assessment item according to the schema set out above. Analysis of the content of the student writings demonstrated that many learners had acquired a rich and nuanced understanding of the elements of effective IPP, particularly in relation to role understanding, interprofessional communication, respectful interaction, patient- and client-centredness and leadership, as well as the management of power and confidence imbalances within teams.

The IPP processes least cited by the students in their writings included team trust, shared decision-making, and continued self-reflection. This could indicate relative gaps in their understanding of IPP that might inform future curriculum development.

Analysis of the interview transcripts was broadly consistent with the findings from the student writings and, although some medical students still expressed doubts about the high relative importance afforded to IPL across their programs, the phenomenologically-oriented technique employed revealed that they had nonetheless acquired learnings, especially in the affective domain, that should equip them well for IPP after graduation. Both data sources also identified a consolidating effect of the critical assessment activity as a 'capstone' to the programmatic approach to IPE.

By placing students in a critical-observer posture during conventional clinical placements in health care teams, students were able to achieve consolidation of IPL outcomes in real health care settings, without the logistical challenges inherent in implementing interprofessional service learning (per the Linköping Model) for large numbers of learners. Fundamentally, this is an easily-implemented, individually-completed, critical assessment activity that appears to consolidate learning effectively in the context of a programmatic approach to IPE. This approach also enables educators to identify gaps in IPL across and within disciplines in order to facilitate further curriculum development.

Issues arising for discussion

- This activity is part of a programmatic approach to the achievement of IPL outcomes across a health program, comprising a sequence of preparative learning, simulation-based guided practice experiences supported by personal reflection and finally the application of learnings in real clinical settings. The approach is resource intensive and the necessity for all elements might be questioned.
- Is this activity a suitable substitute for an interprofessional student service team experience (as per the Linköping model)?
- The particular activity relies on a premise that all health professional students will have the opportunity to participate in, or at least observe, interprofessional practitioner teams during their routine clinical placements. Is this a fair assumption?
- The *Sydney Interprofessional Declaration* asserts that interprofessional education should be a compulsory component of the education of health professionals that is formally assessed. Is this achievable and how would messaging to students be affected by an IPL approach that was elective or not assessed?
- Even though it was evident that our IPE program had been effective, some medical students still questioned the relative importance of these capabilities to their future practice. How might we better encourage their engagement, or should we just wait for 'practice to be the teacher'?

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Exploring the use of Online Readings and Reflective Discussion Activities (ORARDA) to enhance clinical learning

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Abstract

Introduction: The Online Readings and Reflective Discussion Activities program, ORARDA, is a component of a Patient Safety and Readiness for Practice Unit at Monash University. It was first implemented in 2006 to better prepare final year medical students for work. The program runs concurrently with the students' final year clinical placements and is designed to complement students' ward-based experiences.

Aim: This project is an evaluation of the ORARDA program. The aim is to determine student perceptions of the value of the activity, describe the nature of the students' written work, and consider how the activity can be improved.

Methods: Quantitative and free text responses were collected via an online evaluation survey at the end of the academic year. Five hundred students were invited to participate in the survey and permission was sought to use their written posts for the project. The quantitative data has been analysed using descriptive statistics and the qualitative data will be analysed using thematic analysis.

Results: The survey response rate was 30% (151 surveys completed) and 73 students gave permission for their posts to be analysed. At the time of preparing this report, detailed data analysis is ongoing. Preliminary data analysis indicates: Students are divided about the utility of the ORARDA activity, with 40% expressing positive views and 29% of students expressing negative views about its utility. The majority of students agreed that the readings were interesting, the topics were relevant, the activity helped them make sense of some of their experiences and observations on the ward, the activity increased their knowledge of Patient Safety, would make them a better doctor, and helped to shape some of their attitudes to patient care. Forty-four percent of students supported the continuation of this activity, with 34% neutral, and 22% stating it should not continue. Thirty-five percent of students agreed ORADA learnings translated to ward practice. Of the various elements of the ORARDA, the students collectively rated the readings as the most influential component in helping to shape their attitudes to patient care.

Conclusion:

Student perceptions of the value of ORADA were mixed, with almost one third of students not valuing the activity. This is on a background of entrenched negative attitudes toward online learning and a high burden of online activities across the medical course. However, there are many encouraging findings, particularly in relation to the activity as a mechanism to help shape attitudes to patient care, influence practice, and also a way to enforce broad reading of valuable non-clinical material. Moreover, this evaluation has provided insight into strategies to improve engagement in the activity.

Brief description of academic area

Five hundred final year medical students from Monash University undertake the Unit in which the ORARDA sits. The Unit is on Patient Safety and Readiness for Practice (Marshall, Harrison, & Flanagan, 2008). There are three components to the Unit: immersive clinical simulation scenarios, face-to-face seminars, and ORARDA, the online component. This Unit runs in parallel with six consecutive blocks of six-week clinical placements. The large cohort is widely dispersed throughout metropolitan Melbourne, rural Victoria, and Malaysia.

Particular purpose

Medical students report feeling underprepared for clinical practice (Australian Health Minsiter's Advisory Council, Wilson, & Feyer, 2015), and a sense of being overwhelmed by the steep transition from the university to the workplace. A better understanding of some of the complexities inherent in the workplace may help ease the transition to work. Such complexities include areas that are not traditionally taught at the undergraduate level. For example: managing transitions of patient care, working with uncertainty, handling mistakes, system design, doing the right thing for the right patient, the ethics of novice clinicians learning on patients, and workplace culture. These, and many other non-technical themes are manifest every day in practice. This educational activity is designed to put a spotlight on these topics and deconstruct many of the complexities, with the aim of improving students' situation awareness (Endsley, 1995) in the workplace. This hopefully translates to new graduates being better equipped to identify hazards for patients, anticipate, adapt and generally work more efficiently and safely. Helping students develop better situation awareness in the workplace is the primary motivation for ORARDA, however, there are many side goals that helped to shape the program. These are listed below.

The ORARDA activity was developed to meet the following goals:

- Introduce students to important 'non-technical' aspects of practice that are highly relevant for practice as junior doctors
- Encourage deep learning
- Integrate learning with clinical placements
- Encourage reflective practice within and beyond the activity
- Encourage students to observe the workplace with a critical eye. That is, to encourage consideration of multiple perspectives and to challenge established practices if there is evidence to suggest these practices may be improved.
- Stimulate critical thinking by comparing literature on key topics to their own experiences in the workplace.
- Encourage students to apply knowledge in practice
- Encourage knowledge, attitudes and behaviours that promote Patient Safety
- Reach a dispersed cohort of 500 students at low cost

Enacted post-practicum interventions

The ORARDA program consists of 7 topics. Each topic has 1-3 associated readings. Students are asked to think about the reading in relation to their observations and experiences on clinical placements. They also need to consider their role as students and junior doctors in relation to the topics and how they can contribute to safe patient care. A summary of their reflections are posted on a moderated discussion board on the online learning platform 'Moodle'. They are required to read and comment on a fellow students' posts. Topics include: handover, diagnostic error, correct

patient identification, the learning curve, workplace culture, hazard points for patients, when and why things go wrong.

ORARDA has been designed to complement students' learning and experiences on the wards during clinical placement. The unit requires them to reflect on their clinical experiences (reflection-on-action (Schon, 1983)) and provides insight and ideas for things to focus on and try out when back on the wards (reflection-for-action (Schon, 1987)).

Although online learning is often not popular with many students, it has a number of attributes that make it ideal for some of the content to be covered in this unit and the logistics of the cohort. In terms of logistics, online is ideal for the large number of students, 500, who are geographically dispersed and moving location every 6 weeks. Providing uniform small group face-to face sessions on these topics for this number would be a costly logistical nightmare to implement. The learning from peers and engagement may be better with a small group face-to-face session, however, having to read and reflect alone, prior to posting, ensures that all students do more of the reading and the reflecting.

The idea for ORARDA originally grew from trying to devise a way to get students to read. It seems most students only read prescribed material if they have to, so the reading needed to be linked with some kind of output. The questions that relate to the reading encourage active reflection on the written material. Using the questions to link the reading with clinical placement experiences adds relevance to the readings and helps the students make links to the clinical environment. The topics are sufficiently generic that they are relevant to all clinical placements. Finally, most topics have a final question about what the students' role is in relation to the topic and/or what can be done in practice to perform well in relation to the issue. This hopefully personalises the issue and may potentially influence practice. An example of one topic and its related questions is included below:

> ***Correct Patient Identification.***
>
> ***Reading****: Chassin et al. (2002) The Wrong Patient. Annals of Internal Medicine,136:826 – 833 (Chassin & Becher, 2002).*
>
> ***Activity 1***
>
> *In relation to the story in the article, think through all the missed opportunities that could have protected the patient from having the wrong procedure.*
>
> ***Activity 2***
>
> *In your current (or recent) clinical environment:*
>
> - *How likely is patient misidentification of the scale described in the reading?*
> - *What defences help protect the patient from this? To use the "Swiss cheese" analogy – what are the slices of cheese?*
> - *What are the potential holes in these defences?*
>
> ***Activity 3***
>
> *What is your role now and as a junior doctor in strengthening these defences? How can you help make sure things happen to the right patient and not to the wrong patient?*
>
> *Post a summary of your thoughts and ideas from Activity 2 and 3 on the discussion group.*
>
> *Aim to keep your posts brief (i.e. no more than two paragraphs)*
>
> *Comment on another student's post. (no more than one paragraph)*

Most of the learning is in the reading, reflecting and writing with this activity. Individual student feedback from an academic on the written work is only likely to add a little at best. However, no-one likes to submit work that doesn't get read. Posting onto a discussion board means that fellow students may read their post. It is presumed that this would help motivate students to put more effort into their work, and avoids the feeling of submitting to a void. Most posts are well written, insightful and interesting. Many have illuminating anecdotes and novel ideas. Having students comment on a fellow student's post ensures that the insights are shared amongst the students to some degree.

Each discussion group has 30 – 45 students. One moderator oversees the entire activity. (6 x 500, 200-1000 word posts). Students don't receive individual feedback on their post, however, the moderator has some presence on the discussion board; adding emphasis, asking questions, correcting misinformation and summarising. See Table 1 below for a Summary of the ORARDA program.

Table 1- *Program Overview*

Topics	Teaching and Learning Approach	Student Activity	Moderator Activity
• Correct Patient Identification • Learning Curves • Handover • When Things go Wrong • Workplace Culture • Equipment and Human Factors • Diagnostic Error	Readings and/or video including • case studies • expert commentary • scientific papers • autobiographical text • workplace documentation	• Read or view prescribed material with particular questions in mind. • Post a summary of thoughts / answers or an angle that hasn't yet been covered. • Read and comment on a fellow student's post	• Have some presence, although no need to respond to every students' post • Allow students to respond to controversy or fill in gaps before responding • Ask questions • Add emphasis • Correct misinformation • Explain relevance • Summarise

Data gathered and analysed

The following data has been collected:

1. Online survey (Likert and free text responses)
2. Student posts
3. Informal interview

A survey response of 30% was achieved, with 151 surveys completed. 73 students gave permission for their posts to be analysed.

Analysis methods will include descriptive statistics of quantitative data and thematic analysis (Miles, Huberman, & Saldana, 2014) of qualitative data.

Key findings

At the time of preparing this report, detailed data analysis is ongoing. However, some early findings from preliminary analysis can be shared.

Many students had a pre-existing negative view of online learning, with 37% of students reporting that they generally don't value online learning and 41% reporting that they don't enjoy online learning. Only 27% of students approached the activity being evaluated with a degree of enthusiasm. Only 27% of survey respondents stated that they enjoyed the ORARDA and 40% found it worthwhile. Forty-five percent did not enjoy it and 29% thought it was not worthwhile The remaining students were neutral. Despite this, the majority of students agreed or strongly agreed the readings were interesting (61%), the topics were relevant (75%), the activity helped them make sense of some of their experiences and observations on the ward (52%), the activity increased their knowledge of Patient Safety (58%), and would make them a better doctor (50%). Twice as many students thought the activity should continue rather than be discontinued (44% vs. 22%).

Thirty-five percent of students agreed they had put some of what they learned from ORARDA into practice on the wards. Common themes included a greater aware of hazards for patients, more capacity to avoid and understand errors, and increased thoroughness in patient assessment, procedures, protocols, and use of equipment. Twenty-nine percent of students reported not applying their learning from ORARDA into practice. A frequently stated reason for this was students completing the activity in the last couple of weeks of the year, so there was limited or no opportunity to do so.

Fifty-three percent of students agreed the ORARDA program helped to shape some of their attitudes to patient care. Common themes included a greater need to be careful and a more patient centred approach. Several students commented on their attitudes being reinforced by greater understanding of concepts formerly taken for granted and discovering fellow students shared similar views. Of the various elements of the ORARDA, the students collectively rated the readings as the most influential component in helping to shape their attitudes to patient care (readings (56%), questions (50%), posts (35%), reading and commenting on a peers' posts (30%), none (18%)).

The most common suggestions for improvement were to cover the same topics but in an alternate format such as a tutorial, lecture, podcast or quiz. This reflects the frequent dislike for online learning options among students in this group. Several students suggested to keep the readings and questions, but remove the requirement to post. However, it is the posting requirement that provides the momentum for students to do the reading and thinking. With the current design, the majority of students reported that they completed most of the required reading. Some students thought the readings should be more concise, perhaps with brief summary notes provided. Several students thought it would be better to finish the ORARDA earlier in the year to provide more opportunity to put learning into practice on the wards. One student would have liked to have commented briefly on multiple peers' posts, but didn't, for fear that the moderator would see one of her brief posts and deem her response post too superficial. Changing the instruction to "comment on *at least* one of your fellow students' posts" might resolve this problem for particularly conscientious students.

The next stage of analysis will use the students' posts to focus on how the learners engaged with the activity, the depth and type of responses and how they engage with their peers on the discussion board. Are they mostly just agreeing and affirming, or are they elaborating and providing counter-arguments to their peer's views?

Issues arising for discussion

The practice of medicine requires empathy and wisdom. In this study, reading seems to have had the capacity to shape attitudes. Through reading, complexity can be unbundled, alternate perspectives explored, and there is an opportunity for deep conceptual understanding. How can reading activities or any online activity be more firmly anchored to clinical activity and learning?

Exploring in greater detail why so many students don't like online learning activities and, conversely, why an equal number of students find it valuable.

Reflection is such a key capability for the developing practitioner (Sandars, 2009). How can we help students develop the habit of reflection? Is this sort of activity, ORARDA, part of the answer? How could we build the complexity of this type of task to sustain students' interest over time?

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Learning from practice…vicariously: Learning circles for final year medical students on clinical placement

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Abstract

Introduction: This report describes the use of "Learning Circles", a group-based reflective activity, for final year medical students on clinical placement. The aim of the Learning Circles is to bolster the educational value of the clinical placement by students sharing new knowledge and experiences with peers. This report outlines the design of this low-cost educational approach, and discusses the preliminary results of a study exploring student and teacher perceptions of the educational intervention.

Aim/Objectives: To determine staff and student perceptions of the value of Learning Circles, the nature of the information students share in the sessions, and how the activity might be improved.

Methods: In this mixed methods study, data were collected from a number of sources: end of placement written survey (n=74), student notes from each Learning Circle session, facilitator notes, and focus groups (3 x 1 hour sessions, each comprised of 4 or 5 students). Analysis methods included descriptive statistics of quantitative data and thematic analysis of qualitative data.

Results: Preliminary analysis suggests that the vast majority of students perceived the Learning Circles activity to be enjoyable, interesting, and facilitated the development of new knowledge. More than half of the students reported having incorporated this new knowledge into their clinical practice, and agreed that the activity should continue for future students. Despite this, students rated the utility of the learning circles lower than their other educational activities such as ward time, student presentations and lectures. Students appreciated the social element of the Learning Circles activity. A significant proportion of students also reported positive changes in their learning behaviours as a consequence of the sessions. The most frequent criticisms of the activity included the lack of structure, difficulty thinking of subjects to explore, and lack of engagement of peers. Students' most preferred topics included hearing about other's mistakes, interesting cases, how other clinical units function and practical clinical tips.

Conclusion: The learning circles activity has both social and educational value, with potential to positively influence work-based learning approaches, and clinical practice. The activity requires few resources and may be applicable to students on placement from other craft groups. There is scope to further improve the activity, particularly in the learners' orientation to the purpose of the activity, and more exemplars relating to the mechanics of reflective discussion, and potential topics for discussion.

Brief description of academic area

The setting for the project was a large community hospital in Melbourne where up to 35 final year medical students are dispersed on a variety of six week clinical placements at one time. These placement settings include General Surgical units, Vascular Surgery, Plastics, Orthopaedics, General Medical units, Cardiology, Endocrinology, Intensive Care, Aged Care, Rehabilitation, and the

Emergency Department. The students are expected to be active members of the teams they are attached to, with a focus on learning, preparing for work as a junior doctor and contributing to patient care.

The project spanned 18 weeks; three six week blocks. A total of 105 students had the opportunity to participate in up to 3 learning circle sessions. Attendance at the teaching sessions was encouraged, but not enforced, because students often had valid competing educational opportunities. On average, each learning circle session was attended by 25 students. Nine Learning Circle sessions were conducted, with three groups of 35 potential students.

Particular purpose

Clinical placements offer a rich learning environment for senior medical students. They are the ideal primer for work as a junior doctor (Brennan et al., 2010). However, clinical placements are costly, both in dollar terms and clinician time spent supervising and teaching students "on the run". Teaching at the bedside in the setting of clinical care is considered highly valuable and relevant to work (Benjamin, 2015), but could also be viewed as inefficient because the ratio of supervisor to student is often just one to one. Reflective Learning Circles (Hiebert, 1996) are a simple way to harness the "teachable moments" experienced by one student and make them available to a larger group for their consideration.

This educational activity was designed de novo and aligns with established pedagogical approaches to group learning, which manifest in a variety of forms and across numerous fields (Dyck, 2012; Hiebert, 1996). MacGregor described a Learning Circle as "…an informal, cooperative way of learning that is based on natural patterns of human interaction"(MacGregor, 1993). Specific features of the Learning Circles activity in this project setting were: multiple concurrent circles held in the one large room to accommodate a large number of students, small groups that are peer-led with no direct facilitation, and discussion topics that are open-ended.

There is very minimal literature regarding learning circles for medical students. A study by Sackin found that students, besides clinical cases also wanted to talk about issues relating to interactions with colleagues and the clinical environment. The study identified the importance of a trained facilitator to keep students focussed on the task (Sackin, 1994).

The term "Learning Circles" is more prevalent in the nursing education literature than in the medical education literature. Two relevant studies describe Learning Circles activities (Hiebert, 1996; Newton, 2011). Both studies ran one group at a time, used a facilitator and focused on critical incidents and/or ethical issues. Students initiated the topics of discussion based on their recent experiences on the ward. The aims were: to help bridge the gap between theory and practice; and to develop critical thinking skills and/or professionalism. The Learning Circles activities were considered to be valuable (Hiebert, 1996; Newton, 2011).

Initial literature review shows no published studies looking at Learning Circles for students without direct facilitation or the running of concurrent learning circles to accommodate larger groups. These elements of the activity being studied may not represent ideal practice, but are relevant to the reality of clinical education. They warrant closer examination because they enable the learning circle to be delivered in a cost-efficient manner for a large group.

In relation to this project, the medical students come together once a week for an afternoon of face-to-face teaching. Traditionally, this time consisted of lectures and student case presentations. The Learning Circle activity was introduced to enhance the weekly afternoon teaching session and was devised to: encourage all students to be active participants of the session; link the session with clinical placement experiences, add a sense of community and collegiality among the students; cover relevant content for final year students, and harness some of the learning highlights

experienced by individuals immersed in practice. The need for each of these design requirements is justified in more detail below in Table 1.

Table 1 *Problems and Design Solutions of the Learning Circle Activity*

Problem to be addressed	**Educational Goals of the Learning Circles**
Most students were passive learners for the entire two-hour didactic teaching session. Students reported 'just sitting and listening' to senior colleagues and/or peers present topics and cases.	Increase the amount of active learning/engagement in the session. Provide an opportunity for all students to contribute an element of their experience on the wards.
The didactic teaching session was the only time each week the students gathered together for education while on placement. Apart from the case presentations, there was no link between the students' immediate ward-based experiences and the teaching. Creating linkages was a challenge because the students were having such varied experiences on a wide range of clinical units.	To link the educational session with students' recent experiences on clinical placement. To provide an opportunity for reflection and integration of learning.
With over 500 students in the year level, many students did not know their peers. They were often the only student on their unit and may have had limited opportunities to interact with their student peers while on placement. The clinical placements can be challenging and students may feel isolated from their peers (Bearman, Molloy, Ajjawi, & Keating, 2013; Kilminster & Jolly, 2000)	Provide an opportunity for students to interact with each other. Add a sense of community and collegiality among the students.
There is no designated curriculum to be covered during the two-hour teaching session. Students rotate from hospital to hospital every six weeks, with no coordination between hospitals about what (if anything) is to be taught beyond what students learn while attached to their units.	Identify relevant content for final year students. Having the students generate their own learning needs based on their placement experiences is one way of ensuring relevance and engagement
All students were gaining unique and important knowledge and experience while on placement, but usually only one student would benefit from a given educational situation at a time. Often this learning would occur at the bedside with a more senior clinician (Benjamin, 2015). This is an excellent way for students to learn, but it is resource intensive when considering there is a cohort of 500 students. Students only have six placements per year so will have a limited breadth of experience. E.g. most students only do one surgical based placement. If they are assigned orthopaedics, they will miss out on many other common types of surgical issues involving organs and tissue other than bone.	Harness some of the learning highlights experienced by individuals and share them with a larger group.

Enacted post-practicum interventions

The Learning Circle was a 30-40-minute activity in which students were divided into groups of five and given half an hour to share an experience and/or a particular learning point from the previous couple of weeks. After this, time permitting, one or two groups would share an item from their small group with the whole group of 25, with some commentary from the clinical educator. This arrangement was devised to address the problems and educational goals outlined in Table 1.

There are two unique features of this activity worth highlighting. The first is the absence of a facilitator for the small groups of five students. There was however a facilitator overseeing the room/session which usually had five or six groups of five students. The decision not to provide a facilitator was influenced by resource limitations, the maturity of the students, and the potential for some educational benefit. The students in the project are in the final year and have had considerable experience with small group learning and peer learning (Tai, Haines, Canny, & Molloy, 2014), they are also relatively mature and motivated to learn by this stage of their course. Furthermore, students may feel more relaxed and speak more candidly when amongst peers only. Not having the small groups facilitated by a tutor is a low-cost option which greatly adds to the feasibility of this method.

The second unique feature is the open-ended nature of the items for discussion. This approach was in part chosen to discover what it is that students choose to talk about with each other. They were instructed to share an experience or something they had learned in recent weeks. The content for discussion could be clinical/technical (reflection on a procedure observed or undertaken) or it could be more emotional or process-based (experience of death of a patient in the ICU). They were not steered one way or the other. They were given a list of ideas to help stimulate thoughts for an item to share (see table 2).

Table 2

Student Prompts

Ideas for items to share with your group
A case
Something you were taught
A mistake you (or someone else) made and what you would do differently next time if you had the chance
Your observations of the work your unit does
Something that surprised, pleased or disappointed you
A brief summary of a common clinical problem on your unit
A description of doing something for the first time. What was it? How did it go? What did you learn?
A challenging situation

Data gathered and analysed

The data sources are as follows:

1. Learning Circle evaluation form (Likert and open ended questions)
2. Clinical placement evaluation form
3. Focus groups x 3
4. Facilitators notes
5. Student notes regarding topics raised

A total of 74 students completed the evaluation surveys. Only students present at the end of the final face-to-face teaching session were asked to complete the surveys, of those present, 100% completed the survey. Fourteen students participated in one of three focus groups.

Analysis methods included descriptive statistics of quantitative data and thematic analysis of qualitative data (Miles et al 2014).

Key findings

At the time of preparing this report, data analysis is ongoing. However, some early findings from preliminary analysis will be shared.

Compared with other educational activities during placement, overall students rated the Learning Circles activity as less useful than the student presentations, the lecture series, and time on the ward. Sixty-four percent of students strongly agreed (SA) or agreed (A) that the Learning Circles were useful, compared with 94%, 86% and 93% respectively. 27% of students were unsure or neutral about the utility of the Learning Circles, and 6% of students disagreed that the sessions were useful.

Despite this, 85% of students SA or A that the learning circles activity was enjoyable, 86% SA or A that the learning circles activity was interesting, 81% said they learned new things, 56% had incorporated learning from the sessions into their clinical practice and most students thought the activity should be continued for future groups of students. Only 3% thought it should be discontinued.

Survey and focus group data revealed that students' most preferred topics included hearing about each other's mistakes and concerns, so as to avoid making them themselves (and to reassure them that they were not alone in their own fears and imperfect practices), interesting cases, the practices and priorities of other clinical units, and clinical "tips", "pearls" and "gems" that are not typically found in books (e.g. what information is important when referring a patient to a particular clinical unit).

Many students commented that the Learning Circle activity impacted positively on aspects of their learning behaviours. Themes included actively seeking out learning opportunities on the ward to share, more time spent reflecting on learning on the ward, and more time spent looking things up.

Frequently reported valued aspects of the session included the opportunity to meet and talk with peers and normalisation of the student experience through self-disclosure. The most frequent criticisms of the activity included difficulty thinking of subjects to explore, lack of engagement of peers, and the lack of structure. However, there was a diversity of opinion about the degree of structure, with some students suggesting a clinical facilitator and more steps to follow in the sessions would help, and others identifying the open structure as a key strength. The majority of students thought the learning circles shouldn't be facilitated (54%). A fifth thought nominating a student to chair would be beneficial (21%) and a quarter would have preferred a clinician educator to facilitate the small groups (25%).

A key theme to emerge was that students were characteristically ***suspicious of reflection*** in their curriculum. One student was so bold to mention they had a 'visceral reaction' to the term 'reflection' or 'reflective essay', and it was therefore not surprising that participants in the focus groups suggested that a name change away from Learning Circles might better serve future cohorts. They valued being ***close to the action*** and reported that in terms of learning experiences, they most valued being on the wards (doing or observing) and receiving advice or teaching from experienced clinicians. One student praised the facilitator for spending time with learners before the activity to provide the rationale for why these group activities were important, and that the style of learning was one that would be replicated in their ongoing jobs as doctors (e.g. case discussions, journal clubs).

Facilitator reflective notes were classified into the following themes:

Learner engagement

Students appeared to have no trouble starting to talk. Mostly, the body language was encouraging, with laughter, smiles, and leaning in. It was often difficult to stop the groups from talking. Students asked each other questions and several students often contributed to a given topic in an organic way.

Seating seems to matter

If students were not arranged in a tight circle there was an increased chance of the discussion petering out quickly. Although unsure about cause and effect with this observation, the facilitator actively improved the positions of students if they didn't form a tight circle on their own.

It only takes one

The facilitator surmised that if one student was reluctant to participate, this could easily dampen the enthusiasm of the rest of the group, so she worked hard to gain "buy-in" and tried to create a non-

judgemental, relaxed learning environment. The facilitator did this by sharing some of her own recent clinical situations, not hiding or being apologetic about her own clinical knowledge gaps and avoiding putting individual students on the spot.

The facilitator decided ideal small group size was five. A few groups of three drifted off topic and groups of seven tended to form side conversations.

Issues arising for discussion

Reflection on experience is a key strategy for effective learning in the workplace, both during experiences (reflection-in-action), and after experiences (reflection-on-action) (Schon, 1983). This study formalised the reflection-on-action process through establishing a series of group-based Learning Circles. The aim of encouraging reflection is an ambitious one, as in this setting, by the time students reach final year, they groan at the mention of the word “reflection”. Something is happening in the earlier years of the course that is turning students off this vital activity. Apart from not mentioning the word “reflection” (i.e. reflection by stealth), we need to further research on what can be done to promote positive participation in reflective activities. What strategies could be incorporated into the Learning Circle activity to encourage reflection-for-action (Schon, 1987)?

This study demonstrates that despite students feeling initially suspicious about an activity called Learning Circles, they reported appreciating learning from others’ mistakes and concerns in clinical practice. More research needs to explore what learning environment is required for students to feel comfortable to share their mistakes with peers? How can they be supported, and what benefits could this style of education have on the culture in medicine? In large and competitive cohorts the utility of such an approach to lower the threshold to reveal academic or other vulnerabilities could have far reaching benefits for well-being of the whole cohort.

Carol Dweck’s work reveals the value of a growth mind-set (Dweck, 2017). This includes not being afraid to fail or make mistakes, learning from experiences, both good and bad, acknowledging gaps in one’s capability and working towards improvement, as opposed to protecting one’s ego and clinging to a positive self-concept at the expense of taking risks. The data suggests that formalised work-place activities such as Learning Circles may help to encourage a growth mind-set for students on placement.

This study suggests that the educational intervention had a positive impact on learning behaviours beyond the session (e.g. students thinking about what they could learn and/or have learned on the ward, following up on learning needs and looking up pathologies or other gaps in knowledge). Peer learning via group conversation, in the form of Journal Club, is a common form of ongoing education for specialist doctors. Specialists make time for this activity in their hectic schedules, presumably because it is useful. Further research questions to pursue include: At what stage of training are students ready for this? What are the requirements for readiness? How might formal time-tabling of such an activity in the undergraduate curriculum benefit students, versus informal discussions in the lunch room? Importantly, research is needed to better understand the extent to which these reflective capacities extend to workplace practice beyond graduation.

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One week and sixty seconds of community learning: what is learnt?

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Abstract

Frequently graduate entry and final undergraduate nursing students have articulated in their teaching/evaluation projects due to the intense nature of their programs that they constantly feel under pressure. It was anticipated that making a 60-second video on completion of a community health practicum might be an appealing interaction and provide a platform, given many students are now of the millennium or Y generation and hence 'techno-savvy', for them to engage in learning about the diversity in community health. This project was initially planned with two phases. A third phase, at the time of this report, has recently been added.

Phase 1: Entailed gathering a base understanding of students' experiences of learning, written in a portfolio, from their one week of community placement experience. Content analysis of on a portfolio question: '*Reflecting on your personal objectives for the week what is the key learning that you are taking away with you*?' Findings illustrated the students' focus was predominantly on skill acquisition, enhanced appreciation of the continuity of care between acute and chronic.

Phase 2: A Moodle site was created: Critical reflection in Community Practice. Participating students created and uploaded a reflective video of key learning from their community placement. The videos created were all longer than 60 seconds! The time varied from 1 minute 43 seconds to 6 minutes/video. Analysis revealed an enhanced understanding of the variety roles of community nurses, a sharing of the importance of the intersection between community and acute care in client lives, and how the community experience would influence their future practice.

Brief description of academic area

The project was undertaken in the School of Nursing and Midwifery. The phase 1 participants (*n*=6) were graduate entry Master of Nursing Practice students who had completed their clinical unit that incorporated one week of a community placement experience. These participants were all located at the Clayton campus. In phase 2, three graduate entry nursing students from the Clayton campus, were recruited. Three, final semester Bachelor of Nursing students also were recruited. They were across the then three locations of the School. This later group of students undertook a two week community placement experience.

Particular purpose

Previous research has clearly identified that student nurses spend their first week assimilating into a new clinical setting and it is only in subsequent weeks that they are able to focus on their learning needs. To compound the situation the community facilities students attend are quite varied in what they might offer in terms of opportunities and engagement. The placements might entail going out with a district nurse to being placed in a palliative care service. Within the MNP program, this particular community health component has been problematic since the inception of the course in mid-2009. Indeed at the time of this project students completed their community placement either prior to a mental health placement or immediately after the mental health placement. The MNP students do not return to being on campus in class till the subsequent semester. The Bachelor of Nursing students undertake a two week community health placement during their final semester. The teaching content in the BN program is front-loaded at the beginning of the students' final

semester and so similarly these students do not return to campus, so there is no ability to maximise on the post-practicum experiences and shared learning that might occur.

Additionally, for the Master of Nursing Practice, at the time of this project, was a truncated graduate program (18 months) and hence it was important to utilise the most pragmatic means for developing the students' skills in reflection on their learning. The registering board requires that nurses are competent reflective practitioners (NMBA, 2016). Yet, participation in a clinical practicum does not necessarily provide opportunities for students to develop their reflection skills (Nagle, 2009). Students need to be provided with opportunities to purposefully facilitate the development of these skills.

Prior experience in teaching into the MNP program, identified that the students seem to engage with material that was interactive and not too onerous. The MNP students had articulated in other teaching/evaluation projects due to the intense nature of their program that they constantly feel under pressure. In teacher education, video has been used extensively to capture the complexities of learning to teach to assist teacher education students to develop and notice what is occurring in the classroom. An essential component of the use video has been to assist teacher students to develop their critical reflective skills.

The goal of this project was to provide an alternative approach for developing students' critical reflection on their learning by creating an on-line forum where they could learn from each other. It was anticipated that having students make a 60-second video on completion of their community health practicum would offer an engaging interaction and facilitate knowledge development.

Enacted post-practicum interventions

Students were requested to make a 60 second video reflecting on their community placement and upload their video to a Moodle site. Students were provided with guidelines that directed them to remember their video was about their critical reflections, what did they learn? How might their video assist a peer in understanding something about the particular community setting they had undertaken their placement in. Three reflective questions were placed on the Moodle site:

- *Reflecting on your personal objectives for your community placement what is the key learning that you are taking away with you*?
- *How will this community experience influence your future practice?*
- *What would be the three critical moments of learning for you?*

An analysis of written clinical portfolio responses of a different cohort of MNP students, guided the formation of the reflective questions. Previous research on developing students' critical reflection (Newton, 2011) found that students require a specific focus to assist with their reflections. Students who participated in creating a video were also encouraged to review each other video and there was a discussion forum on the Moodle site to facilitate this.

In 2013, Monash University launched their Better Teaching, Better Learning Agenda. Within this agenda staff were encouraged to be more creative in their approaches to student learning. This sense of creativity partially stems for the explosion of new technologies with an emphasis on greater skill development alongside the willingness to challenge the learning journey provided to students. The current generation have grown up in a digital world. Hence it was considered that in providing an activity, reflective video, which could draw upon the skills of our digital techno savvy students would appeal to them and offer an innovative way in which to capture and share their practicum learning experiences.

Data gathered and analysed

Six written clinical portfolio responses to the question: *Reflecting on your personal objectives for the week what is the key learning that you are taking away,* were collected. Content analysis was undertaken of these responses.

At the time of this report four students self -reflection videos have been uploaded onto the Moodle site. A fifth is still an activity in process. Analysis was undertaken of the videos by two team members independently, and then a discussion was undertaken to determine consistency of the analysis. In doing the analysis, notes were taken of the time, any images utilised, tone of voice, and content.

Key findings

My focus in this section is predominantly on the presentation of one participant, Bozena a 3rd year BN student. The rationale behind this 'case presentation' is that she demonstrated the essence of being fully engaged with the concept of this post-practicum learning activity. In her participation she demonstrated an enthusiasm that was resonated in an email she sent me: *Thank you for this opportunity. I had a lot of fun creating my video for your project."*

From a pedagogic regard, the creation of her video illustrates that the making of a reflective video is an activity that can be undertaken with relative ease and within a short time frame. Bozena sent an email late one afternoon, indicating she would be interested in participating in the project; in response to a forum post on the Bachelor of Nursing Moodle site for the community unit that she was undertaking. Within an hour she had sent back her consent form and sought some further clarification on what was required. The following evening Bozena sent an email regarding having issues with trying to access some music for her video. A flurry of emails, occurred as she worked through trying to access some music, which she eventually did. Just over 48 hours from her original email, her completed video had been uploaded onto the Moodle site along with the permission form, for the registered nurse consenting for her image to be used, in brief video clip.

In viewing Bozena's video there was a sense of professionalism to her video. What really was apparent from the detail of the images she had in her video (e.g. festive, decorated, multiple group photos on walls, implies fun and friendly place to work, well supported environment) she had made a strong effort to contextualise what her community placement service entailed. This section of her video would be informative for other students who are going out on the same or similar placement setting. Instructing students prior to making a reflective video of a placement experience, being able to contextualise the setting is an important aspect, in setting the scene.

Being clear on what the purpose is of the reflective video. If one is expecting a level of critical reflectivity from students and not merely a descriptive commentary, then the provision key questions is imperative to assist with reflections. This is particularly important given the short time frame that was suggested in this project for the length of the videos. In Bozena's video aspects of her key learning did not appear till one minute and twenty seconds into her video, which given the entire length of her video was just under two minutes in length leaves little space for reflection. In contrast one of the MPN students, Anita whose video was over four minutes, spent more time reflecting on her critical moments of learning, sharing how her placement experience would influence her ongoing practice throughout her future nursing. She articulated more insight into a deeper understanding of the significant role of the community nurses. However, Anita's video was just a film of herself talking into her computer camera. This raises the consideration as to what will appeal to students, in either making or viewing videos created by their peers to augment their learning. Whilst, Bozena's video possibly lacks somewhat in critical reflectivity, what really stands out is that she produced something in a relatively short space of time, and there was a real sense

willingness and engagement with this as a learning activity. Her video does capture one's attention. Listening to someone just speaking into a camera does not quite hold one's attention as readily.

In establishing an activity, such as the one attempted in this project it would be worthwhile ascertaining the ability and confidence of the cohort of students in making a video. It was very apparent that became an issue for one of the participants. She indicated via an email with an apology that she had not forgotten about the video, that she was not happy with her first attempt and would be re-doing it shortly. The final video, lasted more than the required 60 seconds, again as with Anita, this MNP student had only spoken in front of her phone camera, and there was an added distraction that it was obvious she was reading off some prepared notes. Hence, preparation of the students before embarking on such an endeavour, is a further pedagogical consideration. Does one incorporate an optional teaching session with multi-media staff to provide strategies and tips in producing a video for those students who require such guidance?

The final phase of this project is about to commence, which will be returning to the participants to invite them to participate in an interview to explore their experiences of making their video. A key question that will be asked focuses on seeking to gain some understanding about their background prior to commencing their nursing studies. The rationale behind this is to elicit, if they had previously had some exposure to multi-media through high school or during prior work experience. Certainly, Bozena's video seems to demonstrate a prior knowledge/skill in this area.

Finally, 60 seconds for a video, is probably not quite enough time given the points that have been identified above. It is well known that to capture students' attention, videos need to be between two-four minutes in length. The average length of the videos in this project was three and a half minutes. Setting boundaries on the length is not only important to ensure the viewer's attention is held, there is also the pragmatic issue of file size when uploading. One BN participant withdrew from the project after making her video, as she was struggling with getting her file uploaded, and despite an approach to her to call the Faculty multi-media team, she opted to withdraw. As an innovative approach to augmenting post-practicum experiences, this project has been challenging to implement and created significant learning around pedagogic considerations.

Issues arising for discussion

- An emphasis needs to be placed on ensuring that the videos are not required to be 'Oscar quality'
- Facilitation of an online discussion forum, how to get students engaged in doing this particularly if they are not on campus.
- Timing of the post-practicum learning experience, how does one maximise the potential if the placement is at the end of a semester.
- Letting go, what can be exchanged for or replaced if successfully enact post-practicum experience.

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Enhancing learning through reflective practice for midwifery continuity of care experiences

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Abstract

This project aimed to understand how best to augment the educational worth of Continuity of Care experiences through enhancing the reflective capacities of midwifery students. Reflective practice is an integral component of one's personal and professional development as a health professional. Being a reflective practitioner is a core competence for midwifery practice in Australia, and indeed in most countries globally. Reflection supports the development of critical thinking and integration of theory and practice. The Continuity of Care Experience program in midwifery programs requires students attend to women during the antenatal, intrapartum and postnatal periods and is a mandated workplace-based experience in Australia. This higher education pedagogy requires the students' own agency and self-management, as it is not facilitated in the same manner as the traditional block placement model. The capacity to reflect on practice through these continuity experiences is a vital component to augment their educational worth. Whilst there are numerous authors espousing the virtues of reflection, and approaches to teach and learn reflection, a model of reflection incorporating a structured guided process appropriate for midwives was required. Griffith University has successfully developed and implemented the Model of Holistic Reflection and associated marking rubrics. This new model of reflective practice and guidelines for reflective writing were implemented across all midwifery students at Flinders University. We assessed the reflective capacity evident in the students' reflective writing pieces before and after implementation of the new reflection model. Furthermore, we explored students' perceptions and experiences across the two universities as to how they develop their reflective capacities, and, how they reflect on the Continuity of Care Experiences. It was evident that the quality of reflective writing prior to the structured model was poor, and this improved following the intervention.

Brief description of academic area and students involved

This project incorporated midwifery students across all three years of Bachelor of Midwifery programs at two Australian universities. The Bachelor of Midwifery Preregistration at Flinders University has two pathways; 1) Registered Nurse (RN) entry and 2) direct entry for individuals without nursing or midwifery experience. During the study period, there were 52 students in the RN pathway and 171 in the direct entry pathway. All students were included in the stage one process and were invited to volunteer for the stage two process, with 11 volunteering. At Griffith University, students across all three years of the Bachelor of Midwifery program were invited to participate in stage two, with 19 volunteering.

Particular purpose

A midwife is a responsible and accountable professional who works in partnership with women to give the necessary support, care and advice during pregnancy, labour and the postpartum period, to conduct births on their own responsibility and to provide care for the newborn and the infant [1]. In Australia, midwifery education incorporates equal portions of theory and workplace based learning to develop the requisite conceptual, dispositional and procedural knowledge for professional

practice [2]. A significant portion, approximately one third of the workplace based learning occurs through the Continuity of Care Experience (COCE) program [3]. The COCE affords an ongoing relationship for learning between a midwifery student and a childbearing woman, from initial contact in the early antenatal period, through pregnancy, birth and postnatal period. It is intended to give midwifery students the opportunity to provide continuity of care in partnership with women through their pregnancy and childbirth, thus imitating a midwifery model of continuity of care and continuity of carer [4]. The COCE commence in first year and afford students regular and sustained engagement with the world of midwifery work, providing experiences for them to reflect on, to understand about, and to develop their individual capacity for the profession.

The COCE pedagogic model sees students partnering with women, rather than the more traditional model of the student being partnered with a clinician and has resulted in changed relationships and practices with clinical supervisors and learning support [2, 3]. This may result in absent supervision, unplanned supervision, or brief and intermittent episodes of supervision, all of which impact on the student and clinician's ability to develop an effective learning relationship [5]. Research into the learning outcomes of the COCE model has shown that students reflective writing is predominantly at a descriptive level and has the potential for great improvement [6]. It has been posited that access to authentic supported learning, formative feedback, clinical reasoning and reflection skills would augment student learning from the COCE [2, 4, 7]. This project sought to enhance the students' capacity for reflection and reflexivity as a mean to augment their learning through the COCE program.

Reflective practice is a self-development process of making sense of what is experienced in the clinical setting, reflecting on it and uncovering new knowledge [6]. Reflective practice is a conscious thoughtful process whereby one thinks about their practice, analyses assumptions, decisions and outcomes, and draws on various forms of knowledge to achieve deeper meaning and understanding [8]. The work of Schön places an emphasis on learning from experience and identifies the process of becoming a reflective practitioner who reflects both in the moment (reflection-in action) and after the event (reflection-on-action) [9]. Reflective practice has the potential to transform practice and is consistently advocated for health professionals who require the capacity to think in action [8]. However, reflective practice is not an innate skill in all people and requires development to achieve the level of thinking expected of a competent health professional. There is a plethora of literature on the process of reflection and how to teach and learn reflective skills. There are numerous models for teaching reflective practices, and midwifery has drawn from models of reflection from nursing and education to guide the development of reflective practice. However, as discussed above, research has shown that much of the students' reflective writing of their workplace learning experiences remained at a descriptive level. This project sought to enhance students' capacity for reflective practice through the instructional processes of teaching reflective practice and reconsidering the expectations of the reflective write-ups for the COCE program.

Enacted post-practicum interventions

Review of the existing teaching instructions for reflective practice development at Flinders University identified a dearth of explicit guidance for student learning in the first-year curriculum, with the introduction of a very simple 4-step published reflective model in second-year, and an assumption of reflective capacity in third year. Given the COCE commence in first-year and continue throughout the entire three-year program, it was evident that change was required throughout the entire curriculum. A multi-facetted approach was implemented for the post-practicum interventions to address this problem.

A review of existing reflective practice processes within midwifery raised our awareness of the Holistic Reflection Model, which had been successfully used throughout the three-year Bachelor

of Midwifery at Griffith University. A partnership was established, and agreements made, to share their reflective practice development processes and resources for the purpose if this project. This involved the sharing of the model, and resources for staff and students, including marking rubrics and background readings. An expert academic from Griffith attended Flinders University campus, presenting development sessions with academic staff including classroom tutors and clinical facilitators, to achieve an adequate level of understanding to support the model and promote reflective conversations in class, and to have consistent message from the staff. During this site visit, the Griffith academic also presented to midwifery students in each year group of the three-year degree, to enable them to understand the educational intent and process of reflection, and the new model they were being asked to use. Recorded voice-over-PowerPoint presentations, as well as examples of completed reflective writing pieces were also made and uploaded to the online resource repository for the COCE program. New reflective writing instructions and template was agreed upon between the teaching and research teams, and students were encouraged to use the new approach for the remainder of the year. The use of reflective conversations with students was encouraged amongst the midwifery teaching team.

Data gathered and analysed

Two components of data collection and analysis were used for this project.

Stage one involved the reflective writing artefacts produced by students across all three years of the Flinders University program, as well as the marking outcomes of the written reflective pieces from midwifery students of Griffith University. The written reflective pieces of the students' COCE were collected before and after the implementation of the new reflective model at Flinders University. Marking moderation, to promote consistent application of the rubric was undertaken between the expert academic from Griffith university and the research assistant academic at Flinders University. Following marking moderation and agreement in terms and interpretation, each piece collected was marked using the Holistic Reflection Model rubric. This process is ongoing as the final reflective writing pieces are still being submitted. The marking outcomes will be compared pre-and post the intervention, across year groups, and across sites. Analysis seeks to ascertain any change in depth and quality of reflective writing following the introduction of the new model, as well as increased developmental evidence across the three-year program. Preliminary findings are presented here.

Stage two involved a series of focus group discussions with students at both universities. The aims of the focus groups were to discuss ways in which students perceived that they developed their reflective capacity, and to discuss the utility of the reflective model for learning. All focus group discussions were audio recorded, and transcribed verbatim by a professional secretariat service. A thematic analysis [10] is currently being undertaken. Preliminary findings are presented here.

Key findings

Stage One: reflective writing.

Currently we have over 300 COCE written reflection pieces of writing from Flinders University, of which 93 have been assessed to date. These are shown in Table 1. It is evident that following the intervention, the scores across all 6 domains, as well as the total scores increased substantially for all four of the student groupings. It is interesting to note that the lowest pre-intervention score was achieved by the third-year students, followed then by the RN entry students. This is an interesting interim finding given that both groups are those with assumed reflective writing skills, and some of their submissions where their final written reflections. It is however evident from Table 2 that both groups made substantial improvements following application of the new model and template,

although the sample size is low. This is a finding that warrants much further exploration. As only about 1/3 of the data has been assessed, this analysis should be reviewed with caution. Table 1 also shows that students at Griffith University improve the quality of their reflective writing over time, with the third-year students having the highest scores and first years improving from semester one to semester two as they develop their skills.

There are several limitations that must be considered when interpreting these findings. Firstly, the sample sizes are currently small. The pre-intervention reflective writing was undertaken with the previous instructions and marking expectations which were not rubric based. As such, the writing was not undertaken to address the criteria of the rubric used. Furthermore, the reflective writing activities undertaken at Flinders University are different to those from Griffith University. The rubric used addresses the components of reflective writing as opposed to direct content and is why the comparisons have still been made.

Table 1 s*tudent COCE written reflection marking outcomes*

Venue	Time	Student group	N=	Self-Awareness & Insight 10%	Evidence of Midwifery Knowledge, Philosophy& Cultural Safety 20%	Reflection & Reflexivity 30%	Evidence Informed Practice 10%	Critical Thinking 20%	Style, Language & Academic integrity 10%	**Total score**
Flinders University	Pre-Intervention	RN	15	4.4	10.7	14.4	4.2	8.4	6.0	**48.1**
		Yr1	10	6.2	11.9	18.3	5.5	9.6	6.9	**58.4**
		Yr2	14	5.0	10.9	15.1	5.3	8.7	6.6	**51.6**
		Yr3	37	3.8	7.7	11.7	3.3	5.7	5.8	**38.0**
	Post-Intervention	RN	1	8.0	18.0	26.0	8.0	17.0	8.0	**85.0**
		Yr1	10	7.6	14.4	23.8	6.9	13.9	8.1	**74.7**
		Yr2	2	7.5	17.0	24.0	7.0	15.0	9.0	**79.5**
		Yr3	4	6.5	12.5	20.8	6.2	9.0	7.3	**62.3**
Griffith University	Semester 1	Yr1	14	6.5	14	20	6.5	10	7	**64**
		Yr2	7	7	14.5	21	7	14.5	7	**71**
		Yr3	10	8.5	18	26	9	17.5	8	**87.5**
	Semester 2	Yr1	14	7.5	16	22	7.5	14	7	**74**
		Yr2	7	7.5	14.5	20	7.5	13.5	7	**70**

Table 2

Percentage increase in Student COCE written reflection marking outcomes

Student level	Pre-Intervention	Post-Intervention	% variation
RN	48.1	85.0	+77%
Yr1	58.4	74.7	+28%
Yr2	51.6	79.5	+54%
Yr3	38.0	62.3	+64%

Stage Two: Focus Group Discussions.

A total of 30 midwifery students (11 at Flinders University & 19 at Griffith University) participated in 8 focus group discussions during October 2016. The focus group discussions lasted between 39 and 98 minutes (average of 74 minutes). Each discussion was recorded and transcribed and is being subjected to a thematic analysis. The following is an interim presentation of this analysis.

Most participants had no prior experience with formal reflective practices, although they associated workplace quality assurance processes and practice reviews forms of reflection. A few students were avid personal journal writers and reflected through this practice. Students recognised

and understood the purpose of learning reflective practice and knew this was embedded in the midwifery curriculum. They saw it as a conscious and intentional process to enhance learning.

Reflection on practice was described as being undertaken in private and in both verbal and written forms with/for others. Many students spoke of thinking about their experiences privately whilst driving home on the day, a few students wrote detailed personal journals, and all wrote reflective pieces, required for their study program. All students spoke of the benefit of having opportunities for verbal reflection. These were enacted in various contexts and believed to be more valuable than written reflection for most participants. Students spoke of how when you verbalise your experiences, knowledge and thinking, it opens awareness of what you do and do not know. There was a range of people and contexts in which the verbal reflective discussions took place; ranging from pillow talk with partners, phone calls with students/peers/mentors, corridor conversations with staff, study groups, formal appointments with academic staff, to facilitated group conversations in the classroom. A popular approach among participants was the use of a small group of respected and trusted peers, as they understood the experience of being a midwifery student, empathised with one another, and were "travelling the same journey". These conversations would generally occur as phone conversations after significant events, or in depth discussions in study groups. Participants spoke of the value of in class debriefs and reflective conversations facilitated by the lecturers. Whilst in general these were deemed valuable, there was examples presented where they were perceived to be not useful. The frequency of the class discussions, the size of the groups and the cohesiveness of the groups all influenced the outcomes for learning. Participants spoke of the value in selecting their own group in which to have deep, meaningful and safe reflective discussions. They found when they created a peer study group, that they did learn to challenge one another, seek clarification on knowledge and assumptions, and explored the experiences of each other, learning together.

Written reflections we seen as the product of the reflective thinking and conversations. It was a means to write about the reflective outcome, as opposed to the process itself. There was a fear that their written reflections would be judged, and that influenced the content of their reflective writing. Indeed, some students spoke of one lecturer who focused their feedback on content correctness more than the reflective process and outcomes for learning. This experience de-motivated deep reflective thinking and promoted a more surface level factual presentation and description.

Students at Flinders University, particularly the third-year students, expressed concern at the increased expectations placed upon them with the new reflective writing model. Given the third-year students were so close to finishing they were reluctant to change the writing process they had established, despite the potential benefits for learning. Whereas, the first and second year students found the new model helpful to better understand the reflective process, and gave them improved structure to transfer their thinking to written work. There was however, suggestion that the template was too restrictive of structure and one that allowed more flexibility would be helpful. There was a consensus that using the model helped students to think differently about their COCE and to become more aware of the woman's (and other care providers) feelings and experience. The reflective writing process enabled students to develop an appreciation of the perspective of others which influenced the students' identity and practice of midwifery.

Issues arising for discussion

- Students require an opportunity to debrief, ideally with a more knowledgeable other e.g. with a midwife, doctor or peers at the time of clinical experiences.
    - To unpack experiences, including emotional content, and enable sense making and identification of learning

- Focused conversations need to challenge learning and not just be descriptive of experience
  - The role and performance of the facilitator is vital to effective reflective conversations
- What are the best fora for students to learn to reflect on practice?
  - Who and how should these be supported?
- Structured guidance and examples improved the quality and depth of reflective writing
  - Implementing a rubric improved the quality and depth of reflective writing

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Learning circles to develop inter-subjectivity

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Abstract

Nurses work in a range of clinical settings, with a variety of individuals from culturally and linguistically diverse backgrounds. Nurses do much of this work in relationships with others, and this requires them to develop intersubjectivity, the "shared understanding of meaning by two or more persons, either directly in a relationship over distance or time through language" (Cody, 1995). Learning circles are a pedagogic method to promote intersubjective communication skills required to develop shared meanings (Hiebert, 1996). This project aims to evaluate a structured learning circle approach to develop nursing students' capacities required in teamwork (i.e. intersubjectivity).

An action research approach was adopted. Data collection included: (1) photographs of students' concept maps – describing a recent clinical case - drawn before and after learning circle discussion; (2) students' feedback on the learning circle experience; and (3) clinical facilitator interviews regarding their experience of the learning circle. Consistent with action research methodology, findings from the data analysis were used to continually develop the learning circle processes.

Four learning circles have been conducted to date. Students' understanding of their clinical cases was generally enriched by the discussion. Students' feedback on the learning circle experience indicates that the process enhanced learning and confidence to discuss clinical topics with others. Clinical facilitators' early experience of the learning circles indicates that they valued the opportunity to observe the students engaging with each other in student-led discussion.

These early findings indicate that there is value in the learning circle as a pedagogical method to support student learning through discussion with others. Students generally begin the discussion focused on factual or empirical forms of knowing but the post-discussion concept maps reveal further consideration of socio-political (policy or context) and sometimes ethical knowing, suggesting that understanding is enriched through intersubjective communication activities that they lead.

Brief description of academic area and students involved

The academic area is nursing, drawing upon the five patterns of knowing in nursing (White, 1995). The project is focused on how students make meaning from, or conceptualise, their practice. By conceptualising practice, students are able to generate hypotheses and actions for further testing and evaluation. The learning circles have involved groups of nursing students from Griffith University and University of Southern Cross who are undertaking a clinical placement at the Gold Coast Health. The students within each group have diverse histories associated with life experience (age) and cultural backgrounds.

Particular purpose

The relationships that nurses experience in the workplace, with colleagues, patients, and families, are essentially intersubjective processes as they seek to make sense of, and identify, the interests of

these interlocutors (Pierson, 1999). Intersubjective processes can enrich understanding of practice by revealing other perspectives, elements, and actors intertwined in clinical practice. Billett (2014) suggests that the development of intersubjectivity can be promoted when learners articulate, share, appraise and elaborate shared disciplinary and personal-professional positions, values and procedures. These skills can be developed through specific pedagogic interventions in practice settings (Billett, 2014). Students can learn the skills to enact the shared understanding and practices that emerge in multiple relationships (intersubjectivity), and that are required to ***do*** nursing, through dialogical discussions with other students that is facilitated by an expert clinician.

In the Collaborative Clusters Educational Model (CCEM), nursing students are integrated into clinical work units, as members of the interprofessional team. Preceptors allocate a patient load for students, based upon their specific learning objectives, year level, and the opportunities afforded by the workplace. The Clinical Facilitator (CF) provides support for student learning across several clinical units. While the CCEM provides affordances for student engagement in practice, the opportunities to reflect on practice individually or in groups has focused more on students' experiences of fitting into the workplace, rather than on improving nursing care delivery. The larger groups of students, and the distribution of students across many geographical ward areas and different work shifts have, not surprisingly, challenged CFs to reconsider previous facilitation practices.

This project aimed to establish an evidence-based pedagogy, learning circles, within the CCEM at Gold Coast Health, to support student development of intersubjectivity and provide the CFs with an opportunity to both augment and assess students' understanding of practice. The learning circle aims to develop students': 1) group process skills and reflection that are necessary for teamwork; and 2) knowledge about practice. We hypothesise that students' knowledge about practice develops by analysing specific practice experiences using knowledge learnt in their university-based courses as well as that revealed through the group's discussion. The learning circle is a pedagogic device for developing students' knowledge of nursing through checking, aligning, and comparing experiences, feelings, and conceptual understanding (Hiebert, 1996). The group process skills that can be developed in learning circles, including shared understanding and purpose, critical reflection, innovation, and leadership, are considered to be important skills for teamworking (Sims et al., 2015), and therefore are salient for employability.

Post-practicum interventions and justification

The post-practicum intervention enacted in this project is the structured learning circle. The learning circle is an evidence-based pedagogic method used in work-based learning (Hiebert, 1996; Sims, Hewitt & Harris, 2015; Walker, Cooke, Henderson & Creedy, 2013). Its value lies in its ability to promote the value of, and accommodate, a diversity of participants (Hiebert, 1996), through recognising the diversity of nursing and other professional student populations, in terms of age, work experience, and personal socio-cultural histories. The model for the learning circle is consistent with usual 'debriefing' sessions in terms of small group discussion held on the health service site, over one to 1.5 hours during early afternoon. As such, it is feasible to implement in terms of releasing students from the wards.

The learning circle is structured, following four steps of critical reflection found to be successful in creating effective learning communities in nursing (Walker et al., 2013):

1. Deconstruct a particular practice or topic to develop questions;
2. Confront difficult or 'untouchable' topics that the questions raise;
3. Explore the possibilities, including how practice could be done differently, what information is still required; and
4. Generate alternatives for consideration and further investigation.

In the learning circle, students lead the discussion, with the facilitator providing information, support and coaching on team communication skills as required.

Data gathered and analysed

There were three data sets. The first was student feedback on the learning circle experience, using three open-ended questions focused on what was helpful, how this outcome was important to work as a nurse, and what would they still like to learn. The student summaries of the learning circles were subjected to content analysis undertaken by two members of the research team.

The second data set included interviews with CFs. These were scheduled to occur following the first learning circle and then two months later. The CFs were invited to describe the benefits of the learning circle for them and the students, the limitations of the learning circle, and suggestions on improvements. Interviews were recorded and transcribed. The data was then subjected to content analysis undertaken by two members of the research team.

The third and final data set was student concept maps, drawn during each learning circle, pre and post-discussion. The initial map was recorded in black or blue ink and the additions were in red ink. The maps were photographed and analysed by two members of the research team. The maps were reviewed for three elements: (1) coherence, including relevance and appropriateness for the identified situation, (2) comprehensiveness of concepts judged by the number of concepts and linkages (propositions), and (3) hierarchy of propositions showing relationship between specific and general concepts.

Key findings

Early key findings are focused on feasibility of the learning circle, the student and CF experience and student learning.

Feasibility

Early findings indicate that the learning circle activity is structurally feasible for students and clinical facilitators but there are challenges in organising a suitable space in a busy teaching hospital for this activity. One member of the research team was required to book a meeting space once per week for CFs to share. The CF training includes one 2.5 hours seminar and follow-up with a research team member attending the first two learning circles and providing feedback to CF. To date, four CFs have received training. The CFs purposively selected students for the learning circle, focusing on diversity in the population. This is consistent with the aim of the learning circle method, to have people from diverse backgrounds discussing one issue.

Student & CF experience

Thirty-seven students who participated in the first four learning circles provided responses to three open-ended questions. Students valued the learning circle activity, with learning enhanced through active learning in collaboration with other students, safety in peer-assisted environment, opportunity to analyse difficult concepts, and getting feedback from others' perspectives. Through the learning circles, students could identify the skills that they were developing, naming 'outside the box' thinking, advancing critical thinking skills and gaining new strategies in teamwork. From the conversations to date, students learned more about the importance of health care systems, including policies and procedures and the importance of the nursing assessment process. By working in the group, some students also valued the opportunity to compare and share their learning experiences in a safe environment with their peers. The ability to write down their experiences increased their self-investment in the process and became a source of reference material for them.

Three CFs have been interviewed following learning circle experiences. The CFs valued the student-led nature of discussion and felt they were able to assess individual students' performance by their engagement in the discussion. The CFs also identified that those students who had been

exposed to concept mapping previously often led the discussion, with the rest of the student group participating as they became more familiar with this concept. The learning circles were noted as a way to support reflection on practice and that students valued this type of reflection process. The CFs highlighted that the learning circle process required them to shift their focus from guiding students to supporting them to lead and progress the discussions – something new to both the CFs and student groups. Understanding concept mapping was also a new skill for some CFs and they required coaching on how to support students in the development of their own concept map.

Learning

The concept map analysis process used to determine learning through participation in the learning circle process has been challenging. Initially, there was variability between map reviewers. This was addressed through appointing two research team members to review the maps (consistency) and moderation sessions to review those where there was significant difference. It was agreed to add a qualitative analysis of the maps, describing coherence, comprehensiveness and hierarchy of propositions in words. Preliminary results from the first four learning circles suggest that many students demonstrate deeper learning of concepts following the intersubjective discussion. Further analysis is underway.

Issues arising for discussion

At this stage, the student-led learning circle design is recommended as an educational strategy to support the development of intersubjectivity while on clinical placement. It is expected that the learning circle activity will be introduced across nursing student placements in Gold Coast Health in 2017.

Areas for further development and investigation will include the use of A3 size paper for concept mapping (data collection) as some students expressed feeling constrained by the use of A4 size paper in the learning circles; and consider introducing the idea of concept mapping as an exercise to conceptualise theory to practice as part of the curriculum. While intended as a data collection strategy, the use of the maps as a trigger for discussion has been noted by the CFs. The role of the map (object) in the learning circle process bears further consideration.

One final area for discussion is how to introduce different ways of learning within undergraduate education. Both concept mapping and learning circles were new concepts for many participants. Adequate support for innovative teaching strategies needs to be established and monitored.

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Consolidating Clinical Learning through Post-Rotation Small Group Activities

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Abstract

University of Notre Dame Australia medical students complete the final two years of their four year postgraduate course in clinical placements. This 'clinical apprenticeship' model has the capacity to provide rich, experiential experiences for students, however effective learning outcomes are dependent on many variables. Notre Dame Interns have reported feeling under-prepared for the clinical workplace.

To address this perceived lack of preparation, six Clinical Debriefing Tutorials CDT - facilitated by practicing clinicians - were rolled out to final year medical students (n=112) to maximise learning during their clinical rotations, and to help students draw links between placement experiences and the realities of the clinical setting. An evaluation survey was administered to determine the efficacy of the CDT in achieving these educational goals. Responses were analysed using Survey Monkey.

Thirty-eight students completed the survey (response rate = 34%). Most students (72%) thought CDTs were useful to their learning and were satisfied that; listening to other students' experiences enhanced their understanding of what it means to be an effective clinician (79%); receiving feedback from their tutor about placement experiences consolidated their understanding of clinical work (79%); CDTs also provided an opportunity to explore the relationship between coursework and clinical practice (66%). Students agreed that CDTs helped them develop collegiate relationships with their peers through processing, understanding and reflecting on their experiences in the clinical setting.74% of students developed strategies to deal with critical incidents after CDT discussions. The strategies (n=87) aligned with CanMEDS competency roles: Medical Expert (15%), Communicator (21%), Collaborator (11%), Professional (28%) and Scholar (25%). Students also identified professional qualities that associated with CanMEDS competency roles.

Clinical Debriefing Tutorials support practicum learning through enabling students to reflect on their workplace experiences, identify strategies to deal with critical incidents, develop collegial support networks and recognise competencies required for real-life clinical practice.

Brief description of academic area

Six clinical debriefing tutorials (12 groups of approx. 10 students, n=112 students) were delivered to final year medical students at The University of Notre Dame Australia to support and enhance practicum learning experiences. The main aim of the clinical debriefing tutorials (CDT) was to maximise learning that took place during clinical rotations, and to enable students better prepare themselves for the realities of the clinical workplace. The small group tutorials were facilitated by a practicing clinician and approximately two hours in duration. The tutorial session time was determined by each group independently and occurred generally on weekday evenings after 5.30pm.

Particular purpose

Notre Dame medical students commencing their internships have reported feeling under-prepared for the clinical workplace. To address this perceived lack of preparedness, an educational intervention was introduced to the final year curriculum with the aim of supporting and consolidating learning during clinical rotations. This educational intervention took the shape of clinical debriefing tutorials that provided students with a) an opportunity to link theory learned during coursework with clinical practice in the work setting and b) to encourage students to identify strategies for adapting to the realities of the clinical workplace.

Workplace based learning varies across different clinical sites and can be inconsistent. Time poor expert clinical practitioners can have a patient-focussed viewpoint and teach 'on the run' rather than adopting a student-focussed learning approach. This type of learning can be confronting for students entering the clinical environment from university where there is a student-centred learning approach in the pre-clinical years. While the clinical apprenticeship model of learning is underpinned by contemporary theories of learning (Steketee & Bower, 2007), the extent to which it promotes effective learning is dependent on the degree to which students are actively engaged in the learning process, rather than passively shadowing expert clinicians. The more involved students can be in their learning, where they set goals and trial different types of learning strategies; where they share concerns and successes with peers, and where they obtain feedback from more experienced clinicians about patient encounters, the more likely they will be prepared for the realities of internship upon graduation. As such, to bridge the gap between the clinical rotations and internship, rotations are augmented with clinical debriefing tutorials (CDT). The objective of the CDTs is to promote the development of a collegial support network amongst medical students where they feel comfortable to share and make sense of clinical learning experiences.

The format of the CDT was refined and adjusted after a pre practicum survey of the students in October 2015. They were asked to nominate an educational intervention that would be valuable in supplementing the clinical rotations. The students requested that the educational intervention was led by clinicians active in the field in a relaxed small group environment. Thus, six CDTs were provided in 2016 for final year medical students and comprised a structured framework of case presentations on troubling or thought provoking critical incidents experienced by students on rotation. The tutorial discussion then explored the incident led by the presenting students with input from the clinician tutor.

An evaluation survey was developed to determine the effectiveness of the CDT as a learning enhancement tool post clinical rotation. The evaluation survey was administered to students on line and in hard copy format in September 2016 at the end of their last CDT. Qualitative comments were also invited from the tutors on the threads of group discussions following the survey roll out.

Enacted post-practicum interventions

Small group CDTs were implemented in the final year of the course. This format was identified by the same cohort of students in 2015 in a survey rolled out at the end of their final exams. The majority of the students wanted small group tutorials in a relaxed atmosphere facilitated by an active clinician whereby they were given the opportunity to discuss patient cases, critical incidents and other issues of interest related to their rotations. While the CDTs have been in place in the curriculum since 2011, the structure was modified in 2016 such that students were given a greater opportunity to use these tutorials as a means of making sense of learning that occurred whilst on rotation. CDT tutors were trained accordingly.

Six CDTs were held at the completion of each rotation throughout 2016. Each CDT was 2 hours in duration and was facilitated by a practicing clinician. The groups were comprised of approximately 10 students randomly chosen. The structure of each CDT included formal and informal components. The formal component included case presentations of a difficult or troubling professional issue with students undertaking a literature review to ensure that all students could develop management strategies for their clinical practice. The informal component allowed students to share their experiences in a less structured way, but helps to promote collegial support and a greater understanding of the hidden curriculum of a difficult or troubling clinical experience.

An evaluation survey was developed in 2016 in collaboration with the coordinator of the CDT program to determine the effectiveness of the clinical debriefing tutorials as a learning enhancement tool post clinical rotation. The survey questions were individually designed to evaluate student learning post practicum. Questions aimed to determine whether the CDT:

- was useful to student learning
- consolidated experiential learning during the rotations
- assisted students in developing collegial support networks
- encouraged students to identify strategies to help them navigate and make sense of difficult experiences in the clinical setting
- Facilitated the development of the medical student as a professional practitioner
- Facilitated reflective practice

Data gathered and analysed

A 13-item evaluation survey was designed to evaluate the effectiveness of the CDT as an educational intervention to support and enhance practicum learning. It was administered to final year medical students online in August 2016, two months before their final exams. 21/112 students submitted online responses and 17 students submitted hard copy responses. All 38 responses were entered into survey monkey and analysed accordingly. In addition, two tutors provided comments by email. The tutor comments are discussed separately.

Students were asked to indicate on a sliding scale from 0% to 100% the extent to which they agreed with each item. A response was determined positive if a student awarded 50% or more on the sliding scale. The figure on the sliding scale was not made visible to the student. A responses was also determined as positive if a student ticked the '50% or above' score in the grid box which ran from 10% in increments of 10 to 100%. A response was considered negative if a student awarded less than 50% on the sliding scale or ticked the 40% or lower box in the grid. Qualitative data analysis was categorised into themes according to the seven competency roles described in the 2015 CanMEDS Physician Competency Framework. http://canmeds.royalcollege.ca/en/framework.: Medical Expert, Communicator, Collaborator, Leader, Health advocate, Scholar and Professional.

Key findings

The clinical apprenticeship model whereby medical students shadow experienced clinicians as they attend to their patients is a powerful approach to learning when implemented effectively. The theory underpinning the clinical apprenticeship model promotes the construction of meaningful learning in the context of real-life clinical settings. At the heart of this approach is the facilitation of learning by expert clinicians who are able to tailor experiences according to students' levels of readiness. However, findings of an evaluation study conducted in 2007 (Steketee & Bower, 2007) suggest that the benefits of the clinical apprenticeship model are not guaranteed. This evaluation study found that teaching and learning opportunities appeared to be somewhat random. Teaching

moments tended to favour clinicians' available time rather than what students needed to learn. In many instances, there was no routine that students and clinicians could use to guide the practicum experience. Students commented on a lack of structure to the curriculum which resulted in ad-hoc teaching and learning experiences across all rotation disciplines.

The CDT, therefore, was designed to support and augment student learning that occurred during the clinical rotations. They provide opportunities for students to enter into dialogue with peers and practitioners about their practicum experiences and reflect on cases that they found confronting, inspiring and anywhere in between. The tutor provides them with a template for reflection which will hopefully become an ingrained practice as they move into their professional careers. These tutorials appear to supplement the 'opportunistic' and random nature of learning in the clinical setting.

38 students completed the survey and two tutors provided comments, thus feedback was received from all groups. Most students 72% (26/36) thought the CD Tutorials were useful to their learning (score >50% on sliding scale). They found it a good opportunity to meet, discuss ethical issues, debrief and reflect with an experienced clinician. Students thought their learning in CDT was enhanced by listening to other students' experiences, and receiving feedback from their tutor on their placement experiences consolidated their understanding of clinical work. 66% of students thought CDTs were an opportunity to explore the relationship between what they learned on campus and what they did on rotation. The majority of students enjoyed the CDT environment and thought the collegial support through engagement with their peers helped them to process, understand and reflect on their experiences in the clinical setting. 28/38 students thought collegial support helped them manage future experiences in the clinical setting.

Many students thought the opportunity to discuss critical incidents was important for their professional growth as a clinician. Over half the students changed their behaviour after CDT discussions and 74% of students developed strategies to deal with critical incidents after CDT. Strategies aligned with five CanMEDS competencies (n=87 strategies): Medical Expert (13/87), Communicator (18/87), Collaborator (10/87), Professional (24/87) and Scholar (22/87). 73% of students felt CDT helped them consolidate their understanding of the qualities for a good doctor and identified qualities that associated with CanMEDS competencies (n=126): Professional (27/126), Communicator 38/126, Medical Export 34/126, Collaborator 8/126, Advocate 4/126, Scholar 3/126 and Leader 2/126. Most students thought their understanding of their personal development as a clinician became clearer in CDT specifically: ability to reflect, work with a team, develop respect for patients and professional behaviour.

In summary, final year medical students appreciated the tutorials as an opportunity to meet with their peer group to: discuss issues, debrief and reflect on their clinical experiences on rotation. They perceived that the structure of the CDT enhanced their learning post practicum as it helped them to develop collegial support networks, identify strategies to deal with incidents in the clinical setting, recognise the qualities they would require and need to develop as professional doctors in the clinical setting. Thus, the discussions in the CDT enable students to be better prepared for the clinical work place and thus more "work ready".

Issues arising for discussion

The tutor and the school of Medicine need to ensure that students understand the specific value of the CDT as an educational intervention. This means that those students who feel time-poor do value the CDT as an integral part of the curriculum which helps to consolidate their learning from practicum. Equally, those students who do not identify with some members of their individual groups need to consider that developing the ability to work professionally with all colleagues in the workplace is essential, and this is a component of becoming workplace ready.

Comments received from two tutors also draw attention to the need for the CDT group to work cohesively for learning to be most effective. Tutors also note that expectations should be clearly defined within the group by the tutor and students. Tutors also detail their need to draw on their own leadership skills, clinical practice expertise and experience for the CDT to function effectively.

Meeting with students in groups may be considered inefficient and costly compared with faster or easier online communication. However this does not take into account the benefits of student/student and student/tutor interaction. It was specifically noted from comments in the survey and student responses that the collegial element of the CDT is strongly valued.

The format/structure of the CDT is important. From this survey and study, student feedback has shown that both the formal and informal components of the CDT help students become more "work ready" and are integral parts of the intervention

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Enhancing students' feedback literacy in the workplace: a learner-centred approach

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Abstract

Introduction: Healthcare students want more feedback from clinical supervisors, employers and peers on their placement performance. Students' role in feedback processes tends to be overlooked with most educational interventions focusing on educators' skills in 'feedback delivery'. Addressing learners' roles in feedback - as seekers, processers and users of performance information - offers opportunities to improve clinical placement experiences, and support transitions to practice.
Aim/objectives: This study aimed to evaluate an educational intervention designed to augment students' feedback engagement during and after their clinical placements at a major hospital.
Methods: The learner-centred feedback model, Feedback Mark 2 (Boud and Molloy, 2013), formed the basis of a multifaceted intervention to support students' engagement in feedback processes in the workplace. An interprofessional student group (n=105) engaged in the intervention which included an e-learning priming module, a face-to-face workshop and a series of reflective activities. Evaluation of the intervention included a series of learner surveys (immediately post workshop), reflective activities and student interviews. Qualitative data were analysed using Framework Analysis (Ritchie and Spencer, 1994) with all team members involved in initial coding and framework development. Quantitative data were analysed using descriptive statistics.
Results: Thematic analysis of survey and interview data indicated that students thought the multi-modal intervention improved their understanding of their role in feedback processes. Students reported being more actively engaged in feedback both during placement and at university after participating in the workshop. They attributed these changes in their feedback approach to being more confident in requesting feedback, both in general, and on specific aspects of their clinical practice, and in clarifying strategies to improve their clinical practice.
Conclusions: The findings suggest that supporting student engagement in feedback processes may make an important contribution to improving learning on clinical placements, and beyond. This interprofessional intervention could be applied in other work-place settings to improve learner engagement in feedback.

Brief description of academic area and students involved

For this project an educational intervention to support student engagement in feedback processes whilst on clinical placements was designed, implemented and evaluated. The intervention was enacted three times within the hospital setting. In total, 105 healthcare students participating in clinical placements at Gold Coast Health including allied health (pharmacy, physiotherapy, social work), medical and nursing students participated in the

educational intervention. Of these, 29 completed the evaluation survey, 9 completed the follow up surveys and 16 participated in an in-depth interview exploring their feedback experiences during and post-practicum. (Interviews with medical students (n=29) will be complete by end of March.)

Particular purpose

This project seeks to enhance student engagement in feedback processes in the workplace. This will be achieved through the development, implementation and evaluation of an educational intervention which aims to develop students' feedback literacy. The intention is to augment effective feedback practices, using a sustainable model, thereby supporting integration of learning as students move between placement and higher education settings and ultimately, the workplace (Boud, 2000).

Effective feedback is central to student learning (Hattie and Timperley, 2007). This learning can be achieved through helping students identify their strengths and areas for improvement and promoting strategies for behavioural change (Ende, Pomerantz and Erickson, 1995, Fernando et al., 2008, Watling et al., 2012). However, there is a tendency for feedback to be viewed and enacted as a process in which the educator or supervisor provides students with information about their performance, that is, an educator-centred process (Boud and Molloy, 2013). With this approach, the student role is often passive. The risk associated with this 'educator telling' approach include students' loss of agency and missed opportunities to develop an ability to self-evaluate in collaboration with an experienced practitioner (Tai et al., 2015).

This educational intervention, underpinned by a learner centred feedback (LCF) model called "Feedback Mark 2" (Boud and Molloy, 2013), aims to support a feedback process where students are actively engaged and encouraged to seek feedback on their performance, make sense of this information and integrate feedback into their practices. Moreover, student involvement in the study will support them to evaluate the feedback process itself, making judgments about their own role within the verbal feedback encounters and plan strategies for their progress as a reflective learner and practitioner.

The initial survey findings from the broader Office of Learning and Teaching (OLT) study (2016) indicate that students want more feedback from clinical supervisors and employers on their placement performance. This finding, whilst important, is congruent with large bodies of evidence (Boud and Molloy, 2013, Hattie and Timperley, 2007, Johnson et al., 2016) indicating that students are dissatisfied with feedback processes. These findings seem to be consistent regardless of setting. For example, students want more feedback from their lecturers in educational institutions (Krause et al., 2005) and from their placement supervisors in the workplace (Smith, Ferns and Russell, 2014). These findings are disappointing for health professional educators as significant efforts have been made to augment educator feedback skills. For example, in health care settings, clinical supervisors routinely attend training courses and workshops designed to improve feedback provision.

Feedback challenges experienced by students can be explained by findings from observational studies of feedback in workplace where feedback tends to be supervisor-centric i.e. supervisor led monologue with limited opportunities for student engagement (Molloy, 2009, Fernando et al., 2008). Moreover, when receiving information about workplace performance, few students receive guidance on plans or strategies to improve performance (Molloy, 2009, Fernando et al., 2008).

Thus, opportunities exist for improving the process of feedback for placement students in the workplace. A sustainable feedback approach (Carless et al., 2011, Boud, 2000) is likely to be desirable in the practice setting, that is, a process which is not wholly dependent on an expert or supervisor to provide information to students on their performance. These considerations have challenged researchers to reconcepualise and develop a new feedback model (Boud and Molloy,

2013). This model, Feedback Mark 2, supports a shift away from information provision to a process where learners seek and use feedback in a way that changes their subsequent performance on similar tasks.

Whilst there is considerable theory and evidence supporting Feedback Mark 2, it has not been tested empirically. Given these considerations, this study informed by Feedback Mark 2, will develop, implement and evaluate an educational intervention which aims to improve students' feedback literacy in the workplace.

Enacted post-practicum interventions

This educational intervention was designed, delivered and evaluated by work-based clinical educators and educational researchers to augment students' engagement in feedback processes during and after their clinical placements at a major hospital. Whilst separate from students' university curricular experience, the intervention was linked to their placement experiences which are arranged by the university thereby likely to be considered by students to be relevant to their placement learning experience and beyond. The overall goal was to improve student engagement in feedback processes whilst on placement and beyond.

A multi-modal intervention was designed to support student understanding and engagement with learner-centred feedback whilst on placement and post-placement. The intervention development was theoretically informed by Feedback Mark 2 (Boud and Molloy, 2013) and focused on supporting and enabling students' understanding of their role (and others) in feedback processes. Learning opportunities were sequenced to ensure that students applied their learnings as they progressed through the intervention. This goal was achieved through conceptual knowledge development about feedback processes and the creation of learning opportunities for procedural and dispositional knowledge development through workshop activities and experiences during and post-placement. Table 2 provides an overview of the multi-modal intervention, the intended learning outcomes and learning strategies employed.

Table 2

Overview of Intervention 31

Intervention	Time commitment	Intended Learning Outcomes	Learning strategies/approaches
e-learning module	30 -45 mins	• Introduce key concepts and principles of effective feedback • Consider student role in feedback processes • Reflect on own feedback experiences	• Information about LCF principles and concepts (PowerPoint and quiz) • Personal readings • Sharing of student experiences of feedback on placements (videos across a range of professions)
Workshop	Up to 3 hrs	• Support students' knowledge development of the key concepts and principles of effective LCF • Support active student engagement in the feedback process while on clinical placements and to integrate this feedback into their practices, both in clinical and university settings • Reflection on own and others' experiences of feedback • Promote understanding of learner and supervisor roles in learner-centred feedback processes	• Sharing of conceptual knowledge about LCF (aided by PowerPoint presentation) • Small and large group discussions to share feedback experiences • Role play for students to engage in both providing and receiving feedback (and observing the process as a third party- 'giving feedback on the feedback')

Intervention	Time commitment	Intended Learning Outcomes	Learning strategies/approaches
Reflective activities	20 to 30 mins	• Reinforce key features of effective LCF • Reflect on experiences of feedback in the workplace and university setting	• Reflective log for student to complete following feedback episodes (micro perspective) • Two online surveys delivered 1 week (micro perspective) and 4 weeks' post workshop (macro perspective)

All healthcare professional students from Griffith University were invited, via email, to participate in the learning intervention. The intervention has been conducted three times on 9th August 2016, 3rd November 2016 and 13th January 2017 with 105 students including allied health, nursing and medical students. The first two intervention cycles have been completed and the three cycle with the medical students is ongoing.

Data gathered and analysed

Data collection focussed on evaluating the intervention to: 1) determine the students' reaction to the learning intervention, 2) establish what students learnt and 3) explore how students were implementing their learnings into their practice (Guskey, 2014). To achieve these evaluation goals three data sets were collected in three phases:

- Phase 1: Post-Learning module and workshop questionnaire – This questionnaire included qualitative and quantitative data and was completed by 29 students. Students were asked to describe their key learnings from these experiences, plans for integrating new learnings about feedback into practice and impressions of these learning experiences.
- Phase 2: Reflective surveys and feedback log – The reflective surveys were delivered online in two parts and included both qualitative and quantitative data online questionnaire. Part I was completed by eight students and invited students to evaluate an episode of placement feedback. Part II, completed by one student, invited students to evaluate their feedback experiences whilst on placements including the patterns of feedback experienced during the term, how they engaged in feedback processes (e.g. opportunistic or planned) and how their feedback experiences compared to those on previous placements. Finally students were invited to complete a feedback log, however the uptake of this was poor with no students sharing their completed feedback log.
- Phase 3: Qualitative in depth interviews with student volunteers (n=16) (data collection is ongoing). The purpose of the interviews was for students to share their feedback experiences and to describe their role in the feedback encounter (e.g. how was the feedback process primed? Did they ask for specific feedback about a particular aspect of clinical practice? How effective was the feedback process from their point of view? What strategies will they use during their next placement, or on graduation, to augment feedback processes?)

The Phase 1 and 2 questionnaires were analysed using descriptive statistics for the quantitative data and thematic analysis of qualitative data. Phase 3 data analysis used the framework method approach using the following steps: 1) familiarisation, 2) identifying a thematic framework, 3) indexing, 4) charting and mapping and 5) interpretation (Ritchie and Spencer, 1994). Finally, the findings from each of the data analysis phases were compared, contrasted and synthesised to determine key themes relating to the students' evaluation of the educational intervention.

Key findings

Whilst the data collection and analysis continues, the following key findings have emerged from the preliminary data analysis and synthesis of the three data sets (described above). Broadly, students who engaged in this project described coming to clinical placements without any learning

experiences focused on developing their feedback literacy. The consequence of this lack of preparation was that students often considered feedback to be something which is 'done to them' (feedback as telling) rather than a process which they can lead. In response to the educational intervention, the resultant student learnings related to four key themes:

1. Experiencing 'an awakening'
2. Establishing the student role in feedback processes
3. Addressing vulnerability
4. Improving intersubjectivity

These findings will be described in more detail below with illustrative participant quotes and/or descriptive statistics to illustrate the themes.

Experiencing 'an awakening':

All participants indicated that they had not engaged in any learning experiences, including education sessions, designed to support their understanding of and engagement in workplace feedback experiences. This meant there was a tendency for students to enter workplaces expecting that feedback will occur and it will be 'done to you'. They had limited insight into how they were meant to engage in feedback. The following interview quote illustrates this perspective:

> I just sort of expected it to be handed out to me. (Nursing student 1 - Interview)

The students' responses to their workshop experience were positive with the average rating being 8.8 on 0 to 10 scale (10=most helpful). This finding was confirmed in all interviews. The following quote illustrates that students valued this learning opportunity to learn about feedback processes:

> [The workshop] changed [my] perspective-feedback requires diagnostic strategies that are positive respectful. Engage in a 2way processes (Nursing student 2 – Workshop Evaluation)
>
> I must say I haven't but I thoroughly enjoyed the awakening with the workshop because it was, it was - not a light bulb moment but it was definitely an awakening to go and get it. It's yours, take it. So yes, that was invaluable for me, absolutely and I will take that on with hopefully my graduate year and further because I think we do need to be able to ask for it and understand it and as I say be timely with it. It makes it a heck of a lot easier. (Nursing student 3 – Interview)

The participants indicated that this educational intervention was their first in-depth experience contributing to their understanding of feedback processes. This alone, is important because despite literature indicating that students want more feedback, neither curriculum nor pedagogic approaches within higher education seem to be supporting students' understanding of their role in feedback processes. Given Feedback Mark 2 (Boud and Molloy, 2013) emphasises that feedback is a two-way process of engagement, it is logical that students' development should be supported in an iterative fashion throughout their programs. This curricular recommendation contrasts with usual practice whereby the development of educator skills in feedback provision is prioritised.

Establishing the student role in feedback processes:

Preliminary findings, from both the questionnaires and interviews, suggest the educational intervention contributed to students' understanding of their role in feedback processes. Rather than being passive in feedback processes students were beginning to understand and consider what their role might be when engaging in feedback during clinical placements. Practically this meant that students reported that: 1) they understood their role to be in collaboration with supervisors and 2) they adopted strategies such as self-evaluation, actively seeking feedback from credible sources, setting goals and reflection. Importantly, these findings suggest that when students enacted these roles during their placements, they indicated it was a positive experience and they were receiving more feedback than previous placement experiences. The following quote illustrates the student experience of seeking feedback:

> I was proactive in asking for feedback. So yes, that was very nice because otherwise I would have just waited until the end. It was received well. I basically - after we'd done something 'go how did it go?,

> what do you think?' Yeah, so I was able to get constructive feedback and it was more of - not necessarily just a one way conversation it was a bit more of a two way conversation which was better. Not just hearing it and going okay, going off with it. So that was better. (Nursing student 3 – Interview)

As well as establishing the student role to be one in which they are asking for feedback, findings from the interviews suggested that students were asking for direct feedback on specific tasks or aspects of practice e.g. cannulation and seeking additional opportunities to further develop their skills in relation to the feedback they received. The following quote illustrates provides an example of a nursing student actively sequencing her learning in response to feedback:

> No [normally] you just wait until the task came. Yeah, that's why I had to actually physically ask to do it, like actually looked out for the same sort of problem to deal with. (Nursing student 1 - Interview)

Finally, the evaluation findings suggest that students were highly motivated to engage in feedback processes, once they understood their role, and once they experienced the benefits of meaningful information exchanges. This motivation seemed to be linked to students' highly valuing clinical placements as these experiences are believe to make a significant contribution to their development as practitioners. In these ways, students were motivated to maximise their placement learning through enhanced engagement in feedback processes.

Addressing vulnerability:

During the educational intervention, students were encouraged to share narratives about their experiences of feedback especially in terms of its influence on their emotions. These narratives, also confirmed in the interviews, indicated students' experiences of feedback can be highly emotional ones and in some instances, contribute to negative outcomes. The following quote demonstrates the emotional nature of feedback processes experienced:

> I internalise it and go right, okay, I've been told off or commented on this one so I won't try and do that again, have that in your head or this was good, okay, that's brilliant, I'm going the right way. So definitely I do take it on board…[but]…Go home and cry. (Nursing student 3 - Interview)

These types of experiences meant that students often felt vulnerable when engaging in feedback on placements. Encouragingly, the interview findings suggested that by augmenting students' understanding of learner-centred feedback processes and their role, some of the emotional aspects of feedback were alleviated. Two key strategies employed by the students which contributed to improved feedback experiences were identified. Firstly, students were proactively initiating discussions on feedback and collaborating with supervisors on aspects of practice they require further guidance on (a 'front foot' identification of deficits). In these ways, the students were gaining experience in self disclosure and experiencing the benefits of honing the focus of the supervisor during observation of task performance. Secondly, students were beginning to take responsibility for self-evaluating their performance and asking supervisors to provide specific aspects of practice which they would like feedback on. The students interviewed, indicated that by engaging in feedback in this way, they had greater control over the feedback thus alleviating some of the vulnerability. The following quote illustrates this experience:

> It was, it was a positive - you know, even as I say with slight negatives in there it's positive because you've dealt with it, done and dusted, on the spot, you're not internalising, you're not sleeping on it, you're not thinking oh I don't want to work with that nurse again. You've been a grown up and gone right, how was it, right, didn't do that right, did do that right, fine, let's think about it and move on. It's almost - it's out in the open. It's not hidden. So that's great. So yeah, it really helps. (Nursing student 3 - Interview)

Improving intersubjectivity:

Students, in almost all the interviews, indicated that they had a much greater appreciation for and understanding of the supervisor perspective in feedback. Students demonstrated that enhanced

feedback literacy and engagement was contributing to improved intersubjectivity, that is, shared understanding (Billett, 2014, Rogoff, 1990). This finding, whilst unique, could be attributed to the workshop role play experience where students adopted both the role of feedback provider and receiver. Additionally, the presenter in the workshop presented literature on what educators and what students find challenging about feedback in the workplace. Interestingly, the students acknowledged that providing feedback is likely to be challenging especially without active student engagement. The following quote illustrates this perspective:

> I think when also [the workshop facilitator] said that people actually appreciate that you're actively wanting to be engaged. It's a different kind of feeling. I was like actually that's right. I think people would be because if I was the one teaching someone I would want them to actually ask questions and be proactive and wanting to get better. So I could understand but it was just as a student you're like oh crap we're going into this whole world that - it was good. It was good. (Nursing student 3 - Interview)

These findings might be attributed to the educational intervention, in that, the roles, responsibilities and feelings of the supervisor during feedback processes were shared, role played and discussed with the students. In these ways, the discussions were likely to contribute to students' emphasising the supervisor's role in feedback and assisting the supervisors by giving them permission to be frank and open with their feedback. The following quote provides an example of a student's realisation of the supervisor perspective:

> I know it's hard because if you're the nurse or the NUM or the clinical facilitator and you're expected to give feedback, you don't know how much it will build on that person because you don't know if that's the actual feedback they're seeking (Nursing student 3 - Interview)

Pedagogic and curriculum considerations

The preliminary findings from the evaluation suggest that the intervention contributed to improved conceptual understanding of feedback and enhanced learners' procedural and dispositional knowledge. This emphasises the importance of developing students' feedback literacy and suggests curricular considerations should be made for structuring these learning opportunities. However, the intervention, whilst the alignment to transitioning into placement seemed appropriate for enabling application of learning, was a one-off and there would be further value in sequencing feedback learning throughout the undergraduate curriculum (for example from day one, year one of programs). This approach would likely improve students' engagement in feedback processes related to assessments as well.

Issues arising for discussion

The key issues arising from this intervention include:

- Intervention design problem: Only one party, students, engaged and therefore should we also be engaging the supervisors in an equivalent intervention? Also, when is the best time to enact this intervention e.g. before, during or after placements?
- Whilst findings seem very positive, more evidence is required to further understand the influence the educational intervention had on learners approaches to feedback e.g. observational work or engaging supervisors to determine if students' learning has improved.
- There was limited student engagement with the reflective activities. Can this response be improved with enhanced supervisor engagement or aligning the activities with workplace assessment?
- Broader consideration – the evaluation findings suggest a high uptake and recall of intervention learnings, despite lack of complete engagement with all aspects of the intervention; do we, as educators, tend to underestimate students' ability to integrate conceptual ideas about learning and teaching? Should we be promoting meta-cognition about learning through sequenced

activities that increase in complexity throughout the curriculum? What bearing might this have on the educational skills of graduates supervising the next wave of learners in the workplace?

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Round 2 project reports (2017–2018)

The Round 2 reports presented here are those that were provided by the participants in describing their post-practicum projects, how they were enacted, the issues they encountered and what process and learning outcomes were derived from the project work.

In two instances (projects 1 and 14) a number of smaller subprojects were combined into single projects (Project 1 x4; Project 14 x2).

	Project	Participants	Institution
1	Responding to Feedback at QUT – a post-practicum workshop	Yasmin Antwertinger, Ingrid Larkin, Esther Lau, Erin O'Connor, & Manuel Serrano Santos	QUT
2	Increasing employability through sustainable assessment practices and familiarity with recruitment practices	Rachel Bacon, Jane Kellett, Yui Ting Chan & Jie Yie Yong	Canberra
3	The Development and Evaluation of an Organisational Psychology Postgraduate Competency Trajectory	Christine Boag-Hodgson, Kaitlyn Cole, & Liz Jones	Griffith
4	Integrating career development learning interventions into an exercise science professional practice curriculum: students' perception of understanding and confidence in their employability attributes	Jessica Colliver, Kagan Ducker, & Peter Gardner	Curtin
5	Implementing post-practicum strategies to enhance professional identity and employability in final year physiotherapy students	Susan Edgar, Joanne Connaughton, & Stacy Sutherland	Notre Dame
6	Optimizing Post Graduate Enterprise Skills and Professional Identity Development: Collaborative Workshops in a Google+ Community	Kerin Elsum	RMIT
7	Supporting professional identity and personal resilience in a first semester professional experience course for graduate entry occupational therapy students	Susan Gilbert Hunt, Wendy Cearns, & Susie Owens	South Australia
8	Occupational therapy students preferred method of reflection during a fieldwork placement: video, written or artistic?	Nigel Gribble, & Julie Netto	Curtin
9	Business students' perceptions of completing teamwork as part of post-practicum learning experiences	Y Rachael Hains-Wesson & Kaiying Ji	Sydney
10	AGRIWIL – "Embedding Employability into the Experience"	Julie Harbert, Kelly McDermott, Marnie Long, & Michael Healy	La Trobe
11	Master of Teaching: Developing the first practicum experience	Deborah Heck, Susan Simon, Peter Grainger, Alison Willis, & Julie Karyn Smith	Sunshine Coast
12	Augmenting career development learning and professional identify development through post-practicum interventions	Denise Jackson[1], & Franziska Trede[2]	[1]Edith Cowan, [2]Charles Sturt
13	Developing resilience, self-efficacy and professional identity in allied health students	Abigail Lewis, & Janica Jamieson	Edith Cowan
14	Embedding Clinical Reasoning beyond theory using simulation: Nursing students' rural placements	Fiona Little[1] & Michael Grande[2]	[1]Newcastle, [2]Southern Cross
15	Augmenting public health and environmental health student learning through pre- and post-practicum educational processes	Zoe Murray	Griffith
16	Post-practicum interventions for advancing the professional disposition of postgraduate nursing students	Debra Palesy & Tracy Levett-Jones	UTS
17	Developing personal and professional identity through transformational experiences	Carol-Joy Patrick & Fleur Webb	Griffith
18	Post Practicum Debriefing: putting the 'wise' into wise practice within university-led work-integrated learning projects	Faith Valencia-Forrester	Griffith
19	Listening Circles for Journalism Placements	Alexandra Wake, & Kristy Moore	RMIT

Responding to Feedback at QUT – a post practicum workshop

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Abstract

Introduction: Feedback is an important part of the learning experience. However, there is often a difference in the understanding of expectations between practicum supervisors and students when it comes to feedback. Students often do not recognise feedback when it is given, or they do not know how to / may not have confidence to seek feedback. Finally, even if feedback is received, students may not action / respond to the feedback – rendering the feedback to be meaningless in terms of the student's growth and learning experience.

Aim/Objectives: The aim of this project is to explore the impact of a post-practicum workshop, on how students at QUT: 1) recognise feedback, 2) seek feedback, and 3) respond to feedback. "Practicum" is defined as a work integrated learning experience (WIL) e.g. practicums, placements, internships.

Methods: A post-practicum face-to-face workshop about feedback and resilience was developed with assistance from QUT's Students Success Group - Career Development and Engagement team. Data was collected from students through either online or face-to-face surveys pre- and post-workshop. Descriptive statistics and thematic analysis was used to analyse the data, to compare the influence of the workshop on student perception and understanding of feedback and resilience in coping with negative feedback.

Results: The workshops were delivered 4 times to over 100 students. The workshops were useful and well received across the disciplines. The workshops were rated more slightly more highly by 2nd year students. However, the majority of students across all cohorts indicated that they found the workshop helpful, relevant and useful in helping them to think about opportunities for feedback as well as providing tools to seek, receive, learn from and apply feedback.

Large numbers of students select the neutral option when asked to reflect on stress, hard-times and dealing with stress.

Conclusion: In augmenting the way students seek, accept and respond to feedback, the aim is to facilitate a more meaningful mentoring relationship between preceptor and student. While the intention of the post-practicum workshop was to contextualise student development, and consolidate student understanding of their experiences and learning while on practicum, it was evident that a single workshop post practicum was inadequate for achieving this purpose. This pilot study provided valuable insight on the value of augmenting student perceptions of feedback and resilience. Future work is continuing to investigating the usefulness of implementing a pre-practicum workshop on introduction to seeking and utilising feedback, in addition to the post-practicum workshop to consolidate this learning with their practicum experience.

Brief description of academic area and students involved

The project was undertaken at QUT, involving students enrolled in a suite of practicum units across health and business disciplines (Table 1). The students across the disciplines were enrolled at different stages of their programs of study, and had different arrangements in terms of time spent at their practicum sites. To account for the different practicum arrangements, the face-to-face workshop was conducted within two weeks of students completing their practicum experience. The pre-workshop survey was always disseminated up to one week before the post-practicum workshop, and the post-survey at the end of the workshop. Participation in the workshop, and pre- and post-surveys were encouraged, but not enforced.

Table 1 *Student program of study, and practicum experiences*

Program of study	*Year level*	*Time at practicum*
Health		
Pharmacy	2nd year (4 year course)	3hrs/wk over 8 weeks (24hrs total)
Pharmacy	4th year (4 year course)	150 hrs (4 x 5 day weeks)
Psychology	3rd year (3 Year course)	50 hrs
Business		
Advertising, international business, marketing and public relations	3rd year (3 Year course)	120 hrs

Particular purpose

Practicum experience is a valuable learning experience for students, as it allows immersion into real world learning experiences, and allows students to put into practise, the knowledge and skills they acquire in the classroom. As part of this experience, feedback from practicum supervisors is an integral part of the student learning experience.

Previous research has shown that there is often a difference in the understanding of expectations between practicum supervisors and students when it comes to feedback.

Reflection is often touted as a key strategy for effective learning and being important for developing students into reflexive work-ready graduates. However, when many students hear the word 'reflection', they think that academics expect them to write a deep and meaningful 'dear diary' submission. They write what they think the academics want to read, as opposed to participating in a meaning reflective experience.

Students are faced with numerous challenges in university, for example a lack of academic support, sometimes making it difficult to persist.(1) However, in an academic environment that instils growth mindset, students can learn to persevere. In the last decade, research has shown that students' growth mindset (explained as the believe that intelligence can grow through practice and effort) has a direct influence on their grades.(2) Additionally, teaching students to have a growth mind-set not only improves their grades (2), but also helps those students to have significant better scores than those with a fixed mindset who believe that intelligence is inborn and unchangeable.(3)

A crucial task for educators is to prepare students to respond resiliently when challenges in university arise for students. Although limited research is available on the links between Growth mindset and resilience, there is clear indication that in order to create resilient students, it is essential to promote those mindsets that represent challenges as opportunities to grow over time with effort, new strategies, learning, and feedback from others. (4)

Enacted post-practicum interventions

The post-practicum workshop was about growth mindset as developing a growth mindset would help students to contextualise their development as a student learner and consolidate understanding of their experiences and learning while on practicum. We elected to use face-to-face workshops because we could engage the students in a more meaningful and interactive way, compared to an online intervention.

Each workshop ran for one-hour, and was contextualised for each student cohort using examples specific to their area of study, but the resources e.g. PowerPoint slides, and learning objectives of the post-practicum workshop were the same:

- Recognising feedback (even when it is not explicitly identified as feedback)
- Clarifying utility of feedback
- Building professional skills to ask for feedback
- Building resilience for receiving negative feedback
- Using feedback for learning and development

The workshop facilitators were member(s) of the core research team, but outside of the students' discipline. As the workshop was likely to benefit all students enrolled in the units, all students enrolled

were invited to be a part of the workshop, regardless of whether they complete the pre- and post-workshop surveys.
It is recognised that it would be impossible to change a student's perception of feedback and growth mindset after a 1 h workshop. However, we wanted a pre- and post- workshop survey to compare the influence of the workshop on student perception and confidence about 1) recognising feedback, 2) seeking feedback, and 3) responding to feedback.
The pre-workshop survey investigated students' perceptions of feedback and stressful times.
Questions included:
Open ended question:

- *Please define feedback:*

Demographics questions:

- *Before starting this unit, have you completed any unpaid work experience, placement, practicum or volunteering, relevant to your course?*
- *Please provide a brief description of the type and total length of experience (unpaid work experience, placement, practicum or volunteering) relevant to your course.*
- *Before starting this unit, have you been engaged in any paid employment, which is relevant to your course?*
- *Please provide a brief description of the type and total length of experience (paid employment) relevant to your course*

Likert-scaled questions

- *I am very comfortable asking supervisors for feedback*
- *I enjoy finding ways to improve*
- *I ask for feedback about my academic or professional work regularly*
- *I find it difficult to receive negative feedback*
- *I tend to bounce back quickly after hard times*
- *I have a hard time making it through stressful events*
- *It does not take me long to recover from a stressful event.*
- *It is hard for me to snap back when something bad happens.*
- *I usually come through difficult times with little trouble.*
- *I tend to take a long time to get over set-backs in my life.*

The post-workshop survey investigated students' perceptions of the workshop:
Questions included:
Open ended question:

- *Feedback is…*

Likert-scale

- *This workshop was helpful*
- *This workshop was relevant to me*
- *This workshop provided tools and tips I can use to seek feedback while on placement*
- *This workshop has helped me to think about opportunities for feedback while on placement*
- *This workshop has provided me with ways to receive negative feedback while on placement*
- *This workshop has provided tool and tips for learning from and applying feedback*

Data gathered and analysed

Pre- and post-workshop surveys

- Likert scales were used to measure student agreement with statements relating to recognising, seeking, and responding to feedback e.g.
    - I am confident in my ability to recognise feedback.
    - I know how to recognise feedback even when it isn't explicitly identified as 'feedback'.
- Open-ended / free text questions were used to explore student perception of 'feedback' e.g. describe / define 'feedback' in your own words – what does feedback look like to you when you are engaged in a WIL activity?

A total of 94 students completed the pre-workshop survey, while 58 completed the post-workshop survey (Table 2) This represents approximately 70% of the students in attendance (academic observations). Descriptive statistics and thematic analysis was used to analyse the data, to compare the influence of the workshop on student perception and understanding of feedback and resilience in coping with negative feedback.

Table 2 *Number of respondents to pre- and post-workshop survey from each cohort*

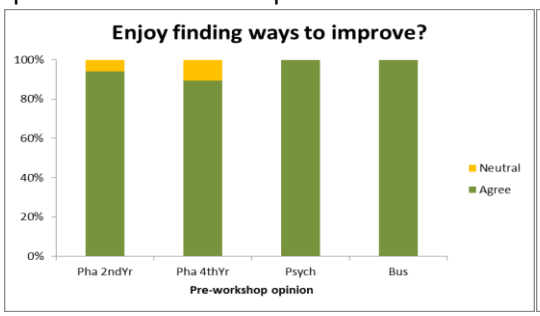
Area of study	Yr Level	Number of respondents*
Psychology	3	pre-workshop = 24 post-workshop = 22
Pharmacy	2	pre-workshop = 31 post-workshop = 11
	4	pre-workshop = 23 post-workshop = 16
Business	3	pre-workshop = 16, post-workshop = 9
Total	Pre Post	94 58

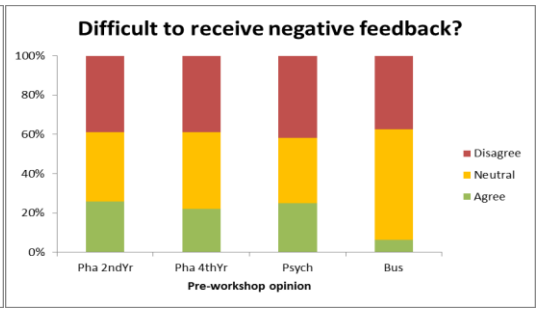
*approximately 70% of students in attendance completed the pre-survey while ~40% for the post survey.

Results from Pilot

Pre- workshop survey

In general majority of students from all 3 disciplines expressed the opinions that they "tend to bounce back" after hard times and that "it did not take them long to recover (Figure 1C and D, although the pharmacy 4th years did have a greater proportion of students who disagreed with these statements.
All Psychology and Business students agreed that they enjoyed finding ways to improve, while small proportion of Pharmacy students in both years selected the neutral option. For the 4th year pharmacy students this represented 11% while 6% of the 2nd year students were neutral to this question (Figure 1A).
Pharmacy cohorts surveyed also had fewer students agree to the statement "it takes me a long time to get over set-backs in my life"; with 23% of second years and 11% of the 4th year cohort in agreement.
Interestingly the pharmacy students did not express the opposite opinion either, resulting in the majority of pharmacy students selecting the 'neutral' opinion.
This is in contrast with opinions on the statement "it is hard for me to snap back when something bad happens" in which all four cohorts had approximately half of the students disagree, a quarter agree and a quarter have neutral opinions.





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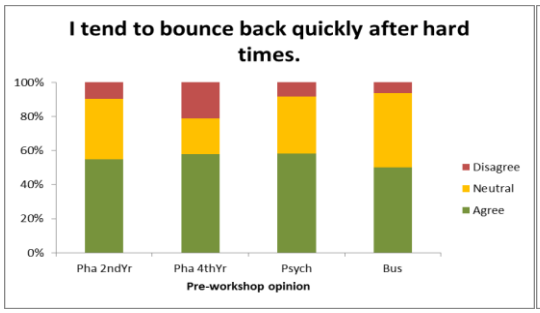

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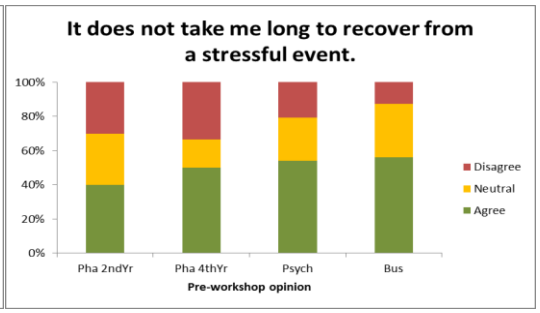

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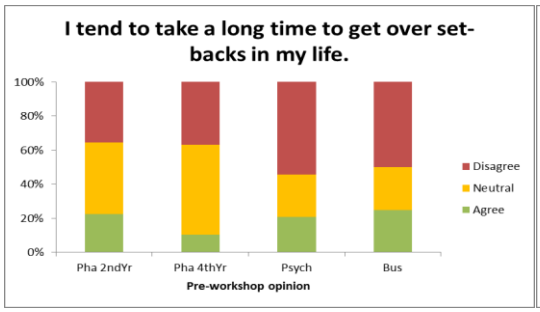

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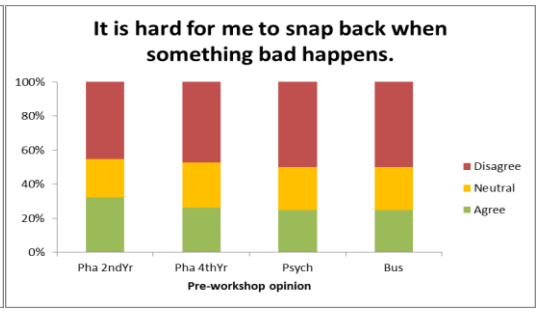

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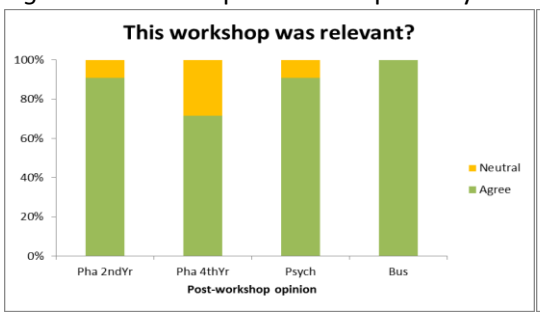
Figure 1. Selected pre-workshop survey results



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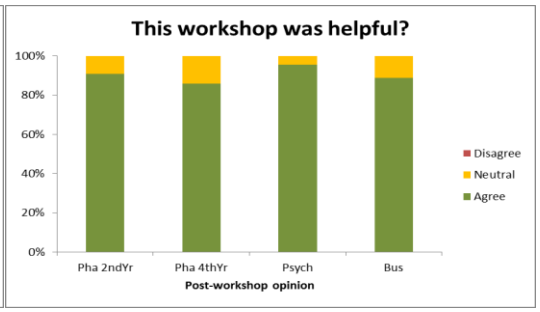

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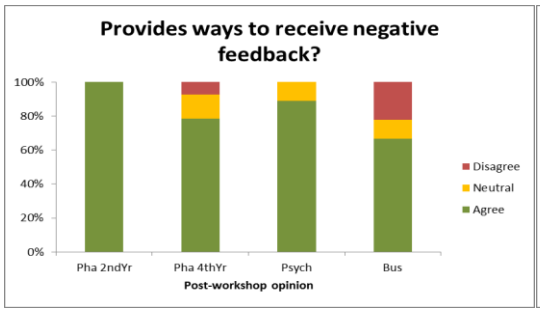

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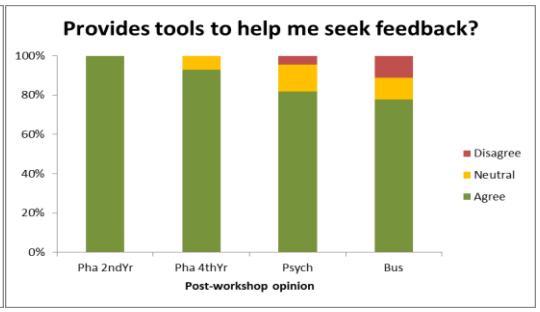

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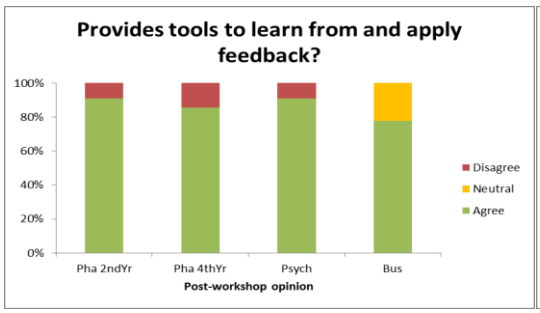

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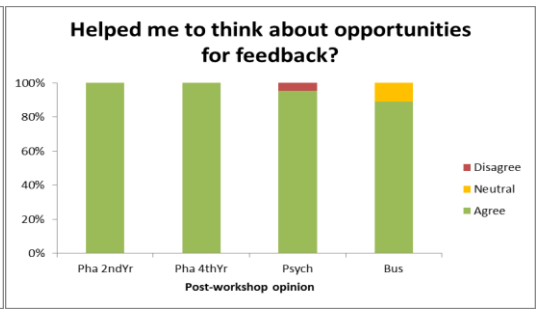

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Figure 2. Selected post-workshop survey results

Post- workshop survey

Greater than 90% of all students completing the post-workshop survey agreed that the workshop was helpful and relevant with the exception of pharmacy 4th year students, where this was slightly lower at ~80% agreement that "it was helpful" and greater than 70% agreeing that "it was relevant". The rest of the responses from all cohorts were neutral on these 2 questions (~10% for pharmacy 2nd yr, psychology and business) with no students disagreeing (Figure 2 A and B).

When asked if the workshop 'provided ways to receive negative feedback' and 'tools to help seek feedback' 100% of pharmacy 2nd yr students agreed (Figure 2 C and D). The majority of students in the other three cohorts also agreed that the workshop "provides tools to help me seek feedback" ranging from 78% of business students to 93% of pharmacy 4th years. 5% of psychology and 11% of business students disagreed with this statement, while the rest of responses were neutral. The business cohorts also had the largest number of students disagreeing with the statement "this workshop provides ways to receive negative feedback" with 22%, followed by 7% of pharmacy 4th yr students also disagreeing. In all cohorts of students (other than Pharmacy 2nd yrs) 11-14% of students were neutral on this statement.

When asked whether the workshop 'provided tools to learn from and apply feedback' ~90% of psychology and pharmacy students (both years) and 78% of business students agreed. The remaining ~10% pharmacy and psychology students disagreed while the 22% of business students were neutral to the question (Figure 2E).

All pharmacy students, 95% of psychology and 89% of business students completing the post-workshop survey agreed that the workshop 'helped me to think about opportunities for feedback'. The remainder of Psychology students disagreed, while the rest of the business students were neutral on the question.

Key findings

- The workshops were useful and well received across the disciplines.
- The workshops were rated more slightly more highly by 2nd year students. However, the majority of students across all cohorts indicated that they found the workshop helpful, relevant and useful in helping them to think about opportunities for feedback as well as providing tools to seek, receive, learn from and apply feedback.
- Large numbers of students select the neutral option when asked to reflect on stress, hard-times and dealing with stress.
- Staff in the creative industries faculty at QUT, who learned about the project through the higher education and research network, have openly expressed interest in including these workshops in their Work Integrated Learning (WIL) subjects.
- We have included a resilience scale in the next phase of the study as we recognise the role that resilience plays in feedback seeking and application. We would like to investigate how resilience may play a role in ability to deal with feedback.
- We are applying the use of a growth mindset module to potentially improve the students' ability to receive feedback.
- We are hoping to build student resilience through helping them to recognise, seek, and respond to feedback.

Discussion

- Usefulness of having an additional pre-practicum workshop to clarify and equip students with confidence and tools to seek and respond to feedback, and to apply feedback. This would be followed by the mid- to post-practicum workshop to 'touch base' with students, and to consolidate learning from the pre-practicum workshop so students still have the opportunity to implement learnings whilst on practicum.
- Timing of the post-practicum workshop to get students engaged, particularly if they have competing interests e.g. other assessment to complete. Similarly, this was reflected in the differing response rates of the post-workshop survey.

- Facilitating student participation in meaningful reflection about their learning experience, without actually calling it “reflection”.
- How students receive and respond to feedback is related to their resilience, and if they have a closed or open mindset.
- Accounting for confounders e.g. experiences and life events that would also contribute to students developing resilience and attitudes toward feedback and growth mindset – not just practicum experience.

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Increasing employability through sustainable assessment practices and familiarity with recruitment practices

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Abstract

Sustainable assessment practices are recommended to enable graduates to be work-ready. In 2016 a programmatic model of competency-based assessment was implemented within a post-graduate dietetics course. The aims of this study were: (1) To measure the graduate outcomes and student employability skills of students who participated in the model; and (2) To evaluate the experiences and satisfaction of worksite educators with the second iteration of the model including the online resources. With ethics approval (HREC 16-74), all stakeholders were invited to complete survey instruments including: (1) A 31-item pilot-tested purpose-built telephone survey for graduates (n=29); (2) A 18-item validated 7-point Employability Impact Scale (EIS) for final year students (n=23); and (3) A 17-item pilot-tested purpose-built online questionnaire, that incorporated the EIS, for worksite educators at all 16 placement sites. Response rates of 62%, 78% and 20% were achieved respectively. Educators had implemented the model as intended by the university and reported the online resources as supportive (satisfaction score x=7.4/10, σ=1.0). Both the final year students and educators felt the model developed students overall employability skills (Employability Impact Scale educators x=5.5/7, σ=1.0; students x= 6.0/7, σ = 0.9). Of the graduates 94% were employed within 12 months with dietetics roles or related positions, with all agreeing the model had assisted in their preparation for the workforce. Of the students 79% felt the online resources adequately prepared them for placement. All stakeholders made further recommendation to further improve the model. This research provides evidence that sustainable outcome-based assessment practices can assist students in their transition to the workforce. Online resources provide by the University were valued by stakeholders to support them in their implementation of the model.

Brief description of academic area and students involved

Academic area: Postgraduate; Nutrition and Dietetics

Students involved:

- Graduates 2015-2016 cohort (n=29)
- Final year students 2016-2017 (n=23)

Other participants:

- Worksite educators from placement sites participating in the 2016-17 professional placement program (16 sites; ~ 50 dietitians working across these placement sites)

Particular purpose

Problem being addressed:

While there has been continued growth in the Nutrition and Dietetics workforce,[1] the types of positions available to new graduates have changed from hospital based position to new growth areas including private practice, community and ambulatory care, and e-health services.[2] As such, universities must ensure their graduates are equipped with the capacity to learn and adapt to the new workforce demands; to be critical thinkers, transformative practitioners and life-long-learners.[3]

What is being done:

In 2016 a new interpretivist programmatic '*Consensus Model'* of competency-based assessment was developed, implemented and evaluated at the University of Canberra.[4]
The evaluation showed the model:
(1) Supported sustainable assessment practices. Sustainable assessment practices are characterised by:

i. A shared understanding of performance standards;
ii. Moderated self-assessment (including qualitative assessment tools) used as a catalyst for future development; and
iii. The opportunity to practice and transform learning across a variety of context.

(2) Required students to take more control over their learning, facilitating open communication and a more supportive learning environment. The worksite educator was encouraged to adopt the role of 'coach' rather than 'assessor' *yet, the extent to which the model was adopted was variable across settings.*
(3) Provided a fair way to assess competence. The model used a programmatic approach to assessment using authentic tasks mapped across a course of study that are:

i. Formatively assessed against outcome focus criteria (such as competency standards) as a catalyst for learning; and
ii. Used to develop a longitudinal body of evidence (such as a portfolio) to inform the *high stake* summative judgement of competence that is made by a panel of experienced assessors.

Both students and educators commented that they felt the panel process (portfolio and interview) helped to better prepare the students for workforce recruitment practices. *Student employability and graduate outcome data is, however, needed to support this finding.*
There were many suggestions from worksite educators and students to improve the *Consensus Model*. Given that the system was very different to what had been used previously, *more training and resources were requested.* In 2017, a second iteration of the model was implemented.
This project aims:
(1) To measure the graduate outcomes and employability of students who participated in the *Consensus Model;*
(2) To evaluate how worksite educators implemented the second iteration of the model; and
(3) To evaluate stakeholder satisfaction (worksite educators and students) with the online resources and supports provided to support the delivery of the model.

Enacted post-practicum interventions

The '*Consensus Model'* required students to:

(1) Use critical dialogue with their worksite educator in a post-practicum reflective practice meeting to develop goals and strategies to target their learning and development for their subsequent placement experiences.
(2) Participate in authentic assessment tasks that align with employer recruitment practices to improve their employability including:
    a. Develop a professional e-portfolio
    b. Participate in a panel interview
    c. Attend a careers workshop

This project provided online supports and resources to optimise the benefits of the *Consensus Model* that included completed exemplar forms and videos for the reflective practice meetings. The videos were developed using a co-design model with input from practice educators and students.
This intervention is consistent with the preliminary findings of the student survey and the 2016 post-practicum interventions as follows:
The reports from the post practicum student survey suggested that students prioritise post practicum experiences that:

(1) Focus on their particular occupation;
(2) Are concerned with their performance in the workplace;

(3) Can lead / assist them to being more employable.

The 2016 post-practicum interventions[5] suggest that:

(1) Students highly value experiences that are authentic and directly relevant to their current situation (Williams et al. 2017; Clanchy et al. 2017).

(2) Reflection is a key strategy for effective learning in the workplace (Harrison et al. 2017).

(3) Students require an opportunity to debrief, ideally with a more knowledgeable other (Sweet et al 2017).

(4) Focused conversations need to challenge learning and not just be descriptive of experiences (Sweet et al 2017).

(5) The role and performance of the facilitator is vital to effective reflective conversations (Sweet et al 2017).

Structure guidance and examples can improve the quality of and depth of reflective activities (Sweet et al 2017).

Data gathered and analysed

Data was obtained and reported independently from all stakeholders (graduates, final year students and worksite educators) and then discussed together to provide a more holistic evaluation of the post-practicum interventions. Ethics approval was obtained from the Human Research Ethics Committee (HREC 16-74) for all three studies. Participation was voluntary and participation implied consent. Anonymity of respondents was maintained.

Study 1 - Graduates: In September, all 29 graduates from the 2015-16 cohort of the Master of Nutrition and Dietetics course were invited via email to participate in a telephone survey. The survey instrument was based on a purpose-built survey that had been used in a previous research study to determine the graduate outcomes for students enrolled in the same Master of Nutrition and Dietetics course from 2010-15 (Bacon R, Nyamayaro M, Kellett J, 2016). Four additional open-ended questions were added to explore whether the new *Consensus Model* had better assisted the graduates in their readiness for the workforce. These questions were tested with two graduates from the 2014-15 cohort with minor modifications made to improve readability. In final survey included 31-items (19 open-ended and 18 close-ended questions). A descriptive approach was used for all data analysis with open questions categorised and counted.

Study 2- Final Year Students: Following their assessment panel and careers workshop, all 23 final year students (2016-17 cohort) were asked to complete a written survey that included an18-item validated 'Employability Impact Scale (EIS)' that used a 7-point *Likert* scale to self-assess work readiness pre and post placement. Given the small population size, ordinal data and matched pairs, the Wilcoxon Signed Rank nonparametric statistical text was used to measure the difference in the students' employability after participating in the *Consensus Model.* In addition, the students were asked whether they felt the online resources adequately prepared them for their placement program.

Study 3 -Worksite Educators*:* In November 2017, the primary contact at all placements sites (n=16) was emailed details and a hyperlink to an online survey. This educator was then asked to re-distribute the survey to all dietitians in their worksite who had previously been involved in the dietetics placement program in 2017 (n=50). The self-administered questionnaire using *Qualtrics* (*Qualtrics*, LLC, Sydney, Australia, 2017) was developed through an iterative process of discussion with two researchers, based on the placement guideline resources provided by the University. The survey instrument was piloted with two external experienced educators, to limit question ambiguity and increase face validity with revisions made to capture all relevant information. A mixed-method design was adopted with a combination of qualitative (n=5) and quantitative (n=12) questions. The questionnaire comprised of three parts including: (1) Demographic data about the worksite educators' settings [3 questions]; (2) Educators' experiences with the reflective practice meetings and perceived effect on student employability incorporating the *EIS* [7 questions]; and (3) Evaluation of the accessibility and efficacy of the online placement support resources [7

questions]. A descriptive approach was used for all data analysis with open questions categorised and counted.

Key findings

Study 1 – Graduates (17/29 – response rate 62%):
Within 12 months, almost all graduates (94%; n=16/17) were employed (x = 34 hours/week) reporting positions as a dietitian (n=14) or in a related area (n=2 nutrition assistant/nutrition education; research assistant). Dietetic work settings included: private practice n = 9; community/indigenous health n = 2; hospitals n = 4; government n = 2; and tertiary education = 3). Half of the graduates (n =7) had more than one job, although in three cases this second job was in an unrelated area (n=1 education; n=2 pharmacy). Graduates work in the ACT (n=7), NSW (n=5) and Queensland (n=2). All students felt the professional placement experiences had helped them to be job ready for their dietitian positions, emphasising how the sustainable assessment approach had supported their: (1) familiarisation with the professional competency standards, (2) self-assessment and life-long learning practices; and (3) articulation of relevant capabilities to future employers. In particular, the students acknowledged the benefits of the competency-based tracking system, the reflective practice meetings, the e-portfolio and the panel interview. All graduates felt the course adequately prepared them for the workforce, listing the following aspects as directly useful in their current roles: (1) communication and counselling unit (n=10); (2) placement and internship units particularly noting the acute, outpatient and community settings (n=8); (3) clinical dietetics units (n=6); (4) research unit (n=2); (5) group assessment tasks (n=1); and (6) the Meal Mates clinical preparation program (n=1). The graduates spoke very highly of the course but also identified a number of areas for improvement including: (1) strengthening the clinical course to incorporate more content on mental health and bariatric surgery (n=2); (2) strengthening the indigenisation of the program (n=1); (3) earlier orientation to the acute setting prior to placement (n=2); (4) an increased emphasis on inter-professional collaborative practice (n=1); and (5) more direct instruction on writing selection criteria and developing networking skills (n=3). One student also reported the panel experience to be overly stressful.

Study 2 – Final Year Students (18/23 - response rate 78%)*:*
The final year students perceived the model to support their employability development (EIS Scale post practicum x = 6.07/7, σ = 0.86). A significant difference was found in the students' employability, as determined by the EIS pre and post practicum experiences (z = -2.93396 p=0.00328; W=18 where W for N = 18 at $p \leq 0.01$ is 27). Of the students who responded (n=14/18) 79% found that the online resources adequately prepared them for placement when used in conjunction with the face-to-face workshop. Of the remaining three students, one reported the online resources as only supplementary and two reported an inability to access these materials.

Study 3 – Worksite Educators (10/50 – response rate 20%)*:*
The educators were from ACT (n=6), NSW (n=2), Victoria (n=1) and Northern Territory (n=1), covered the domains of Medical Nutrition Therapy (n= 6) and Public Health Nutrition (n=4) and provided placements for 61% of students (n=14/23). Educators had implemented the model as intended, ranking a supportive environment (x=6.63/7), moderated self-assessment/reflection of competence (x=6.625/7), and developing future learning goals and strategies (x=6.50/7) as the most important elements of the reflective practice meeting. Educators perceived the model as supporting students' employability development (EIS x=5.5/7; σ = 1.0) although some students were less engaged limiting the benefits of the student-driven approach. The educators reported the online resources as adequately preparing them for placement (satisfaction score x=7.4; σ = 1.0) identifying readability (n=3), ease of navigation (n=3), examples of completed forms (n= 2) and the inclusion of timelines (n=1) as particularly helpful. Further improvements including increased access and utilisation of the online resources are required.

Conclusion*:*
This research provides evidence that supports the use of sustainable outcome-based practices to assist students in their transition to the workforce. Both the final year students and educators felt the model

developed students' overall employability skills (EIS educators x=5.5/7, σ=1.0; students x= 6.0/7, σ = 0.9). Of the graduates, 94% were employed within 12 months with dietetics roles or related positions, with all agreeing the model had assisted their preparation for the workforce.

Educators had implemented the *Consensus Model* as intended by the university. They augmented the students' practicum learning experience by engaging with them in critical dialogue. These reflective practice meetings enabled the students and educators to develop a shared understanding of the professional competency standards, supported them to reflect on their practice, moderated their self-assessments and supported them to develop future goals and strategies.

Online delivery of placement resources transcends geographically and time constraints and has been shown to be more accessible to worksite educators in rural or community-based settings.[7] In this research the educators (satisfaction score x=7.4; σ = 1.0) and students (79%) found the online resources to support the delivery of the post practicum experiences.

Due to the case study research design these results cannot be generalised. With the low response rates, particularly for Study 3, these results should be viewed with caution. Further research is now required to explore the perceptions of employers of the work-readiness of the graduates who have engaged in this model.

Discussion

- This research provides evidence that sustainable outcome-based assessment practices can assist students in their transition to the workforce.
- A key consideration when using critical dialogue, as a means to support students to engage in effective reflection, self-assessment and goal development, is ensuring that worksite educators/facilitators are adequately prepared.
- Online resources can support the delivery of effective post-practicum interventions. Issues of access and utilisation required further attention in this instance
- The use of learning experiences to increase employee recruitment practices (e-portfolio, panel and careers workshop) were highly valued by all stakeholders (students, graduates and worksite educators). In this example, there was an identified need for more specific instruction on the writing of selection criteria and the development of networking skills. This has been incorporated into the 2018 iteration of the model.

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The Development and Evaluation of an Organisational Psychology Postgraduate Competency Trajectory

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Abstract

The recognition of competency testing, in place of aptitude or intelligence ability, as a predictor of performance originated in the 1970's (Mirabile, 1997). The current competencies to be attained during the practicum component of a postgraduate organisational psychology program include seven core competencies specified by the Australian Psychology Accreditation Council (APAC, 2010). Students undertake a minimum of three successive practicums totalling 1000 hours, in combination with coursework and a dissertation, preparing them for registration as a psychologist.

The purpose of this research was to develop a tool that would assist postgraduate organisational psychology students in reframing their approach to their successive practicums and ultimately the workplace. The tool needed to articulate the competencies students develop while on practicum, that then transfer to employment after graduation. The project evaluated three models to assess student competency while undertaking practicums.

Practicum stakeholders participated in semi-structured interviews: 17 were postgraduate students who had commenced at least one practicum course during the period of 2016 to 2017, and 16 participants were supervisors who had/were supervising students on practicum during the same period. Thematic analysis (Braun & Clarke, 2006) was used to analyse the interview findings. Seven key themes emerged in relation to the implementation of a competency model:

- Usability
- Social desirability
- Validity
- Level of detail and range
- Not assessed component
- Inter-rater reliability and subjectivity
- Constructive feedback

These themes lent themselves to a number of recommendations to inform the new competency assessment model for assessing students on each successive practicum. The new model is currently being validated for implementation.

Interview findings also confirmed the need for a tool that enables students' competency development to be tracked over their practicum progression. Preliminary feedback on this competency trajectory tool is extremely positive regarding the benefit it is providing to students and supervisors alike for post-practicum employability.

Brief description of academic area and students involved

Practicums for postgraduate organisational psychology students are strictly regulated by APAC, in conjunction with the Psychology Board of Australia (PBA). Students are required to undertake at least 1000 hours of practicum activity and 134 hours of supervision (7.5 hours activity: 1 hour supervision), typically undertaken as four 250 hour practicums during their Master of Organisational Psychology or PhD (Organisational Psychology) program. Student participants were at different stages in the program, ranging

from their first to last practicum. Supervisors were from a variety of organisations offering a diverse range of practicum opportunities.

Particular purpose

The purpose of organisational psychology postgraduate practicum training is to ensure students acquire the necessary skills based competence prior to entry into the workforce and registration as a psychologist with the Australian Health Practitioners Regulation Authority. With practicums comprising 25% of the Griffith University postgraduate organisational psychology program requirements, it is imperative that the mechanisms used to assess competence are valid and reliable, while also being sufficiently robust to adapt to the wide variety of practicums that can be undertaken throughout a student's candidature, given the breadth of the field of organisational psychology practice. Practicum examples include interpreting psychometric assessments of candidates for recruitment purposes, corporate coaching, rehabilitation management, human factors assessments, training needs analysis and facilitation, program implementation and evaluation, and culture interventions such as equity and diversity initiatives, safety culture initiatives, and team building programs.

The organisational psychology program at Griffith University assesses students on the seven APAC (2010) core competencies:

- Knowledge of the discipline
- Psychological assessment
- Intervention strategies
- Research and evaluation
- Oral communication skills
- Written communication skills
- Ethical, legal, and professional matters

The current tool used to evaluate student competence was identified as lacking in a number of ways. Most importantly, it failed to provide students with the opportunity to track their competency development over consecutive practicums. Practicums are undertaken independently rather than for successive competency development across practicums. To this end, the skills developed on practicums are often overlooked in how they relate to the core skills required by psychologists practising in the field of organisational psychology. The purpose of engaging in this project was to identify a methodology for evaluating student experiences in practicums that could be transferred to their successive practicum experiences, and eventually transferred to their future workplace. A tool that could be used by consecutive supervisors to assess student development over practicums would facilitate the supervisory relationship and enhance each practicum experience for students. Such a tool would also identify areas for continued professional development and life-long learning after the 1000 hours of practicum activity have been successfully completed, as professional development is a mandatory requirement of psychologist registration after graduation (PBA, 2015).

The tools for assessing competency should meet the criteria of validity, reliability, feasibility and acceptability to all stakeholders (Masters & McCurry, 1990). After reviewing the research on recommended competency models, three different models for assessing competency were evaluated by participants: the current Likert rating scale, a pass-fail rating and Miller's pyramid model. Analysis of the interviews identified clear strengths and weaknesses of each model.

Enacted post-practicum interventions

We developed a new competency evaluation tool to gauge student capability prior to practicum, and re-assess student capability upon completion of each successive practicum. The ability to reliably and validly assess student performance at the end of each practicum enables students to be better assigned to successive practicums, maximising the learning opportunities for students during their multiple practicum experiences. A better understanding of the student's skills and expertise during practicums will also enable

the student to identify what type of work is best suited to their competency strengths, potentially enhancing job satisfaction and performance.

The tool was formulated based on the psychology competencies (APAC, 2010) and provides sufficient detail to enable students to have an effective learning plan across their practicums, as well as informing their post-graduation learning plan, which specifies areas of need and targets for professional development, and is required after graduation for ongoing registration as a psychologist (Psychology Board of Australia, 2015). The tool also assists with job applications, by better matching the preferred industry skill set to the skills the student has demonstrated and enhanced while on practicum.

Data gathered and analysed

The research team received approval from Griffith University's Ethics Committee (2017/522) to conduct the evaluation. Interviews were conducted from September to October 2017. To maximise stakeholder participation, continued attempts were made to reach both students and supervisors, after reaching saturation.

Fifty-nine stakeholders were invited to participate in interviews, of whom 33 participated. Due to changes in the way practicum management in 2016, students who had completed practicums prior to 2016 were excluded. Supervisors interviewed were approved to provide practicum supervision, with 50% of interviewed supervisors also holding endorsement in Organisational Psychology.

Semi-structured interview questions regarding the participants' perceptions and experiences of the end of practicum evaluation rating scale currently implemented in organisational psychology practicum courses were asked. Participants were also presented with alternative models and asked to identify the strengths and weaknesses of each. Sample interview questions included:

- How should competencies be addressed?
- What would be strengths and limitations of each measure presented?
- Is there room for improvement of the presented measures?

Interview notes were collated into a spreadsheet and analysed using thematic analysis to identify seven themes (Braun & Clarke, 2006). The data was analysed separately for each of the three models, and then the comments for students and supervisors were compared for each model.

Key findings

A number of deficiencies had already been identified within the competency evaluation tool previously used for organisational psychology postgraduate student practicums. The current research identified students' three key perceived value additions of a post-practicum intervention: to secure feedback on a student's workplace experience; to inform choices about career, work options or specialisations; and identification of how these experiences can increase a student's employability. Aligned with these findings, students also indicated a strong preference for the timing of any post-practicum intervention to continue to be after each practicum experience, with the potential to provide an indication of competency development over time (across their three or more practicums).

All stakeholders agreed that the tools for assessing competency should meet the criteria of validity, reliability, feasibility and acceptability (Masters & McCurry, 1990). The evaluation sought to identify an appropriate model of competency for organisational psychology postgraduate practicum students, which both meets APAC (2010) criteria and addresses student needs. The models examined were:

Likert rating scale: Likert scales help to establish the importance of a particular competency, the proficiency level for each competency, and the level of competence demonstrated by an individual. However, they tend to produce ratings that cluster around the middle or above the middle of the scale range, a central tendency bias (Albaum, 1997). Likert rating scales are limited

in how they can differentiate performance levels. The current practicum competency evaluation tool utilised a Likert rating scale.

Pass-fail rating scale: Despite criticism that a pass-fail grading model results in students reducing their effort to the minimum level required, numerous papers mitigate these concerns by presenting evidence that after implementing a pass-fail grading model, students consistently did not decrease their effort or motivation (Friemuth, 1970). The pass-fail rating integrates the assessment of competencies with the current Griffith University organisational psychology postgraduate practicum course grades, which also adopt a pass-fail approach, awarding either a 'non-graded fail' or a 'non-graded pass'. This approach holds merit as it streamlines the course.
Miller's pyramid model: The framework for assessing competence proposed by Miller utilises a scientist-practitioner model and embraces the transfer learning theory, emphasising the important role of reflection in allowing students to put theory into practice and transition their skills successfully across different contexts (Yashin-Shaw, Buchridge, Buckridge, & Ferres, 2004).

Findings from the interviews identified seven key themes regarding what a competency evaluation tool needs to demonstrate: usability, social desirability, validity, level of detail and range, not assessed component, inter-rater reliability and subjectivity, and constructive feedback. The new competency evaluation tool (see Table 1) will be used to assess student performance on each of the seven psychology competencies at the commencement and end of each of the practicums during their candidature.

Table 1 *Postgraduate Organisational Psychology Competency Evaluation Tool*

Assessment Rating	Description
Not adequately assessed	The scope of the practicum and the supervision discussions did not allow for a valid assessment of this competency.
Knows Not Yet Competent	The student demonstrates basic knowledge and limited understanding of the application of knowledge to practice in some contexts.
Knows how Competent	The student can demonstrate the application of sound knowledge to practice in common contexts with only minor lapses in competence occurring.
Shows how Developing Proficiency	The student can apply and demonstrate the integration of advanced knowledge to practice across a range of contexts.
Does Global Development	The student consistently applies the scientist-practitioner model to demonstrate autonomous and seamless integration of advanced knowledge to practice in a wide range of complex contexts.

While themes were discussed by students and supervisors, their views were similar in some regards and different in others. The findings illustrated seven themes for improvement to ensure students are receiving constructive and valid feedback:
Usability: Students and supervisors agreed that the recommended model should follow a simple, practical and user-friendly format. Students felt that the pass-fail rating and Miller's pyramid conformed to these guidelines the best. Supervisors believed that the Likert rating scale and pass-fail rating worked best.

Social desirability: Students and supervisors strongly believed that the Likert rating scale feeds into issues of social desirability. Supervisors commented on the social pressure they feel to score a student highly; however, they do not feel that the anchor, '5- performance equal to or above that of a fully competent professional' is achievable for any student. Students and supervisors agreed that the use of a numerical rating offered no value, and in fact the absence of a number would help to mitigate social desirability issues. Students and supervisors favoured the pass-fail rating and Miller's pyramid as these models implemented positive and growth focused wording, mitigating issues of social desirability.
Validity: Students and supervisors were vocal regarding the need for validity of the proposed model, such that the model needs to demonstrate the incorporation of a scientist-practitioner

model, measuring more than just performance. Both students and supervisors strongly believed that Miller's pyramid demonstrated a scientist-practitioner approach.

Sufficient detail and range: Students and supervisors agreed that there was no benefit to the breakdown of levels indicating 'not competent' in the Likert rating scale. The pass-fail rating scale addressed these concerns and included an appropriate three level breakdown of competency. Supervisors held some concern regarding the definition of competency. Miller's pyramid was believed to lack clarity and detail in each of its descriptors.

Not assessed component: There was strong consensus between students and supervisors that the proposed model needs to incorporate a 'not assessed' component. This could be a comments box, similar to that currently used, however, the process for scoring 'not assessed' competencies needs to be standardised across supervisors.

Inter-rater reliability and subjectivity: Students and supervisors favoured Miller's pyramid for inter-rater reliability and subjectivity. Stakeholders believed that Miller's pyramid would facilitate conversation as it defines elements of practice. Miller's pyramid would demonstrate further objectivity with the inclusion of more detail and clarity around each anchor.

Constructive feedback: There was disconnect between students and supervisors regarding the value of constructive feedback. Students strongly believed that there was an immediate need for the proposed model to provide constructive feedback to students to inform their practicum trajectory and student employability. Supervisors believed a traditional pass-fail approach was sufficient, as required by APAC.

As a result of the interview findings, an adapted version of Millers pyramid model is being trialled for implementation across organisational psychology practicums. In addition, to facilitate student competency development as a trajectory across their practicums a new visual depiction of competency acquisition is also being implemented. Utilising a radar chart design (see Figure 1) the trajectory development tool will be used by students successively over each of their practicums to demonstrate their competency development over time.

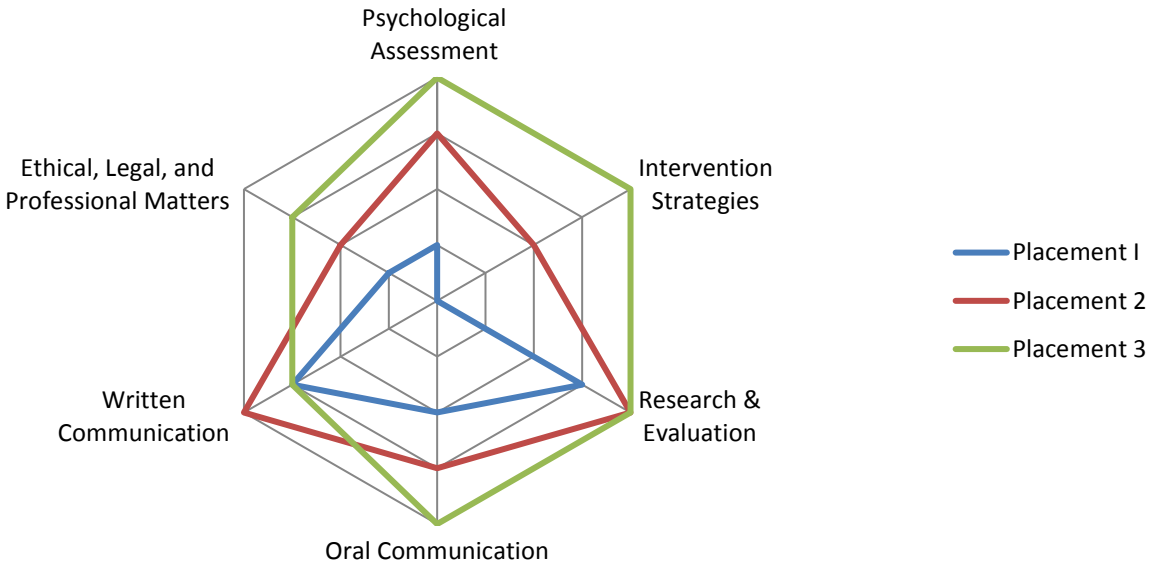

Figure 1. Trajectory Development Tool

The trajectory development tool is able to demonstrate to students the areas where they hold key strengths (i.e. high scores across all practicums), the areas where they have acquired strengths (i.e. progressed from low to high scores across practicums), and the areas they need to continue to grow (i.e. areas of focus for professional development).

Discussion

The most important learning from the project thus far is ensuring that the competency evaluation tool delivers reliable and valid information to the student to inform their real-world learning trajectories. This is difficult, as the competency evaluation tool is used by a range of different supervisors from a range of different organisations. Therefore, the competency evaluation tool needs to be robust enough to better inform students of their competence but also reliable enough for a range of supervisors to use and provide congruent feedback to students.

The new trajectory development tool also enables students to not only reframe their approach to practicums as a series of enhanced skill acquisition opportunities, but to also see the areas of psychological practice that are their strengths, which can better direct their subsequent practicum and ultimately job search efforts. With many of our students being offered their first psychologically related job from their practicum experience, the need for students to be forward focused and see their practicums as a trajectory of development becomes apparent.

Given the standardisation of the competencies that organisational psychology students acquire while undertaking their practicum experiences, this research is of benefit to other institutions offering organisational psychology training who may want to mould their student perceptions of practicums as a trajectory of development, rather than a set of practicum experiences. Indeed, such tools for assessing practicum competence for individual and successive practicums is of benefit in other specialty areas, as well as for professional training post-graduation.

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Integrating career development learning interventions into an exercise science professional practice curriculum: students' perception of understanding and confidence in their employability attributes

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Abstract

Employment following graduation has been identified as important to students as well as universities [1]. While students in the Curtin Exercise Science course are equipped with the necessary knowledge and skills to gain employment and work competently as Accredited Exercise Scientists, there are some areas of employability that have not been formally covered in the curriculum previously.

Forty-five students enrolled in in the final year REHT3000 Exercise Science Professional Practice unit within the Exercise, Sports and Rehabilitation Sciences course participated in the pre-intervention questionnaire. Interventions were implemented into the REHT3000 unit, and included career development activities (lectures, assessments and in-class activities) and an extracurricular post-practicum debrief session (reflection on strengths and areas for development, group debrief, and review of job application and accreditation processes) with particular emphasis on the practicum experience.

Fifteen students completed the post-intervention questionnaire, with 8 of those also completing the extracurricular post-practicum debrief session. Overall, students perceived understanding of completing the job application process increased following the intervention. Student confidence in the job application process also improved, particularly communicating their strengths to an employer. While a small number participated in the extracurricular post-practicum debrief session, all reported it to be useful in reflecting on the practicum experience and moving into employment following graduation, indicating this would be a useful activity to embed into the practicum program for all students.

Brief description of academic area and students involved

The project was aimed at final year students enrolled in the practicum unit REHT3000 Exercise Science Professional Practice (ESPP) in 2017 (n=60), within the Exercise, Sports and Rehabilitation Sciences (ESRS) course in the School of Physiotherapy and Exercise Science at Curtin University. ESRS is an accredited three-year Exercise Science (ES) undergraduate degree, with the ESPP unit completed in semester one, during their final year of study. Following graduation from this degree, students are eligible to apply for accreditation as an Accredited Exercise Scientist (AES) with Exercise and Sports Science Australia (ESSA).

Particular purpose

Graduate employability is important to students, educators and universities, and while it is dependent on many factors, it is recognised that the skill of applying for a new job is a critical part of this [1]. Smith et al [2] suggest that a career choice should not be considered a singular choice with a logical pre-determined pathway, and that universities need to develop specific skills and abilities that will allow their graduates to be proactive, self-directed learners.

Many undergraduate students do not actively consider their careers until they graduate [3], and therefore development of employability skills should commence early in university courses, as assessable components [4]. Jackson [5] proposes there has been a shift in industry expectations relating to university graduates, from academic excellence to the demonstration of work-place specific skills. And while students

develop attributes essential for employment during their study, it is important they are also able to communicate those attributes effectively to potential employers [6].

ESSA dictates the majority of the ES course content and practicum requirements, meaning that all graduate AES's are likely to have similar skill sets, knowledge, and practicum experience. While the Curtin ESRS course has been designed to allow students to be employed as a qualified AES, some attributes of employability have not previously been included in the program. It was anticipated that assisting students with additional employability skills will assist in making Curtin ES students stand out from other ES graduates they may be competing with for employment, and help them communicate their skills, attributes and relevant work experience effectively to potential employers.

While the Curtin ES course has included some aspects focused around career development and employability, there are attributes specific to the ES industry (such as effective communication, interview skills, industry representation etc.) that have not been previously covered. We hypothesised that introducing extra teaching content around employability attributes and skills, with particular reference to their industry practicum, along with a post-practicum debrief session would assist the students to confidently communicate their relevant skills, attributes and experience to potential employers during the job application process.

The aim of this project was to implement a series of activities related to career development and employability in an ES context within two final year units to enhance students' employability following graduation. Specifically, we included specific learning tasks in the curriculum allowing students to translate industry practicum experience into attributes relevant to new graduate employment.

Enacted post-practicum interventions

ES students place a big importance on being able to gain employment following graduation [7]. Curtin ESRS students have previously been exposed to a small amount of formal career development learning in their final year to assist them in successfully bridging the gap into employment. However, its efficacy has not been evaluated in terms of its usefulness to students, and previous feedback from ESRS students has shown a perceived lack of readiness to successfully transition into employment following university. While the students are equipped to graduate with the necessary skills and attributes to work competently as an AES, the ability to communicate these capabilities and relevant industry experience to potential employers is crucial in the competitive job market.

Career development skills:

Additional career development and employability activities were incorporated into the curriculum for third year students across two units. Learning content and tasks included

- Lecture on writing a job application (including writing a cover letter and resume, and responding to selection criteria) and job interview skills
- Lecture on common industry career pathways (with AES industry representatives), including further study and professional development options
- Completing a job application (assessment submission)
- Simulated job interview activity (in class)

Students were encouraged to draw upon their practicum experience/s as well as past work experience (industry relevant and/or non-industry relevant) during these activities to assist in identifying and communicating their attributes to potential employers following graduation.

Post-practicum debriefs:

An optional post-practicum debrief session was offered to all participants at completion of the ESPP unit requirements to further develop their employability skills with particular reference to their practicum experience. Activities included:

- Debrief activity in small groups on a professional dilemma encountered during practicum, then individually

- Reflect on strengths and areas for development identified post-practicum to consider for future employment opportunities
- Review of the job application process – revisit assignment and reflect on responses using practicum experience
- Review of the ESSA AES accreditation process

Data gathered and analysed

The efficacy of the employability intervention was assessed from the participants' perspective using a custom designed questionnaire. Students' perception of their understanding and confidence in applying for professional employment was collected at the start of semester one, and reassessed at the completion of the REHT3000 unit requirements. Participant responses were aggregated and descriptive statistics presented to determine how their perceptions changed over the course of the intervention.
Following completion of the unit requirements, students that participated in the optional post-practicum debrief were asked to provide feedback.

Key findings

Participant characteristics:
Forty-five (16 male, 29 female); aged 21.3 ± 3.2 years; full-time domestic students enrolled in the REHT3000 ESPP unit participated in the study. Prior to participating in the intervention, 22 (50%) of participants had completed a professional job application for a professional position, and 9 (20%) participants had previously undertaken training in applying for professional positions. 26 (57.8%) participants had already commenced their allocated practicum, with the mean hours completed at the time of the initial data collection being 37.8 hours (± 36.9 hours). 14 (31%) participants had previous experience working in the ES field (mean 3.3 ± 2.6 years).
Outcomes:
The small number of participants that completed the post-intervention questionnaire should be considered when interpreting the findings. 15 participants completed the post-intervention questionnaire, with 8 of those participants also completing the optional post-practicum debrief session. Table 1 shows the students' responses to the questionnaire pre- and post-intervention.

Table 1 *Student responses to the pre- and post-intervention questionnaire*

	Pre-intervention (n=45)	**Post-intervention (n=15)**
UNDERSTANDING		
How to structure a cover letter for a job application	None 2.2% (n=1) Minimal 51.1% (n=23) Clear 42.2 % (n=19) Excellent 4.4% (n=2)	None 0% (n=0) Minimal 0% (n=0) Clear 66.7% (n=10) Excellent 33.3% (n=5)
How to address the selection criteria in a job application	None 6.7% (n=3) Minimal 48.9% (n=22) Clear 40.0% (n=18) Excellent 4.4% (n=2)	None 0% (n=0) Minimal 6.7% (n=1) Clear 66.7% (n=5) Excellent 26.7% (n=4)
How to present a CV for a job application	None 4.4% (n=2) Minimal 40.0% (n=18) Clear 48.9% (n=22) Excellent 6.7% (n=3)	None 0% (n=0) Minimal 0% (n=0) Clear 60.0% (n=9) Excellent 40.0% (n=6)
CONFIDENCE		
Identify my strengths relevant to the job description	Not confident 6.8% (n=3) Somewhat confident 34.1% (n=15) Confident 50.0% (n=22) Very confident 9.1% (n=4)	Not confident 0% (n=0) Somewhat confident 13.3% (n=2) Confident 60.0% (n=9) Very confident 26.7% (n=4)
Identify my weaknesses relevant to the job description	Not confident 6.8% (n=3) Somewhat confident 45.5% (n=20) Confident 45.5% (n=20) Very confident 2.3% (n=1)	Not confident 6.7% (n=1) Somewhat confident 0% (n=0) Confident 73.3% (n=11) Very confident 20% (n=3)

Communicate my strengths to an employer in an application letter	Not confident 9.1% (n=4) Somewhat confident 47.7% (n=21) Confident 31.8% (n=14) Very confident 11.4% (n=5)	Not confident 0% (n=0) Somewhat confident 13.3% (n=2) Confident 53.3% (n=8) Very confident 33.3% (n=5)
Communicate my strengths to an employer in an interview	Not confident 15.9% (n=7) Somewhat confident 40.9% (n=18) Confident 34.1% (n=15) Very confident 9.1% (n=4)	Not confident 0% (n=0) Somewhat confident 20.0% (n=3) Confident 46.7% (n=7) Very confident 33.3% (n=5)
Overall confidence in applying for new graduate exercise scientist positions	Not confident 24.4% (n=11) Somewhat confident 42.2% (n=19) Confident 31.1% (n=14) Very confident 2.2% (n=1)	Not confident 0% (n=0) Somewhat confident 13.3% (n=2) Confident 73.3% (n=11) Very confident 13.3% (n=2)

Student understanding:

Overall, students' perceived understanding of completing the job application process improved following the interventions. 100% reported to have a "clear" or "excellent" understanding of structuring a cover letter for a job application, compared with 46.6% pre-intervention. 93.4 % reported a "clear" or "excellent" understanding of addressing selection criteria in a job application compared to 44.4% pre-intervention. 100% reported to have a "clear" or "excellent" understanding of presenting a CV for a job application, compared to 55.6%.

Student confidence:

Students confidence in the job application process following intervention also improved. Overall confidence in applying for new graduate exercise scientist positions increased, with 86.6 % reporting to be "confident" or "very confident", compared with 33.4% before the intervention. 86.7% reported to be "confident" or "very confident" in identifying their strengths relevant to a job description compared to 59.1%, and 93.3% were "confident" or "very confident" in identifying weaknesses relevant to a job description (47.8% pre-intervention). Students confidence in communicating their strengths to employers via application letter and interview also improved following the interventions; 86.6% were "confident" or "very confident" via the application letter (43.2% pre-intervention) and 80% were "confident" or "very confident" via interview (43.2% pre-intervention).

Feedback from the extracurricular post-practicum debrief session indicated that the students' main motivation for attending was to gain more information on the ESSA AES accreditation process. When asked what the most useful part of the debrief session was, comments included:

- "The accreditation process - especially the graduate entry assessment"
- "Handy going over accreditation and recapping on resume applications"

All participants agreed or strongly agreed that the debrief session would be helpful for their success in the future, and they would be able to immediately use what they learned.

Discussion

- The post-practicum debrief session is currently and extracurricular option for students due to the nature of the unit, with students completing their placements at different times through the year which makes the timing of such events logistically difficult. Given the student feedback on this session it is worth looking for a solution that would allow all students completing practicum to complete this session.
- Possible future career development activities within the unit and/or course might include simulated interviews with industry panel, industry networking events and presentations, and compulsory post-practicum interventions.
- Additional placement opportunities may be perceived as beneficial by students to gain more practical insight into AES industry career options.
- The accreditation processes with ESSA have been identified as important to graduating students.

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Implementing post-practicum strategies to enhance professional identity and employability in final year physiotherapy students

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Abstract

Practicum experiences and career development learning are currently not linked in the physiotherapy curriculum despite increasing evidence to promote structured experiences that enhance employability. The aim of this project was to explore the value of linking practicum experiences of final year physiotherapy students with development of their professional identity, and to guide students through learning activities post-practicum to address employability. A half-day workshop was delivered that enabled students to engage in peer discussions regarding practicum experiences as well as explore professional attributes and their progression from novice to professional clinicians. The workshop included presentations from industry professionals and the opportunity to participate in discussions regarding employability and selection criteria. Following the workshop students could opt-in to undertake a task answering selection criteria which were assessed anonymously by an industry professional.

Of the 73 physiotherapy students enrolled in their final year, 61 (83.6%) attended the workshop in May 2017, with 56 students completing pre- and post-surveys. Results demonstrated that students' confidence in their readiness to commence work and obtain work increased after attending the workshop. There was a general shift to more positive ratings in items on the *Work Readiness Scale* post workshop. The opt-in task of addressing selection criteria was taken up by 20 (35.7%) of the students who attended the workshop. Improvement in their ability to apply for graduate roles as determined by the *Work Readiness Scale* was less apparent post selection criteria task, however students reported value in the activity and its timing in curriculum.

Industry professionals highlighted the lack of practicum examples drawn on by students, emphasising the need for increased value to be placed on post-practicum review of experiences to enhance employability. Careful consideration of how and when this is embedded in curriculum is required to ensure the development of professionals who are industry ready.

Brief description of academic area and students involved

Final year undergraduate physiotherapy students (n=73) from The University of Notre Dame Australia were invited to participate in post-practicum activities embedded in the clinical education curriculum. Final year students undertake a two-week block of clinical preparation prior to their first two five-week clinical placements and an additional two-week clinical preparation block prior to their third and fourth clinical placements. The post-practicum experience was embedded in the second clinical preparation block after the completion of their first two clinical placements. Clinical placements are sourced by the clinical education team to meet professional accreditation requirements.

Educational purpose

Post-practicum strategies in the physiotherapy program to date have focussed on review of challenging cases in fourth year, assessed in a 'capstone' unit. Employability is broadly explored with students completing career development workshops on curriculum vitae and interview skills in their final year. Students also attend a professional seminar day, meeting sector representatives and learning about professional support and opportunities, registration and additional employment information including superannuation and remuneration. Students undertake no additional post-practicum activities and have limited review of their employability skills and needs, linked to practicum experiences.

The aim of this project was to assist final year students to link experiences gained on their practicum with their development as a professional; and guide students through learning activities to address employability. Watts (2008) and Smith et al (2009) promote the importance of augmenting work-integrated learning experiences with career development learning and highlight the lack of structured experiences linking the two in the tertiary sector. In a survey of health discipline students on access to employability interventions, incorporating feedback on workplace experiences was noted as preferred by 46.2% of students surveyed with 43.6% preferring access to these interventions after practicum experiences (OLT, 2017).

Students in this project participated in a half-day post-practicum workshop as part of the clinical education curriculum and had the opportunity to opt-in to a task responding to written selection criteria for a mock position in a sector of their choosing. The workshop allowed students to explore their development as a professional to date and highlighted skills and attributes both acquired and yet to be developed, allowing students to progress their career development needs in the lead up to graduating and applying for jobs.

The intervention was aimed at increasing both understanding and confidence in their employability, enhancing students' transition to graduate physiotherapists as well as improving their employment prospects. Students were challenged to identify gaps in their own professional identity and address them in their final 10 weeks of practicum, thus ensuring no gaps in their ability to complete selection criteria and enhancing their overall employability.

The job market for physiotherapy graduates is becomingly increasingly competitive due to both the increasing number of Australia-wide graduates competing for positions and healthcare budget measures limiting new graduate intakes, particularly in the public sector. The workshop was designed with industry representation and input to ensure the intervention was authentic. The timing of the workshop half way through final year made this a relevant learning activity for students with the aim that participation and activities undertaken would assist them to learn how to 'stand out' in the current job market.

Enacted post-practicum interventions

In Phase One of the intervention, students attended a half day workshop in May 2017 including a guided review of practicum experiences, professional identity activities and an employability panel.

The review of practicum experiences involved students engaging in peer discussions in groups of five exploring clinical/professional/personal dilemmas and learning points experienced on practicum. Two facilitators provided guidelines for discussion points to ensure appropriate examples of practice were considered.

Professional identity and attributes of professionals were introduced and explored through independent learning activities addressing the qualities of practising physiotherapists. Students were asked to rate their progress from novice to practitioner (on a scale of 0-10) to develop a baseline of where they were currently in their development. Students were asked to identify the ideal qualities of a practicing physiotherapist. Students were also encouraged to identify gaps in their development as a practitioner.

The workshop concluded with a panel of two industry representatives from hospital and private practice settings, providing an overview of employability in their respective sectors and addressing their expectations in the recruitment process for graduate physiotherapists. Industry representatives provided a guide and facilitated discussion on completing selection criteria relevant to their setting.

In Phase Two, students opted-in to respond to written selection criteria for a mock position in one of the two sectors of their choosing. Selection criteria were provided by the industry representatives and students sent their responses to them via the project team to allow for de-identification. Responses were coded to allow the project team to re-identify and forward feedback to individual students. Industry representatives provided feedback on individual student responses to selection criteria as well as providing an overall generalised feedback document for circulation to the year group.

Data gathered and analysed

Survey data was collected from students, pre- and post-workshop and for those students who opted-in, again following completion of the selection criteria task. The survey included components of the *Work Readiness Scale* (OLT, 2014) reviewing employability skills and confidence. Students were also asked to rate their development on a scale of 0-10 moving from novice to physiotherapy practitioner as well as provide qualities and attributes of a professional. Qualitative responses were also sought regarding the usefulness of activities undertaken and feedback on the workshop and activity. Surveys were distributed in hard copy pre- and post-workshop and repeated online via Survey Monkey for those students who completed the selection criteria task. Analysis of data included descriptive statistics of survey responses and basic thematic analysis of qualitative responses within the surveys undertaken. Feedback from industry representatives on the selection criteria task was also reviewed and collated.

Key findings

Of the 73 physiotherapy students enrolled in their final year, 61 (83.6%) attended the workshop. Fifty-six students completed the pre- and post-workshop survey, 42 (75%) females. The age of the 56 students ranged from 20 to 34 years (mean 22.64 years; SD 2.78).

In the pre-workshop survey no students rated themselves as 'very poor' or 'considerably below average' in rating their abilities on the modified *Work Readiness Scale* (Table 1).

When students were asked to rate their confidence in their readiness to commence work, only 16 (28.57%) were 'quite confident' with one student (1.79%) reporting being 'very confident' in the pre-workshop survey. No students were 'very confident' that they would be able to obtain work in the physiotherapy profession. When asked for any concerns regarding their employability, the key themes in the pre-workshop qualitative responses were finding a job in the sector of their choosing and concern regarding the range of experiences they had undertaken to date on clinical placements. One student noted their "lack of experience in certain areas as our six pracs at university can't cover everything. I never had a private practice prac but want to apply for private practice jobs."

Students were asked to consider five words which exemplified the qualities and attributes of a practising physiotherapist. Fifty-three students completed this question with the most commonly identified qualities/attributes presented in Table 2. When considering their development from novice to physiotherapy practitioner on a scale from 0 to 10, students rated themselves in a range from two to eight (mean: 6.02; SD: 1.32).

In the post-workshop survey there was a shift from the 'slightly below average' and 'average' categories to more positive ratings across the items on the *Work Readiness Scale* (Table 1). When students were asked to again rate their confidence in their readiness to commence work, 29 (51.79%) were 'quite confident' with three students (5.36%) reporting being 'very confident' at the end of the workshop. Two students (3.57%) were now 'very confident' that they would be able to obtain work in the physiotherapy profession. When asked for any concerns regarding their employability the key themes in the post-workshop qualitative responses were competitiveness in the industry and confidence to approach employers. One student responded, "I think I will find it challenging to feel confident in satisfying all criteria wanted by employers in the pre-interview process" with another recognising the need to make themselves "…stand out from the crowd".

Students' lists of professional attributes remained predominantly the same in the post-workshop survey. There was a small improvement in students' rating their progression from novice to physiotherapy practitioner with a mean of 6.7 (range: 2-9; mean: 1.27).

In questions reviewing the overall 'usefulness' of activities undertaken in the workshop, 46 students (88.46%) highlighted the industry professional led discussion on WIL, as being 'very useful'. This was in comparison to 23 (46%) and 20 (38.46%) rating the professional identity activities and peer discussions on post-practicum experiences respectively, as 'very useful'. Six students (11.54%) rated the peer discussions on post-practicum experiences as 'not very useful'. In qualitative feedback on the workshop, students highlighted the panel and presentations from industry as most valuable, with an

overarching theme that this aspect of the workshop provided beneficial insight into future employment. One student commented that there was "…good use of reflection" with another commenting that they "…would love more opportunity to discuss with peers" highlighting the value of review of post-practicum experiences for some attendees.

Of the 56 students who attended the workshop, 20 (35.7%), 16 females (80%) and four males (20%), opted to submit selection criteria for individualised review by industry professionals. For these 20 who opted to submit selection criteria, improvement in their ability to apply for graduate roles was less apparent post-selection criteria task (Table 1). There were proportionately more 'very good' ratings for their ability to apply for work relevant to their studies and some evidence of improvement for this item across the higher rating categories. There was also a slight shift to more positive ratings for students' ability to judge the applicability of the knowledge gained in their studies to the workplace. Qualitative feedback from students who completed this task highlighted the value and timing of the opportunity with one student noting that the task "was very useful, I struggled writing my statements, so this activity gave me a better understanding of what is expected." Another respondent noted it was "Very very useful, an invaluable tool provided at a good time e.g. before most start applying for jobs. Really good to get on the right track in the job application process."

Feedback from industry professionals reported a few 'excellent' applications but overall indicated that students didn't target their responses specific to their practicum experiences nor to the potential employment sector. One industry professional observed that students weren't open to discussing different clinical placements scenarios in each selection criteria to demonstrate the depth of their experience. The second industry professional wanted students to include more 'real' examples in their applications, so they could better evaluate their experiences and determine how these may translate into performance in the workforce. Overall, students required a greater understanding of how to incorporate and showcase their practicum experiences when seeking employment.

Table 1 *Pre- and post-intervention ratings on ability to apply for graduate roles*

Item	Very poor		Considerably below average		Slightly below average		Average		Slightly above average		Considerably above average		Very good	
	n	%	*n*	%	*n*	%	*n*	%	*n*	%	*n*	%	*n*	%
Pre-workshop (*n*=56)														
Apply for work relevant to your studies	0	0	0	0	3	5.4	19	33.9	23	41.1	10	17.9	1	1.8
Present yourself effectively in selection interviews and processes	0	0	0	0	7	12.5	12	21.4	23	41.1	13	23.2	1	1.8
Judge the applicability of the knowledge gained in your studies to the workplace	0	0	0	0	4	7.1	14	25.0	26	46.4	12	21.4	0	0
Post-workshop (*n*=56)														
Apply for work relevant to your studies	0	0	0	0	0	0	4	7.1	29	51.8	20	35.7	3	5.4
Present yourself effectively in selection interviews and processes	0	0	0	0	0	0	2	3.6	20	35.7	25	44.6	9	16.1
Judge the applicability of the knowledge gained in your studies to the workplace	0	0	0	0	0	0	6	10.7	25	44.6	20	35.7	5	8.9
Post-selection task (*n*=20)														
Apply for work relevant to your studies	0	0	0	0	1	5.0	1	5.0	5	25.0	7	35.0	6	30.0
Present yourself effectively in selection interviews and processes	0	0	0	0	0	0	3	15.0	7	35.0	8	40.0	2	10.0
Judge the applicability of the knowledge gained in your studies to the workplace	0	0	0	0	0	0	2	10.0	7	35.0	8	40.0	3	15.0

Table 2 *Pre-workshop commonly identified qualities and attributes of a practising physiotherapist*

Qualities and Attributes	Number of students (%)
Knowledgeable	27 (50.94%)
Professional	20 (37.73%)
Communicator	16 (30.19%)
Confident	15 (28.30%)
Evidence-based	11 (20.75%)
Compassionate	10 (18.87%)
Caring	8 (15.09%)
Enthusiastic	7 (13.21%)
Team worker	7 (13.21%)
Approachable	6 (11.32%)
Motivated	5 (9.43%)
Skilled	5 (9.43%)

Discussion

The key issues identified from this project are:

1. The need for timely, relevant, face-to-face post-practicum experiences that are embedded in curriculum. Aligning the timing of these experiences with employability needs is essential to ensure engagement. Final year students on the cusp of seeking employment are likely to be more engaged with activities. Relevance through industry engagement will also promote increased participation in learning activities.
2. Links to industry are essential for authenticity and engagement. Although the selection criteria task was not taken up by many students in this project, engagement with industry professionals and student feedback on this aspect of the workshop highlighted the value students placed on this face-to-face interaction.
3. Students are less likely to engage in tasks that are opt-in i.e. not part of curriculum. Embedding employability tasks in the curriculum in the form of reflective post-practicum discussions and/or writing tasks is essential to ensure career development learning outcomes are met.
4. Students place more value on tasks they perceive are directly related to employability as opposed to the development of their professional identity and peer discussions around post-practicum experiences. Attaching relevance to these learning activities is essential to ensure students see the link between post-practicum experiences and employability. Industry professionals emphasised the lack of practicum examples drawn on in answering selection criteria, highlighting the need for increased value to be placed on post-practicum review of experiences to enhance employability.

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Optimizing Post Graduate Enterprise Skills and Professional Identity Development: Collaborative Workshops in a Google+ Community

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Abstract

Introduction: This research project focused on implementing a collaborative workshop series on a Google+ community for Media and Communications post graduate students completing their final course called Professional Practice.
Aim: To optimise enterprise skills and professional identity development whilst students engaged in individual industry projects, using peer to peer collaboration on a Google+ community
Methods: Thematic analysis was applied to the activities and collaborative posts on the Google+ community. This was triangulated with tutor field notes and individual student interviews.
Results: When enterprise skills are made the focus of the activity and artefacts are created, dialogical learning occurs where the student engages in meaning making of their tangible artefact as a visual representation of their enterprise skills and professional identity. In sharing and discussing these activity artefacts within the community they also engage in peer to peer learning as they make sense of their peers professional identity in relation to their own. Students however do not naturally recall specific enterprise skills when asked to reflect on their placement and project experience in general at the end of the semester, due to the intangible nature as well as time and priority issues.
Conclusion: A Google+ community optimised peer to peer learning by allowing students to reflect on their own enterprise skills and professional identity as well as their peers. This intervention was useful for students completing individual project and internships. The community needs to be supported with a student-centred learning environment, curriculum and pedagogy. Activities should reinforce the practice of specific enterprise skills as well as be an authentic and useful professional career artefact that can be shared publicly. The tutor needs to ensure the community culture is engaging, collaborative and supportive, and have their own specific professional identity and set of enterprise skills in supporting learning relationship on the boundary between industry and higher education.

Brief description of academic area and students involved

Professional Practice is a double credit point, final capstone course for Media and Communications Master students at RMIT University. The course consists of a self-chosen, authentic industry project, as part of a work integrated (WIL) placement, which is supervised by an industry mentor. Most students choose to work individually, completing their industry project as part of an internship, working within the organisation where they are already employed, or obtaining a brief and working outside of the organisation.

The course is run twice a year in a flexible format with both face to face and online deliveries. Completion of the project is mostly self-directed with compulsory fortnightly, individual consultation with the tutor. Previous assessments included a learning proposal and a completed project report, inclusive of an appendix with framing concepts and theories, and a reflective journal based on the DIEP (Describe, Interpret, Explain and Plan) format.

In semester 1, 2017 17 students completed the course and 9 agreed to contribute to this research project by publicly publishing their posts onto their own Google+ profile page as well as the

Professional Practice Google+ community. Four were completing a Master of Communication Design, two a Master of Advertising and three a Master of Communications.

Educational purpose

Within the Professional Practice course three challenges had emerged over time:

1. Students did not value enterprise skills- their nature, importance or the differences from a discipline skill.
2. Students were unable to articulate their unique set of enterprise skills in relation to the project work they were completing in their placement.
3. The assessment did not support the student in either of the two above challenges.

Students were completing industry projects across a variety of media and communications organisations including PR, advertising, media, NFP and government. This brought an opportunity for peer to peer learning through collaborating and discussing different experiences.
The educational goal was to redesign the course to include in the curriculum a specific intervention and student-centered learning environment to support and optimize enterprise skills and professional identity development (PID) for employability.

Enacted post-practicum interventions

A series of six workshops was developed with an accompanying Google+ Community where the students posted and discussed six workshop activities. The workshops explicitly introduced professional identity and different aspects of future enterprise skills and its importance to employability. The six workshops were delivered both face to face and through a Google Hangout, and were evenly spaced every two weeks throughout the 12-week semester. Resources were shared on the community included articles, websites, slideshows and videos. The assessment asked students to engage with the resources, and then complete a specific activity and post it onto the community. Each activity was very explicit and templates and examples were provided. Students were also required to collaborate with each other after each activity by commenting on each other's posts.

The purpose of the community was to engage students in peer to peer learning through sharing, collaborating and reflecting on the enterprise skills and their professional identity development as it related to their industry project. The project and their placement experience formed the context for their reflection and the focus of the activity was the enterprise skills they were developing.

<u>The six workshop activities included:</u>

1) Introduction two-minute video: Students created and uploaded a two minute video introducing themselves and their projects and what they were most hoping to learn. The objective was to build synergies and a sense of belonging.

2) Unstuck App: In workshop 2, students were given an overview of future workplaces and ways-of-working and some of the essential professional development skills including self-awareness, self-directed learning and career management. The activity involved them completing a fun diagnostic questionnaire from the www.Unstuck.com APP, which gave students a "stuck" profile and action-oriented tools on how to get "unstuck". After completing the diagnostic, they then posted on the community a discussion of their "stuck" profile with a real-life work example and personalised tactics to get "unstuck".

3) Bio Infographic: This workshop went into the details of future workplace skills and the importance in understanding what they are, and how to articulate them. The activity involved student engaging with two resources (Future Skills 2020 and FYI Job clusters) and then creating a Bio-Skills infographic (using www.Canva.com- for infographic templates) which demonstrated visually which skills they felt competent in. As an infographic it needed to be presented in a single page visual format with

minimal text, and categorised into personal attributes, disciple skills and enterprise skills, along with links to artefacts of projects or pieces of work that gave evidence of the skill in action.

4) Knowledge networks and Professional Identity: 5 C's framework Plan:

This workshop discussed professional identity and knowledge networks and the important of an online and offline presence through the 5 C's framework of Connecting, Communication, Curating, Collaborating and Creating.

The activity required students to create a knowledge network plan using the 5 C's framework with the objective of building an awareness of their online presence and branding, the communities of practice they wanted to connect and share with, and how they wanted to contribute in this space. If students already had examples of posts such as on LinkedIn or twitter that demonstrated how they were contributing, they were to include these links.

5) Think Blending:

Workshop 5 was about different ways of approaching a project through different thinking styles such as systems, computational, design, strategic, critical, creative and futures thinking. The activity asked them to discuss how they do or could apply five thinking styles to their project work with the objective of articulating their project from different perspectives.

6) Project Defense:

In this workshop we discussed the STAR method of Behavioural interviewing and students then paired up and practiced asking and answering specific interview questions. The objective was to practice articulating the skills they had acquired from the project work as part of a personal narrative, which would be beneficial not just in an interview situation but in understanding and reflection on their work place skills professional identity as a whole. The activity that followed was called a project defence where students answered a set of questions to defend their learning, around the skills development they had achieved through completing their project and the activities. It also served as a summative data collection point to explore how students perceived their learning, enterprise skills and professional identity development.

As well as the six workshops and activities, other changes were also made to the learning ecology to encourage engagement, belonging and support as they progressed along their learning journey:

- A course website was developed which included all the information for students to prepare and find an internship or project prior to the course starting as well as familiarising themselves with the course and workshop contents. This included two important specifications
    - Project specifications were included on the course website to ensure the project was of the right type, size and scope to enable the development to occur. The project should be challenging, career focused, personally relevant and engaging.
    - Mentor guidelines were provided to encourage students to seek discussion and feedback from their industry mentor.
- An introductory drinks session was held on campus for face to face students to facilitate a sense of belonging. The first Google Hangout also included a friendly "get to know each other" session.
- The final project assessment format was changed from a project report to a website to emphasise the importance of the process of learning through the reflections and the use of framing concepts and theories as part of their project work, which were included in separate tabs on the website.

A number of alumni were invited to one of the workshops to trial a learning format in a professional "meet-up" style.

Why this approach?

Major changes are occurring within the global work landscape and the way organisations function including new jobs and clusters (The New Work Mindset Report) and ways of working and collaborating (BCG). Talent management has become a priority as organisations look for an employable graduate who is both technically proficient and also has the non-technical skills, (workplace or enterprise skills) to successfully apply their knowledge and skills across a range of different work and social contexts (AAGE 2014).

These trends and changes are putting pressure for a new higher education paradigm that can educate and develop both the discipline skills and enterprise skills of the student. This means providing opportunities, as well as a supportive curriculum where students can experience new mindsets, practice authentic ways of working, receive feedback and begin to reflect and self-direct their own professional identity development.

Paterson described professional identity as 'the sense of being a professional' (Paterson et al. 2002,6) including an understanding of the values, conduct and behaviours that are expected as well as the ability to reflect and self-direct for ongoing personal development. According to Paterson (2002), pre- professional identity includes "feelings of personal adequacy and satisfaction in performing the expected role". It also includes self-esteem, a positive attitude, confidence, being self-aware and the ability to reflect.

Work integrated learning (WIL) in higher education institutions is increasingly being recognised for its potential in developing a student's non-technical skills (Crebert et al.2004) and career self-management and self-awareness (Moores & Reddy 2012). Denise Jackson also argues that WIL has the potential to develop a student's pre- professional identity: "The WIL experience encompasses elements of observation, networking and connecting with industry professionals and therefore provides a unique opportunity to expose students to the common elements of pre-professional identity, as well as those more nuanced to a particular profession." (Jackson, D., 2017. pp.833–853)

WIL can be considered a boundary learning experience. on the boundary between university and the host organisation, the student will "face the challenge of negotiating and combining ingredients from different contexts to achieve hybrid situations" (Engestrom et al., 1995, p. 319). Star (1989; Star & Griesemer, 1989) developed the concept of boundary objects to describe how artefacts can be used to bridge the gap between the two systems and so allow communication and improved flow of work and activity outcomes.

Several authors have described the learning potential of boundaries. Guutierrez, Rymes, & Larson (1995) describe how the intersection of cultural practices opens up a third space that allows negotiation of meaning and hybridity and therefore the production of new cultural forms of dialogue. J. K. Christiansen & Varnes (2007) discuss boundary objects as displacements or black boxes. "As black boxes, boundary objects tend to be invisible or taken-for-granted mediations that translate across sites but, when carefully considered or opened up, may provide learning opportunities"

Akkermann & Bakker (2011), argued that boundaries and boundary objects and their learning potential was a phenomenon of interest and that self-dialogue was the best way to understand how this learning occurred. Dialogical Self Theory developed by Herbert Hermans (1987, pp.10-13) uses the idea of dialogue and the self to understand how an individual comes to make sense of who they are as an individual and hence is used in studying identity development. Hermans describes how people are constantly engaged in sense making to give coherence and continuity to their reality and their selves, and how this activity is shaped by narrative and self-narrative (back chat or internal voices). In other words, the identity of the self is created through a continual back

chat of voices within oneself and with others which continually transforms the individual as they make sense of who they are and who they want to become in the world.

Data gathered and analysed

***Data gathered*:**

1. Observational field notes were made throughout the semester.
2. The entire Google+ community was saved as a PDF, including all activities and collaborations. Student reflections as part of students' final website were also used.
3. Three face-to-face interviews were conducted with five students in total at the end of the semester to clarify themes and insights.

***Data analysis method*:**

Data was analysed using a thematic approach. Narratives from student activities, collaborations and final reflections were analysed into themes and insights were developed. These themes were triangulated by comparing them with my own observational field notes taken throughout the semester and with the student interviews which enabled the insights and themes to be clarified and detailed.

The central research question was:

How has the intervention (workshop series and Google+ collaborations) optimised student enterprise skills and professional identity development? What other factors within the learning environment supported this development?

Key findings

The workshops and collaborative activities on the Google+ community were developed as an intervention with the objective of focusing on enterprise skills and professional identity development. Industry projects were used as the context of the learning experience. The findings indicate that this was achieved by providing a space that focused on specific enterprise skills and then asking students to complete an activity and share and collaborate with others. Students were able to see that they were using many of these skills already, but now understood what these meant and could articulate it in relation to their project work. The process of working through the activity allowed them to also reflect on their own professional identity in the creation of the activity artefact and comparing and collaborating with other.

"It is interesting as I wanted to do the internship for my resume more than I was interested in the coursework aspects, but the skills I have learnt through the coursework have proved to be very valuable. It has made me think about how I sell myself, how I fit into the workplace, how the workplace is likely to change, and what I will need to do to keep up with those changes"

The findings also indicate that when students were asked to reflect in general on their learning at the end of the semester they reverted back to superficial and generic descriptions of enterprise skills. Students recognised that the activities were important to their professional development but in reflecting on their learning, the enterprise skills were overshadowed by the project outcomes and the discipline skills they were developing. This may have been due to the students' poor recall of workplace skills when it was not made the specific focus or prompt of their reflection. In other words when asked to reflect on the development of skills in general they believe that this is asking specifically for discipline skills.

<u>Reinforced reflections over four timeframes</u>

In collaborating on the Google+ community, students were engaged in reflecting on their enterprise skills and professional identity development over four consecutive time periods which reinforced and added depth to the experience and the learning.

Time 1- At the process of making stage:

Students were engaged in developing and creating their activity artefact at the start where they were required to read a resource and specifically relate it to their workplace setting and their specific industry project. Often in making sense of it all, they would develop a unique process of analyses and synthesis which they mentioned in the introduction to their post, or it was obvious through the structure of their activity.

"This was quite a reflective experience as I ended up dividing my thoughts based on the categories and applying it to the way I had been handling the project but in a logical way. I found this really beneficial because it made me really think outside the box"

Time 2- As a finished visual artefact stage:

Once the students had completed the activity, the tangible and visual artefact acted as a knowledge object where they could see the "big picture" and often felt proud of their achievements. As a visual artefact (with varying amounts of text) they could also objectively visualise the gaps in their skill and how it represented them as a professional. This allowed them to reflect on their professional identity and its congruence with their personal identity and values.

"By having to really think about my skills and how I apply them to future trends, I was actually impressed by myself. I really don't give myself enough credit. I have discovered that my skills are transferable and there is a lot hidden underneath what I already do."

Time 3- At the sharing stage: Once students had posted their activity onto the community, they were able to view their artefact in relation to the other students. Students could see how others had interpreted the activity based on their individual projects and how each individual artefact represented their professional identity. Students could see both the content in each other's activities such as descriptions of skills and the links provided, but also the visual and verbal language of the artefact or its demonstration of a thinking process and the branding of the professional. The sharing allowed them to see different perspectives and interpretation of enterprise skills and professional identity, and allowed then to compare this to their own, as well as discover their strengths and gaps.

"I found your explanation of computations thinking really useful to further develop my understanding of the concept, which hadn't entirely fallen into place until now"

Time 4 - At the collaboration stage:

Students collaborated by commenting on others' activities. This took the reflective process even deeper where questions were posed and answered and tactics were discussed in a dialectic learning process. It was in this collaboration stage that students would often reflect on a previous learning experience and make comparisons. They also openly discussed and gave feedback on particular aspects of their project and placement, and how this had related to their enterprise skills.

Student A: "Taking the information gathered from design systems and futures thinking what patterns can I see?"

Student B: I like how you asked yourself a lot of questions in each thinking. Sometimes I think we keep do-do-do yet we need to sit back and think of the bigger picture. And I believe asking questions is one of the best ways to reconsider the project directions/details. Good Job!"

<u>The virtual community:</u>

The virtual community created a space that embedded a culture of communication, and a power free zone where everyone was heard and had a voice. This seemed to be particularly appreciated by the two international students from China. There was a growing sense of personalisation over the semester as students opened up and related to previous work or personal experiences. Conversations were authentic and supportive yet casual and friendly. The collaborations provided honest insights into their reflective perspectives around the enterprise skills and the professional identity that they were developing. The community also acted as an online living archive which students can still access. This may help students who want to reflect on their development over

time, to revisit and use the shared resources or ideas at a future date. Each student's six activities were also published publicly on their individual Google+ profile page, giving the activity artefact a career authenticity and usefulness beyond the course assessment in much the same way as a LinkedIn profile or Instagram profile might do.

"Google+ community provided a platform to connect with other students and facilitate peer reviews. Compared to a traditional class, where discussion might be dominated by a subset of students, each of us can have a say on the G+ community and be heard"

"This site is insightful when the semester comes to an end. It has allowed me to recall what I have done in this internship and what I can do better in future projects."

The people

The first students to post their activity acted as exemplars and created a high standard for all others who followed. This was from both a content and culture or "tone" perspective. In some instances, the high quality caused confidence issues with others. Students did not mind sharing their assessment with others. As a tutor, I had decided not to collaborate with the students, to allow it to be a student focused collaboration.

The "drop in" session trial, where five alumni members joined workshop 4, created an extra dimension where deep discussions developed around knowledge networks and professional identity development.

"The workshop attended by practitioners was particularly valuable. The insights provided though discussion influenced the way I approached my project. The opportunity to have a discussion with practitioners rather than just listen to a guest speaker was really great."

An authentic and useful artefact as a knowledge object

Students continued to create separate, visual artefacts for all activities, even when a simple written post was all that was required. Most students ended up with four separate artefacts that were visually and personally branded with similar colours and style. This may have been due to the graphic design students in the community who posted first and others then followed suit. It also may have been due to the Canva software that students enjoyed using in the third activity and then decided to continue to use in the remaining activities. Many students intended to share their artefact on their CV or other professional sites, and they could also be viewed publicly on the Google+ profile page. The authenticity and career usefulness and that it was highly biographical may account for the extra effort and engagement.

"I've been using futures thinking to contemplate my career path as well. I think that it's going to be important to upskill regularly and try to remain current with technological developments"

Feedback and "safe places"

In nearly every activity, students discussed their lack of confidence in asking for feedback from peers or industry mentors and also the need for a "safe place" where students could trial and discuss work, ideas, and gain feedback with others. In the interviews that followed, students believed that the community did offer some aspects of a safe place but that additional subgroups, which already were organically emerging on the community, could have been harnessed further as a place of deeper and more personal feedback outside of the community.

Student A: "For a writer, I don't believe myself to be particularly creative and struggle to find the confidence to put myself out there. The starting point for me then is to find people who I consider "safe" to run new ideas by and to build up my confidence."

Student B: "I also struggle with confidence to put my writing out there in to the world, and I love your idea of running past 'safe' colleagues and friends and getting peers to review work. I've also been trying to talk myself in to starting a blog for ages, but this confidence issue has always held me back. I'll definitely be looking out for a network of peers and friends willing to bounce ideas around and review work."

Student C: “People are so time pressed, it’s hard to bring yourself to ask sometimes”

Digital and visual literacy:

Students commented that the digital and visual literacy and collaborations skills they gained through using the community and the technology within the activities were highly beneficial. Simple learning activities such as creating a video, a visual infographic using Canva software and engaging in the Google+ community, google hangouts and Skype consultations, provided the opportunity to practice specific workplace skills in an authentic yet safe way.

“My objective (at the start) was to improve my digital literacy and design skills, which I proposed to do by completing Google’s digital garage course. However, I found that I developed this skill more effectively through completing the workshop tasks as well as other tasks as part of my project. For example, using Canva to create a graphic CV. In this case experiential learning was more valuable than textbook learning”

Low recall on articulating enterprise skills in different contexts at the end of the semester.

When students were asked to reflect on their learning experience overall in their final end of semester reflective assessment, students reverted back to reflecting on their project or placement experience, and the discipline skills they had developed in completing the project. If they did discuss enterprise skills it tended to be superficial and generic such as communication and time management. When asked about this in the interviews, students explained that it was the implicit and intangible nature of enterprise skills that made this difficult to keep top of mind. They were emphatic however that the workshops and activities on the community, was worthwhile and not “lost knowledge”, and that it was important to their overall development. The reason they gave for not discussing enterprise skills in the final assessment they said, was due to time issues and low priority in a busy working day. They reinforced that in the community, where this was an assessment, the enterprise skills was the focus or “hero”, and therefore it was given time and priority. In real life however, the project and the discipline skills are always the hero because that it what they are being paid to do.

Discussion

Completing an individual industry project as part of their WIL placement allows students to choose an organisation and project that fits with their personalised career aspirations and to practice some of the discipline skills they have learnt at university. It also provides the context in which they can begin to develop an awareness of their professional identity and the enterprise skills they need to develop once they graduate. This workshop series and Google+ community harnessed this experiential context by supporting them to reflect on their placement experience and project process, and then create and share useful and authentic artefacts and collaborate with peers, focusing on their professional identity development and personalised set of enterprise skills

The community acted as a “third space” as part of a boundary crossing between the host organisation and its project objective and the university’s learning objectives. It provided the first steps towards a “safe place” and enabled collaboration and peer to peer learning where all voices could be heard. It also acted as a repository of resources in which students could engage with in a flexible time frame. The activity artefacts posted by each student could be considered a series of boundary objects or “black boxes”. These activity black boxes made the intangible and complex nature of enterprise skills and professional identity development more tangible and transparent to the student.

The learning across the four timeframes allowed the students to engage in dialogical learning. They made sense of their enterprise skills and professional identity as they created their activity artefact and then again in the finished visual artefact that enabled them to see the tangible nature of their professional identity and their strengths and weaknesses. Dialogical learning and

meaning making also occurred as students shared their work and collaborated with others. By sharing activity artefacts, they gained an insight into others diverse professional identities and how they expressed their enterprise skills in relation to their project work

Other recommendations and insights:

The activities should be designed not only to enable students to reflect, but it should also include a specific enterprise skill which students can practice in this "safe place". For instance, the Introduction Video where students had to make, edit and upload a two-minute video, enabled digital literacy skills, and the Bio Infographic enabled visual literacy skills.

The community should also be supported by a student-centered learning environment. This includes:

- Culture and Belonging - touchpoint should be provided that allow for consistent engagement with the community and relationship building and a sense of belonging. This could be via a social get together in the first face to face class or by facilitating a structure in the google hangouts that allows for a personalised chat at the start of the session. Each student will also add to the culture and this needs to be monitored to ensure that it doesn't become dull or superficial.
- Student preparation - the course website allowed students to access briefing documents in preparation and a briefing meeting was held four months prior to the course starting. In this briefing, students were made aware of their role in finding a project and industry mentor. The project scope should have the capacity for learning and.

In designing the next iteration of this course, I will be considering firstly how to create an even safer space for reflection by dividing students into smaller groups for further private discussion and mentoring specifically relating around professional identity and enterprise skills and secondly how to design a final assessment task that highlights enterprise skills as part of their overall project and placement experience and alongside their discipline skills development.

The role of the tutor.

It has become clear from this research that the role of the WIL tutor is quite different to that of other higher education tutor roles. In this position, the tutor is required to have broad industry expertise and authentic industry experience so they can consult on the variety of students' project being completed. They also are required to have a knowledge of the current discourse on enterprise skills and ways of working and have a strong sense of their own professional identity so that they can lead by example. Finally, this tutor should have a strong understand of the learning and teaching framework and pedagogy that best support students within this online environment. Knowing how to interpret black boxes and make them transparent, question a student's professional identity and create supportive learning relationships, can take a tutor into a role that is quite different to other discipline specific courses.

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Supporting professional identity and personal resilience in a first semester professional experience course for graduate entry occupational therapy students

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Abstract

Professional graduate entry programs, such as the Master of Occupational Therapy, required students to develop the knowledge, skills and attributes of the profession within a relatively short period. Professional identity is said to be a protective factor in sustaining resilience in the face of difficulties that arise within the workplace and is therefore an important component of curricula for health professionals such as occupational therapy. The majority of current student cohorts are millennial students and they have been identified as having preferred learning strategies as well as often expressing feelings of stress, anxiety, and being overwhelmed. This project trialled pre- and post-practicum strategies, which supported the cohorts preferred learning approach and were aimed at developing professional identity and resilience. Twenty-two first year occupational therapy masters students participated in the study. Pre-post intervention data was collected via the brief resilience scale (BRS) and professional identity scale (PIS). Student feedback on the extent to which various strategies supported their practicum learning was also collected and educator reflections were also used.

Three pre- practicum workshops were redesigned to focus on professional identity and resilience and two post-practicum tutorials employed learning circle methodology to develop reflective and critical skills to support the development of professional identity and resilience.

Whilst there was no significant change in the pre- and post-mean scores on the BRS or PIS students did rate the workshop focused on resilience more highly. Student engagement in the 'learning circles' was active and productive. Compared to the 2016 course evaluation data this cohort of students were more satisfied with the course with a mean score increase of 60 as well as a 24% increase in response rate.

Brief description of academic area and students involved

The Master of Occupational Therapy program at the University of South Australia is a 2-year accredited professional entry level program. Eligibility criteria include an undergraduate degree with a minimum GPA of 5.0 plus the following pre-requisite courses at AQF Level 7:

- Human anatomy
- Human physiology
- Human psychology or sociology, and
- Research methodologies.

International applicants are required to have an ILETS of 7 in all domains.
Twenty to twenty-five students gain entry into the program each year. The intensive workload across the 2 years, which includes 1,000 practice hours, is reported by students to be stressful, challenging and rewarding.

Particular Purpose

Professional graduate entry programs, such as the Master of Occupational Therapy, required students to develop the knowledge, skills and attributes of the profession within a relatively short period. Development of a professional identity is a dynamic process shaped by pre-program experiences, curricula content and practice experiences (Ashby, Adler & Herbert, 2016). Professional socialisation also contributes to the development of professional identity (Adams et al., 2006) and the opportunity for professional socialisation within graduate entry programs is limited to a 2-year period. The 1,000 hours of practice education is considered a key component in professional identity formation providing a bridge between theory and practice (Gat & Ratzon, 2014).

Professional identity can act as a protective factor to sustain resilience in the face of difficulties arising within the workplace associated with work-related stress, role blurring and professional burnout (Ashby, Ryan, Gray & James, 2013; Edwards & Dirette, 2010; Scanlan, Still, Stewart & Croaker, 2010). Resilience is the ability to bounce back or recover from a stressful or adverse event (Smith et al., 2008). The majority of current student cohorts are classified as 'millennials', having been born between 1981 and 2000. Millennials have been described as being hyper focused on achievement (Howe & Strauss, 2007) and often express feelings of stress, anxiety, and being overwhelmed (Much, Wagener, Breitkreutz & Hellenbrand, 2014, p.38). Moreover, due to 'child-centric' parenting styles (Holt, Marques & Way, 2012) in which participation was rewarded over achievement (Monaco & Martin, 2007; Much, Wagener, Breitkreutz, & Hellenbrand, 2014; Sandeen, 2008) they are more likely to have an inherent sense of feeling 'special', entitled, and confident (Rickes, 2009; Venne & Coleman, 2010). In terms of educational experience, they seek a personalised approach that takes account of their personal welfare with an opportunity to interact with the teacher (Sandeen, 2008).

The unique characteristics of a millennial cohort within an intense 2-year program, which requires students to deconstruct any previous professional identity to reconstruct an occupational therapy identity creates distinctive challenges. The student's first practice education course provides an opportunity for essential foundation work to support the development of professional identity and resilience.

Enacted post-practicum interventions

The first practice experience course within the graduate entry program is in the first semester and includes 4 pre-placement workshops, a one-week simulated placement plus 120 hours (1.5 days per week across 8 weeks) of placement in a practice setting with fortnightly tutorials to support knowledge and skill development across the placement. Students are expected to apply learning from concurrent courses to their placement experience.

Three of the workshops and two of the tutorials were redesigned to provide opportunity for students to:

- Explore their current understanding of the profession and their professional identity
- Reflect on their personal resilience and develop strategies to assist them in managing stress/ adverse situations
- Develop reflective and critical skills to support the development of professional identity and resilience.

Professional identity

Three main strategies were employed in a workshop focused on professional identity

1) Open text survey of 3 questions to ascertain what students thought occupational therapists do; what the underlying values of occupational therapy were and how they describe to others what they are studying. The text responses were converted to word clouds and shared with the group to provide a visual representation of the group's perspective.
2) Reading and critiquing a book chapter that provided an overview of occupational therapy within the Australian context. In small group discussion students reflected on their current understandings and identified what the reading added to this as well as aspects which surprised them and why.
3) Listened to an occupational therapist deliver a TedTalk, which outlined the collaborative problem-solving approach in which the client was the expert. This was followed by group discussion to unpack how the approach was the same or different to their previous method of thinking and working with people.

Personal resilience

Resilience was woven into two workshops within the context of population data on mental ill health and need to work on positive mental health outcomes. In the first workshop the notion of resilience was introduced, and students discussed current strategies they used to manage stress. Part of the second workshop focused on the use of mindfulness as a stress management including some mindfulness exercises being trialled. Small group discussion of how and when such strategies could be useful on placement was undertaken and students were provided with additional resources they could access.

Reflective and critical skills

The fortnightly tutorials, which take place across the second placement experience focus on clinical reasoning and had previously been teacher led. Based on the millennial student's preference for personalised small group learning two tutorials were redesigned to use the 'Learning Circle' methodology, which assist in the development of critical skills (Newton, 2011).

Data gathered and analysed

Following ethical approval from UniSA HREC the 22 students enrolled in the course were invited to participate in the study. All students gave consent to participate. Data collected included:

- Course evaluation data
- Evaluation survey of course activities – student perceptions of which workshop activities were the most supportive of their learning on placement
- Brief Resilience Scale – pre- and post-intervention.
- Professional Identity Scale – pre- and post-intervention
- Learning circle facilitator notes

Descriptive statistical analysis was undertaken on quantitative data.

Key Findings

Participant characteristics

Twenty-two (13 female, 9 male) participants aged between 38 - 22 years (mean age 25 years). Three of the female participants were international students.

Course evaluation data

The 2017 course evaluation data showed a significant improvement in comparison to the 2016 data both in response rate (24% increase) and overall satisfaction (+60 in mean score).

Moreover, the 2017 respondents indicated that the staff member maintained a class environment that made them feel comfortable about participating. Pedagogical changes were made to the structure and content of the workshops and tutorials to better align with millennial student preference for a collaborative and interactive learning environment. Acknowledging the prevalence of stress, anxiety and mental health issues and the need to develop protective and supportive strategies helped create a safe and non-judgemental environment in which students were more open to share things they found tricky. For example, one student provided personal feedback on how liberating it was for this to be acknowledged and how they had used the resources provided to actively manage their anxiety.

Evaluation survey of course activities

Time was set aside in a tutorial during the second placement period for students to reflect on how well course activities had prepared them for placement and to also re-visit any knowledge or skills they felt unsure about. Results of the survey can be seen in Table 1 where it can be seen that students found 'looking at resilience and stress management' to be the most supportive and 'reading & critiquing book chapter' to be the least supportive.

Table 1 *Key results from evaluation survey of course activities*

Item	Mean	SD
Workshop 1: Thinking like an occupational therapist		
Open text survey	5.09	0.77
Reading & critiquing book chapter	4.47	0.93
TedTalk	5.38	0.92
Workshop 2: Communication and resilience		
Reviewing communication skills, feedback cycle	5.38	0.80
Looking at resilience and stress management	5.43	0.75
Workshop 3: Keeping yourself and those around you safe		
Manual handling techniques	5	1.58
Mindfulness techniques	5	0.94

7-point Scale: 1=least supportive and 7 = most supportive to placement experience

In terms of re-visiting any knowledge and skills the student group directed discussion to technical questions regarding a forthcoming assessment, which is in keeping with the view that millennial students tend to focus on the performance outcome rather than the learning process itself (Howe & Strauss, 2007). Moreover, Hills et al (2015) describe this generation as wanting to quickly become experts without always acknowledging the need for time and effort to achieve deep learning. Working with this dynamic can be challenging in that it requires the educator to provide opportunities for students to test or apply their knowledge/ skills to discover their limits and the need for deeper learning. Interestingly students rated the one-week simulated placement, which is embedded within the course, as the most useful activity in supporting their capacity to manage their 120-hour practice based experience (See Table 2). Montenery et al (2013) found nursing students preferred simulated experiences for skill development as it allows opportunity to gain confidence in effectively applying knowledge/ skills in a safe environment. Simulated placements/ learning experiences need to be authentic in order to create the right environmental press for students to value them. This student cohort felt the off-campus location, complexity of patient's issues and performance of actors (simulated patients) created an authentic learning experience.

Table 2 *Ranking of activities*

Rank	Activity	Score
1	Simulate Placement	1.19
2	*Workshop 2: Communication and resilience	3.14
3	Workshop 4: Cultural Awareness & Responsiveness	3.3
4	*Workshop 1: Thinking like an occupational therapist	3.42
5	*Workshop 3: Keeping yourself and those around you safe	3.81

Ranking: 1 = most useful and 5 = least useful in supporting capacity to manage second placement
*Re-designed workshops

Personal resilience

The Brief Resilience Scale (Smith et al, 2008) was used to measure change in student's resilience. Table 3 shows mean scores and standard deviation for each item as well as overall scores. The mean scores indicate that the student cohort had a neutral orientation trending to positive suggesting opportunity to further develop their resilience. However, the overall score showed minimal increase from baseline to post-intervention (mean change = 0.12; p=0.614) suggesting that the intervention lacked efficacy.

Table 3 *Brief Resilience Scale Pre- and Post-Scores*

	Pre (*n* =22)		Post (*n* =18)	
The Brief Resilience Scale	M	SD	M	SD
I tend to bounce back quickly after hard times	3.5	0.96	3.5	0.71
I have a hard time making it through stressful events	3.32	1.04	3.38	0.77
It does not take me long to recover from a stressful event	3.41	1.05	3.44	0.70
It is hard for me to snap back when something bad happens	3.36	0.90	3.44	0.85
I usually come through difficult times with little trouble	3.59	1.10	3.33	0.76
I tend to take a long time to get over set-backs in my life	3.45	0.96	3.83	0.78
Total scale scores	3.37	0.18	3.49	0.134

5-point Scale: 1=strongly disagree, 2=disagree, 3=neutral, 4=agree, 5=strongly agree

Professional identity

The Professional Identity Scale (Adams, Hean, Sturgis & Macleod Clark, 2006) was used to measure change in student's professional identity. Table 4 shows mean scores and standard deviation for each item as well as overall scores. The overall score showed minimal increase from baseline to post-intervention (mean change = 0.15; p=0.13). However, the mean scores indicate that the student groups sense of professional identity was already moderate, which challenges the professions narrative that is often linked with the 2-year graduate entry program.

Table 4 *Professional Identity Scale Pre- and Post-Scores*

	Pre (*n* =22)		Post (*n* =18)	
Professional Identity Scale	**M**	**SD**	**M**	**SD**
I feel like I am a member of this profession	2.86	1.04	3.83	0.71
I feel I have strong ties with members of this profession.	2.41	0.85	3.38	0.61
I am often ashamed to admit that I am studying for this profession.	4.95	0.21	4.5	1.29
I find myself making excuses for belonging to this profession	4.77	0.68	4.72	0.95
I try to hide that I am studying to be part of this profession	4.77	0.87	4.72	0.95
I am pleased to belong to this profession.	4.77	0.43	4.61	0.98
I can identify positively with members of this profession.	4.18	.73	4.33	0.76
Being a member of this profession is important to me.	4.45	0.51	4.33	0.97
I feel I share characteristics with other members of the profession.	3.86	0.56	3.94	0.64
Total scale scores	4.11	0.42	4.26	0.72

5-point Scale: 1=strongly disagree, 2=disagree, 3=neutral, 4=agree, 5=strongly agree

Neither tools evidenced significant change pre=post intervention.

Learning Circles

The use of Learning Circles in tutorials running alongside the second placement (120hrs) appeared to be a positive intervention. Students actively engaged in the process in a supportive and collaborative manner, ensuring each person in the circle had opportunity to share their experiences. It was heartening to see international students, who had a tendency to take a passive role in discussion, being prompted and supported to share their experiences and respond to questions from their peers. There was a positive energy in the room and students remained on topic for the allotted time. The examples each circle chose to share with the larger group evidenced they had discussed complex issues that they had experienced on placement; some with ethical tensions in relation to service options and others with the challenge of working with people who have complex comorbidities. Student feedback indicated they would have liked to have more opportunity for discussion with the educator rather than just on their own. The students are at the very beginning of their study program and indicated that they felt there was a lot they did not know and would like feedback regarding 'how on track' their thinking was.

Discussion

- Measuring outcomes of pre- and post-practicum experiences with small student cohorts (20-25 students) can be problematic.
- Do commencing graduate entry students have a stronger sense of professional identity than commencing undergraduates and if so how can this be utilised within curriculum development?
- What are the most effective strategies to employ in an accelerated 2-year graduate energy program to develop student resilience and future professional resilience?
- Can the 'Learning Circle' method be adapted to support students to develop the questions they need answers to rather than seek approval for what they are doing right from the educator?

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Occupational therapy students preferred method of reflection during a fieldwork placement: video, written or artistic?

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Abstract

The purpose of this project was to determine the preferred methods of reflection that third year occupational therapy students choose when offered a choice of reflective medium. For our study, students could choose either written, video, or an artistic format. The students completed five reflections during and after a fieldwork placement an aged care residential facility (75 hours onsite. The students chose from 30+ topics from that focussed their refection on their practice skills, effectiveness as an occupational therapist, and clinical reasoning, as well as a variety of other topics.).

A total of 68 students completed an online survey, which collected quantitative and qualitative data. The students completed 340 reflective pieces with 81% preferring the video format, 18% selecting the written format, and only two students choosing an artistic format.

The most commonly selected and most useful topics were “Critique your interpersonal, communication, and assertive skills” (57%) and “Critique your emotional resilience and coping skills” (43%). Students reported that the video format was preferred because it was easier to express emotions and that the video format allowed them to use verbal communication, which was the same format of reflection and clinical reasoning used during clinical placements. Students selected the written format because it was easier to edit and correct mistakes and some students lacked confidence in verbalising their reflections and clinical reasoning.

University educators are recommended to offer a choice of reflective medium to students and ensure that a large percentage of reflective tasks are completed in a verbal format, especially in units leading up to clinical placements so that students practice verbalising reflections and clinical reasoning.

Brief description of academic area and students involved

The study took place over Semester 2 of 2017 when 140 students were enrolled in the unit. The authors emailed all 140 students enrolled in the OCCT3004 Integrated Occupational Therapy Professional Practice unit inviting them to participate. Four email reminders were sent over a four-week period.

Particular purpose

The aim of this project was to determine the preferred methods of reflection of third year OT students. For our study, students could choose either written, video, or an artistic format. Reflective practice is a critical employability attribute in the occupational therapy profession and across all healthcare professions (Dacre Pool & Sewell, 2007; Rodger, Fitzgerald, Davila, Millar, & Allison, 2011; Schell, 2009). Occupational therapy students are regularly required to use reflective practice in coursework assignments and fieldwork placements, which are traditionally completed using a written format, such as a learning journal (Moon, 2006; Stagnitti, Schoo, & Welch, 2010). Determining the preferred method that third year occupational therapy students choose to reflect

or critique their practice and effectiveness will be of interest to university educators and fieldwork supervisors.
Specifically, the research questions were:

1. When offered a choice of either video, written, or an artistic media, what is the preferred format for reflection of occupational therapy students during an aged care residential fieldwork placement?
2. Why do students select written, video, or artistic media for reflective tasks?
3. Which refection topics do students find the most useful?

Enacted post-practicum interventions

THE FIELDWORK PLACEMENT

Participants in the study were third year occupational therapy students enrolled in the OCCT3004 Integrated Occupational Therapy Professional Practice unit as part of their Bachelor of Science (Occupational Therapy) program at Curtin University. Students undertook a mandatory fieldwork placement where students spent a minimum of 75 hours onsite at an aged care residential facility working in the role as the student occupational therapist. Students spent one to two days per week at the site and were free to negotiate their own working hours. Students worked in pairs. Each pair was allocated four residents with whom they worked with over the semester. Students were encouraged to manage their own caseload. For example, if a resident passed away or was not participating in the program, the students could then take on new residents. Students were allocated an on-site staff member who provided some guidance and advice. In most sites an OT undertook this role, but in sites where no OT was employed, a physiotherapist or nurse assisted the students.

The learning outcomes for this unit were:

1. Demonstrate professional behaviour and accountability;
2. Demonstrate clinical reasoning to a professional standard in a health or human service context;
3. Form an effective therapeutic relationship with a health consumer;
4. Critically reflect upon fieldwork and academic experiences; and
5. Demonstrate ethical practice.

Learning Outcome 4, the critical refection, formed the focus for this research project.
Through the fieldwork placement, students aimed to:

- Demonstrate professionalism in behaviours, attitudes, and resident and staff interactions, before, during, and after the fieldwork placement; and
- Demonstrate clinical reasoning by:
    - Being able to select appropriate OT assessment tools;
    - Interpreting assessment data;
    - Identifying one or two realistic occupational goals that can be achieved over the semester;
    - Trialling and implementing strategies that will assist each resident to achieve their goals;
    - Evaluating the outcomes of the OT programs; and
    - Completing handovers of sustainable strategies to facility staff, including the OTs, OT assistants, or nurses.

Students attended a weekly two-hour tutorial (24 hours of tutorials in total over the semester) where the only content was to debrief about the fieldwork placement. Tutorials had minimal structure, which allowed the majority of the time to be spent discussing challenging practice issues that each student identified. Tutorials allowed students to share information and ideas, discuss difficult or ethical dilemmas, and learn from each other and the OT who facilitated the tutorials.

DE-BRIEFING INTERVENTION

Students completed five reflective pieces during the semester whilst they fulfilled the requirements of the part-time fieldwork placement. Of importance to this study, students were given a choice of the medium they used for the reflective task. For each of the five reflective pieces, students could choose either video, written, or an artistic medium.

Students were given a comprehensive list of potential topics to choose from with the option of creating their own topic (see Appendix B). Each reflective piece required the student to critique their effectiveness as an OT and their clinical reasoning. The aim of the reflective or critique task was for students to enhance their reflective practice skills in preparation for full-time fieldwork placements in the fourth year of the OT program. Appendix A contains the instructions students were given. For each reflective piece students were required to:

1. Select a dilemma or issue that had personally been involved with during the fieldwork placement and describe what occurred and their role. The dilemma or issue could have occurred during any interaction with a resident, during an assessment or intervention sessions, when interacting with a staff or family member, or over a series of events that occurred over time;
2. Discuss what they learnt personally and professionally and show insight into their emotional reaction to the dilemma or issue;
3. Draw on evidence based practice and OT theory that was relevant to the incident; and
4. Research and write up an array of strategies they would use to enhance their future practice or deal with a similar dilemma or issue in the future.

The length of the reflective piece was left up to the student. Reflections were uploaded to the unit's course management system site for marking. Marks were weighted towards the use of theory and evidence and students' planned future actions.

Data gathered and analysed

The study used a mixed method design whereby quantitative and qualitative data were collected at the same time using the Qualtrics survey website (Appendix B). Students completed the survey subsequent to the completion of the fieldwork placement and submission of all the reflective pieces. Appendix C contains the Participant Information Sheet, Consent, and the questions asked in the online survey.

The quantitative data was analysed using Excel and consisted of descriptive statistics such as counts, means, and standard deviations. The qualitative data was entered into the QSR International NVivo 10 Software package for thematic analysis and identification of themes (NVivo, 2012).

Key findings

Sixty-eight (68) students (63 female; 5 male) consented and completed the online survey, a response rate of 49%. Students were asked about their previous experience in working in aged facilities (for example, as a therapy assistant or carer). Only one student was currently employed and three had previously worked in the aged care sector. Eighteen students (26%) had never been into an aged care facility prior to this fieldwork placement.

A total of 340 reflective pieces were submitted. Table 1 summarises which of the three reflective formats the students selected.

Table 1 *Summary of the reflective format selected by students*

Format selected for reflective piece	**N** Total = 340	**%**
Written	60	18%
Video	276	81%
Artistic	4	0.01%

Analysis of the qualitative data identified a range of reasons why each format was the preferred method of reflection. The negatives of each format are also presented.

Video format

The video format was selected for 81% of the 340 reflective pieces. The reasons for selecting video were:

- It allowed a natural expression of emotions;
- Speaking was the same format of reflection and clinical reasoning used during clinical placements;
- It was quicker than writing; and
- It was easier to explain the background and context of the reflection.

Students reported the video format allowed for a more natural expression of emotions. They also said it was easier to express negative emotions such as anger, which could have been conveyed by banging the desk or using a harsher pitch in their voice. Students felt video allowed them to demonstrate genuine interest and compassion for the resident they were talking about. Students stated that because they could actively use facial expressions, hand gestures, non-verbal body language, changes in tone and pitch of the voice, and show their own personality, video was a more natural way of communicating emotions to the assessor. As these students stated:

> Video was the "…truest way to show my ups and downs while working through the placement" (Subject 41).
>
> "I also found that I was much more likely to be honest in a video rather than writing, as with a video once it was done it was done, it was honest and a true reflection, whereas with a written reflection I could have edited out anything I did not want to include" (Subject 47).
>
> "The emotional context and aha moments were easier to portray in video than in written format" (Subject 20).

Students repeatedly reported that video reflection used the same medium – i.e. speaking – which was the most common method of clinical reasoning and refection during clinical placements. Students benefitted from watching and listening to their video reflections. As this student noted "As a result of recording my critiques I was able to replay my video and further reflect on my performance and how I could improve in the future" (Subject 35). Students reported that video allowed them to verbalise the terminology and jargon they would be required to use during clinical placements. Some students reported recording the videos multiple times and editing together their preferred responses. These students reported that they felt that the re-watching and re-recording the reflection would assist them in verbalising their clinical reasoning during placements.

Students felt that video was a quicker medium, compared to writing, to explain the background story or context. Students said that writing the same story was tedious and time-consuming. Verbally telling a story was reported to be much quicker than typing, which involved multiple edits and re-writes to give an accurate portrayal of the background story or context. As this student said "I didn't have to be perfectly correct as I could self-correct when speaking" (Subject 3).

The negatives of using the video format included software and technical problems, including having never used video software, the time it took to edit video into the final version, and

interruptions from family members in the middle of videoing. Some students stated they did not like having to listen to their own voice and that videoing was not a usual format used for assignments.

Written format

The written format was selected for 18% of the 340 reflective pieces. The reasons for selecting the written format were:

- It was easier to edit and correct mistakes;
- Students could review the written work and insert important parts that were missed; and
- Student reported a lack confidence in verbalising their thoughts so written was a safer format.

Students reported that writing allowed them to rapidly edit mistakes, especially errors in grammar, compared to video where they felt they would have to re-record entire responses. Some students felt reassured by the ability to edit their work. As stated by this student "I could perfect my critique easier than having to re-record every time I made a mistake" (Subject 51). Students who preferred the written format reported they could easily proofread their responses and insert new ideas or thoughts. Whereas this was difficult in the video format. Of concern, a few students felt under-confident in verbalising their reflections and thus preferred the safety of the written format. This student stated, "I am not a confident speaker and still needed to pre-plan what I wanted to say in detail, so written critiques ended up being quicker for me to produce than video" (Subject 40). Students who selected the written format identified the following negatives. It was difficult to present the authentic emotions using written language. As this student stated, "When writing, the assessor can't see facial expressions or hear tone of voice, which adds value & context to a critique" (Subject 49). The students also noted the extensive amount of time it took to write and proofread a comprehensive reflection.

Artistic format

Only two students selected the artistic format and completed four reflective pieces. All four artistic pieces were presented as songs with the student playing a guitar. They had written the lyrics and music themselves. They reported that the musical format utilised their interests and kept them engaged in the reflective task. As this student wrote, "I enjoy singing and playing music and this was a way I could use that while thinking about situations and writing about them and then singing them" (Subject 66). Some students reported they did not use the artistic format, despite wanting to, because it was not a method of reflection that was used during clinical placements.

Table 2 presents the most commonly selected topics and the percentage of students who selected these commonly selected topics. The most common topics selected were "Critique your interpersonal, communication, and assertive skills" with 57% of students choosing this topic, and "Critique your emotional resilience and coping skills" with 43% selected this topic.

Table 2 *The most commonly selected topics and the percentage of students who selected these topics*

Topic selected	Number of students who selected the topic	% of students who selected the topic
Critique your interpersonal, communication, and assertive skills	39	57%
Critique your emotional resilience and coping skills	29	43%
Critique an intervention you implemented with a resident	27	40%
Critique your first 2 or 3 days on fieldwork	22	32%
Critique why you became frustrated or annoyed during the placement	16	24%
If you had a strong emotional reaction to something that occurred, critique how you coped	16	24%
Critique your initial interview skills	14	21%
Critique how you concluded the therapeutic relationships with residents at the end of the placement	12	18%
Critique your use of evidence-based practice	11	16%
Reflect on your preparedness for 4th year full time fieldwork placements	10	15%
Critique how you dealt with an ethical issue	10	15%

Table 3 presents the topic that students reported as being the most useful. Students could only select one topic. The topics considered the most useful were “Critique your interpersonal, communication, and assertive skills” and “Critique your emotional resilience and coping skills which were selected by 12% and 10% of students respectively.

Table 3 *Topics that the student reported as the useful*

Topic selected	Number of students who selected the topic	% of students who selected the topic
Critique your interpersonal, communication, and assertive skills	8	12%
Critique your emotional resilience and coping skills	7	10%
Critique an intervention or assessment you completed with a resident	5	7%
If you had a strong emotional reaction to something that occurred, critique how you coped	5	7%
Critique your initial interview skills	5	7%
Reflect on your preparedness for 4th year full time fieldwork placements	5	7%
All five topics I selected	4	6%

The reason that students considered the interpersonal, communication, and assertion topic the most useful was that they identified that their most significant skill deficits were in applying these skills with healthcare consumers and other healthcare professionals. As this student stated, “…because communication skills are important to have in all fields of OT. You can have solid ideas on interventions but may not be able to deliver it properly because you may lack the interpersonal skills” (Subject 30). They also reported that they thought they were able to be assertive at their place of paid employment or with family members, but being assertive in a team of experienced healthcare professionals was far more difficult than they had imagined. This student stated, “I

thought I was assertive before starting placement but quickly realised I'm not and this critique helped me realise why and what I need to do to change" (Subject 53).

Students reported the reason as to why they considered the 'emotional resilience and coping skills' topic the most useful was because they realised they needed to mature in order to deal with emotionally complex scenarios that clinical placements presented to them. As this student stated, "…it made me address some internal struggles/grief that I needed to resolve in order to the best OT I can be" (Subject 38). Students realised they had been required to consider their own emotional resilience before attempting a reflection on this topic as reported by this student:

> "Because I had not really thought too deeply about my emotional resilience prior to this and how much it would impact my practice as an OT. Therefore, this gave me the opportunity to explore the topic more, my strengths and weaknesses and how I can change" (Subject 39).

Discussion

The findings of this study raised the following interesting learning points and recommendations:

1. University educators should offer choice of various reflective media to students;
2. University educators should ensure that a large percentage of reflective tasks are completed in a verbal format, especially in units leading up to clinical placements so that students practice verbalising reflections and clinical reasoning;
3. Students who identify as under-confident in using video formats should be encouraged to practice using the verbal format more often in order to rehearse for clinical placements;
4. University educators are encouraged to provide more opportunities for students to develop skills to deal with the emotional scenarios that students are presented with during clinical placements; and
5. University educators should avoid the use of artistic formats of reflection as they do not match how reflection is done during fieldwork placements.

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Business students' perceptions of completing teamwork as part of post-practicum learning experiences

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Abstract

This study investigated ways to improve teamwork assessments that were positioned within Work-Integrated Learning units of study as post-practicum learning experiences for undergraduate and post-graduate business students at an Australian university. An evaluation research model was used to examine and evaluate teamwork assessment curriculum within placements, and project-based programs from 2017-2018. Students were invited to participate in an online survey pre- and post- their completion of a teamwork assessment. Additionally, students were invited to take part in a focus group recorded interview to further elicit their responses about the challenges and opportunities when undertaking teamwork assessments as part of a Work-Integrated Learning experience. The results were analysed using standard mixed method analysis techniques with two key themes emerging, which were, (1) purpose and approach; and (2) working with industry. The study's implications, its limitations as well as the development of a set of key recommendations for utilising effective teamwork assessments as part of post-practicum learning is presented.

Brief description of academic area and students involved

Business students, where this study took place, who complete an international and/or local Work-Integrated Learning experience often are requested by teachers to evidence their technical skills that they have learned or developed. Less often, are business students specifically invited to focus on their employability skills that they have acquired via a Work-Integrated and experiential learning experience such as working in teams, oral communication and the skills required to resolve conflict effectively. At times, this can be due to the assessment structure for business education, where often there is more of an emphasis on students' evidencing their technical and business knowledge skills. Therefore, many business students find it challenging to present their ideas verbally or to communicate their personal and professional thoughts in the written form, especially about their employability skill development areas that are required to become job-ready. To assist with further understanding these challenges and obstacles for students when completing WIL post-practicum learning experiences, the researching team for this study integrated an evaluation research method to elicit responses from business students pre- and post- teamwork assessments tasks as part of Work-Integrated Learning unit experiences. We also invited students to take part in a focus group interview to further elicit their responses of the ways in which to assist them to develop a self-learning framework that centres on encouraging, nurturing and supporting the learning when articulating and evidencing their employability learning journey for teamwork.

Particular purpose

The implementation of 'best practice' teamwork assessment criteria is important for business education as it aims to provide business students with an opportunity to consolidate learning upon the completion of a Work-Integrated Learning unit of study that

has incorporated an authentic industry and/or industry-like experience/practice. The post-practicum teamwork activities aimed to link the learning experience for Work-Integrated Learning with what occurred in the workplace such that, students felt confident for developing their job-readiness. However, without understanding students' perspectives about the challenges and obstacles of undertaking WIL post-practicum assessments and learning for teamwork, we often assume that assessment tasks for teamwork are enough. By conducting a research project that focused on eliciting responses from students about their perceptions of post-practicum WIL assessment tasks for teamwork has assisted us to evaluate the WIL assessment design for the Business School and to assist students to understand, reflect and articulate important employability skills for when they need to then identify their own strategies for adapting to the realities of the workplace.

Enacted post-practicum interventions

We implemented a uniformed approach to all WIL units' debriefing sessions with a careers development learning framework (on the completion of all post-practicum group work assessments). This allowed business students to experiment and practice articulating and evidencing their teamwork experiences while enriching their understandings around distinctive kinds of employability skill development and knowledge for their career journey. Additionally, we implemented individual student feedback within the learning management system to help focus on their learning experience during Work-Integrated Learning units of study. This was completed by integrating a set of short (200 words) reflective peer-to-peer blogs where students received feedback from their peers and their unit coordinator. This was achieved prior to a major reflective report that was due towards the end of the Work-Integrated Learning unit of study, encouraging feedback cycles for improving student practice for teamwork.

Data gathered and analysed

We invited business students (N=100) to complete a pre- and post-online survey instrument who had teamwork assessments tasks as part of their Work-Integrated Learning unit experience (summative assessments). We also collected data from a student focus group interview (N=TBC) that occurred once the Work-Integrated Learning unit of study had been completed. The first author also undertook regular reflective journal writing occurrences while the research project was being conducted. These data collection processes aided in documenting learning observations, students' challenges and the learning benefits that arose during the investigation for both students and teaching staff.
This report illustrates the pre-post-practicum survey results only. The post-practicum and student focus group results will be made available in a future report.

Key findings

Pre-Post-Practicum experience survey: Sixteen students completed the pre-survey with 30% being male. Sixty nine percent of participants suggested that they had completed 9 or less times a teamwork assessment during their program. Many of the participants' age range was between 20-24 years of age. Fifty six percent of the participants were local students with the majority being undergraduate students in their second year of study (81%). The students' business disciplines were Finance (30%), Accounting (15%), Business Analytics (15%) and International business (15%). The main learning expectations that students listed prior to completing a post-practicum team-based assessment were: job-readiness, cultural competency, teamwork and communication skills, namely oral presentations. Students listed similar notions when asked if they believed that the unit would assist them with these expectations. Many students suggested that they believed that the pre-post-

practicum teamwork assessment was essential or very important to their learning experience (84%). Students also noted that they believed that the pre-post-practicum team work assessment was either going to be extremely challenging or quite challenging (45%) with other students suggesting challenging or not very (53%). The noted challenges for completing the teamwork assessment were: time management, working with difficult team members, communicating well, persuasion, working with others with different views and standards, multi-tasking and agreement on ideas as well as cultural and language differences. Students also suggested that they would require teaching support when working with industry, or navigating dispute resolution with team member as well as the need for mentoring and time management skills.

The findings from this study are not new in terms of the challenges and requirements for teachers to support the teaching and assessing of teamwork. However, what this study highlights is the need to clearly align students' expectations with their perceptions in terms of the following for teamwork learning for post-practicum programs:

(1) articulating and showcasing to students the variety of challenges of completing teamwork assessments and why;

(2) articulating and showcasing the support options that will be provided (and not provided) to assist students with teamwork challenges.

For example, one student noted that they expected, "everyone working together in a peaceful and supportive environment" and "be able to hear different perspectives and share one's opinions" via an "assessment that everyone is satisfied and excited about". Therefore, a curriculum transformation for teamwork learning during post-practicum experiences, which emphasises the need for students to develop and provide rules of engagement for their team members, will assist with students managing their time effectively and to approach difficult situations successfully, for example.

In a future report, further analysis will be presented to compare the pre-survey results with the post-survey and focus group interview. This in turn will provide further insight into how the curriculum re-design that has been implemented and further refinement has assisted students during their post-practicum learning experience (or not).

Discussion

- Preparation pedagogy is required prior to a post-practicum teamwork assessment being completed by students i.e. group-based assessments that reflect on industry learning and/or experience.
- A best practice approach for preparing teamwork pedagogy for team-based assessments for post-practicum learning – what might this look like?
- How to teachers best align students' expectations and perceptions when designing and delivering post-practicum team-based learning experiences, but also allow for students to take leadership in this area?

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AGRIWIL – “Embedding Employability into the Experience”

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Abstract

The aim of this post-practicum project was to implement an ‘employability’ intervention into a work-placement debriefing workshop. Students from the AGR1WIL program were invited to attend a placement debrief workshop to critically reflect on their work placement and articulate the skills gained during placement so they could then include the relevant experience on their resume and cover letter to use as leverage in securing subsequent work, study, and volunteer opportunities.

Reflective practise was an important part of the workshop and generated much discussion amongst the student groups. The facilitators observed, during the icebreaker activity, that some students initially appeared reluctant to share their experience and understated the tasks they carried out, for example ‘oh, I just cleaned out the dog cages’. These students required reassurance from the facilitators and other students in demonstrating to them that they undertook ‘like’ and ‘valuable’ experiences regardless of the simplicity of the task, size or type of organisation. For example, Andy’s Doggy day care compared to high profile placements such as Australia Zoo or Eco life expeditions set in Africa.

Students were then asked to participate in a rotating ‘Mind dump’ activity. Each group was given 6 – 8 minutes to discuss and to write down 4 – 5 dot points for the following headings; Interpersonal, Operational, Professional and Technical skills gained whilst on placement.

From the ‘Mind Dump’ activity, we observed students were intrinsically motivated to update their resumes; however, students needed to be heavily supported to articulate a suitable placement title and to capture details of tasks undertaken utilising industry recognised language. Even though instructed, many of the students did not bring a laptop to the workshop which impacted on their ability to undertake the activity.

Brief description of academic area and students involved

AGR1WIL is a for-credit work placement course, compulsory for first year students in the Bachelor of Animal and Veterinary Biosciences and an elective option for Bachelor of Agricultural Science students at La Trobe University. The subject is offered over winter and summer semesters (100 plus students in each instance) and was developed to encourage students in this generalist degree to extend their learning beyond the classroom, to gain awareness of the diversity of workplaces relevant to animal and agricultural science, to reflect on workplace issues and challenges, and to receive training in job seeking skills.

Particular purpose

Completion of placement signals the end of practitioner involvement in the WIL experience and we currently fail to capture the significance of the learning experience for the student. Through the introduction of a post-practicum intervention we will be following best practice

of a WIL experience: preparation, support, debrief, constructive alignment and authenticity[1].

We chose to implement a post-placement workshop debrief. The idea of the workshop was to enable students to share their experiences and demonstrate their work experience on both their resume and cover letter and what attributes they have gained to assist with securing employment. With the aim of being an authentic and valuable task students were directed to critically reflect and evaluate the skills they had gained during their placement that will be beneficial for them to place in their resume which will aid them in future career development and enhance the overall experience of AGRIWIL.

This educational intervention was chosen for both its formal and informal elements and because the students are already used to the concept of workshops as they form part of their course requirement.

Students who registered for the workshops were offered a $50 incentive to attend and complete the resume update activity within the workshop. Gift vouchers were issued to students once they had updated and submitted their resume and completed the workshop evaluation.

The educational purpose was to determine the 'value add' of a post practicum workshop through students reflecting on their placement experience, updating their resumes and providing feedback via the workshop evaluation survey as evident in Figure 5.

Enacted post-practicum interventions

The AGR1WIL Post Practicum workshops were delivered on 17/1/2018 and 23/1/2018. Overall, 17 students participated across the two sessions.
To assist with cultivating the workplace attributes students undertook a 'Mind Dump activity in groups with the following pre-defined headings 1. Operational 2. Technical 3. Interpersonal 4. Professional

Each group discussed and noted down the 'operational' aspects of their workplace experience. After 6-8 minutes, students passed their paper to the next group to undertake the same process for the next heading i.e. technical and so on.
Students were then asked to review the notes from each quadrant from the group who passed the paper to them and were to add or refine the notes as needed based upon their particular experiences. The facilitator solicited feedback on the process of reflection and offered feedback from their observations.

Each quadrant required students to reflect using a structured approach and to break down individual tasks to fit neatly under the relevant headings. Students were then encouraged to use the professional/technical language in developing key points to include on their resumes.
This approach was applied because the activity provided students with the opportunity to 'brain storm' and reflect on specific tasks and then place them under the relevant quadrant attribute-using professional language. With support, students could then pick off relevant attributes from one or many quadrants and apply them directly to their resumes.
Raelin (2006) supports this notion of 'reflection –in – action', and notes it often requires some level of facilitation to assist learners in framing their knowledge into critical inquiry.

[1] http://acen.edu.au/wil-impact/wp-content/uploads/2016/05/All-WIL-Good-Practice-Guides.pdf

Data gathered and analysed

Quantitative and qualitative methods of data collection were used to evaluate the project. Quantitative in terms of data obtained from the post practicum workshop evaluation and Qualitative in terms of how students applied changes to their resume and how and why they make these changes.

Demographics

22 students in total registered for the Post Practicum workshops. 12 students registered for the workshop scheduled for the 17th January and 10 for 23rd January 2018, of which we received 17 students in total attending across both workshops. Of the 5 students who initially registered but did not attend, 1 emailed to advise she was feeling unwell.

11 female students and 6 male students attended the Post Practicum workshops. The average age of the workshop participants was 20.5 with 41% being aged 19yrs old. 76.4% of the students who attended the workshops were local with 23.5% being international.

Course details

Of the 17 students who attended the workshop, 13 students were enrolled in the Bachelor of Animal and Veterinary Biosciences, 2 students were enrolled in the Bachelor of Agricultural Sciences and one each in the Bachelor of Biological sciences and Bachelor of Science. All of the students were located at La Trobe's Bundoora campus.

Placement details

Students undertook their 70-hour, full/part time AGR1WIL placement across 16 organisations between 20 November and 22 December 2017. Two students undertook their placement at La Trobe's Wildlife Sanctuary. 14 of the organisations were based in Victoria with one based interstate in Beerwah, Queensland and one overseas in South Africa. Of the 17 placements, eight were entirely self-sourced by the student, seven of the students were directed to the organisation from a list provided by the University (based on previous host placements) and one student secured a University sourced placement with Australia Zoo.

Table 1 *Names of the organisation and the degree type*

Placement organisation	Degree type
Andy's Doggy Day Care	Bachelor of Science
Australia Zoo	Bachelor of Animal and Veterinary Biosciences
Brimbank City Council	Bachelor of Animal and Veterinary Biosciences
Bundoora Park Farm & Café	Bachelor of Animal and Veterinary Biosciences
Chesterfield Farm	Bachelor of Animal and Veterinary Biosciences
Eco Life Expeditions South Africa	Bachelor of Animal and Veterinary Biosciences
FeedTest	Bachelor of Agricultural Sciences
Greencross Vets	Bachelor of Animal and Veterinary Biosciences
K9 Workouts	Bachelor of Biological sciences
La Trobe Wildlife Sanctuary 2x	Bachelor of Animal and Veterinary Biosciences
MA & W de Boer	Bachelor of Agricultural Sciences
Paynter Farms Ellinbank	Bachelor of Animal and Veterinary Biosciences
Pitter Patter Paws	Bachelor of Animal and Veterinary Biosciences
Sandy Paws Dog Grooming	Bachelor of Animal and Veterinary Biosciences
Second Chance Animal Rescue	Bachelor of Animal and Veterinary Biosciences
Victorian Animal Cancer Care	Bachelor of Animal and Veterinary Biosciences

Key findings

17 student resumes were analysed once they had attended the post-placement workshop. The coder focused only on the parts of the resumes which described the AGR1WIL placements. Each discrete reference to the placement was coded, using a deductive coding framework consisting of the categories of workplace tasks that were used in the workshop reflective activity:
Interpersonal: describing working with colleagues or clients, such as teamwork or customer service
Operational: describing the procedures and systems used by the host organisation, such as record-keeping or facilities management
Professional: describing self-management and professional behaviour, such as time-management or exercising initiative
Technical: describing tasks that require discipline-specific knowledge or skill to do correctly.
In addition, one further code was applied:
Physical: describing labour that requires little specific knowledge or skill to do correctly.
17 student resumes (items) made 74 references (coding references) to discrete tasks, activities, or skills in their descriptions of their AGR1WIL placement on their resume. That equates to an average of slightly over 4 references each.

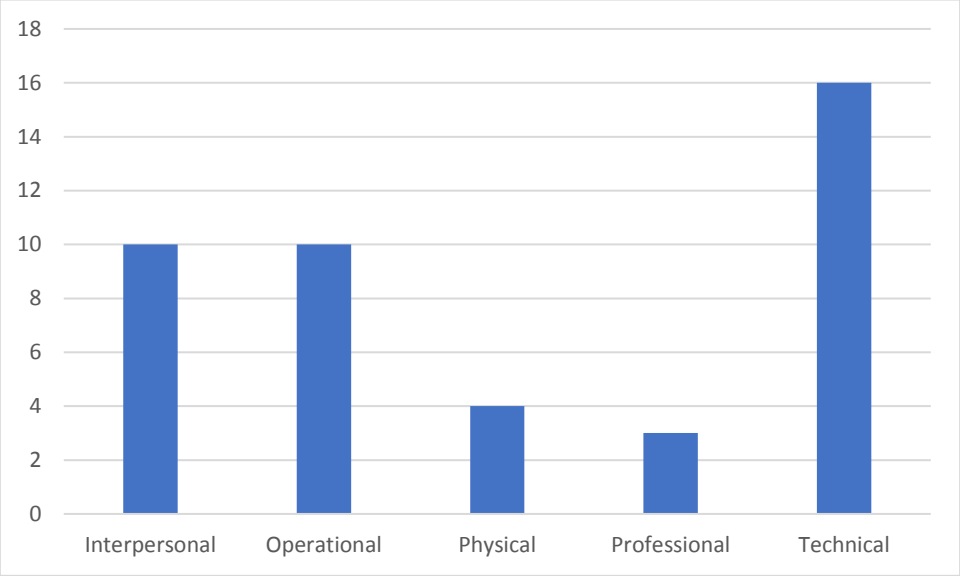

Figure 1. Number of items coded

Figure 1 shows that all but one student referred to the technical tasks of their placement. Interpersonal and operational tasks were described by 10 students each. 5 students described purely physical labour and only 3 students referred to using professional skills.

Nodes	Number of coding references	Number of items coded
Interpersonal	14	10
Operational	11	10
Physical	5	4
Professional	3	3
Technical	41	16

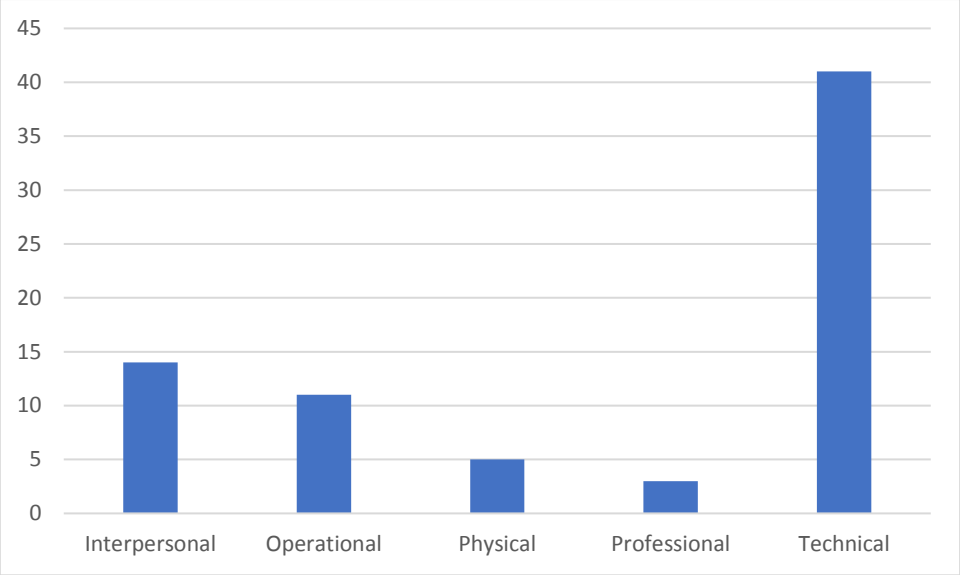

Figure 2. Number of coding references

Figure 2 shows the same findings as Figure 1. A significant majority of references relate to technical tasks. Other skills were described less frequently, with professional skills in particular not being highlighted by most students.

Workshop survey results

Students were also asked to complete an online workshop evaluation at the end of each workshop consisting of 11 questions prior to receiving their $50 gift card incentive.

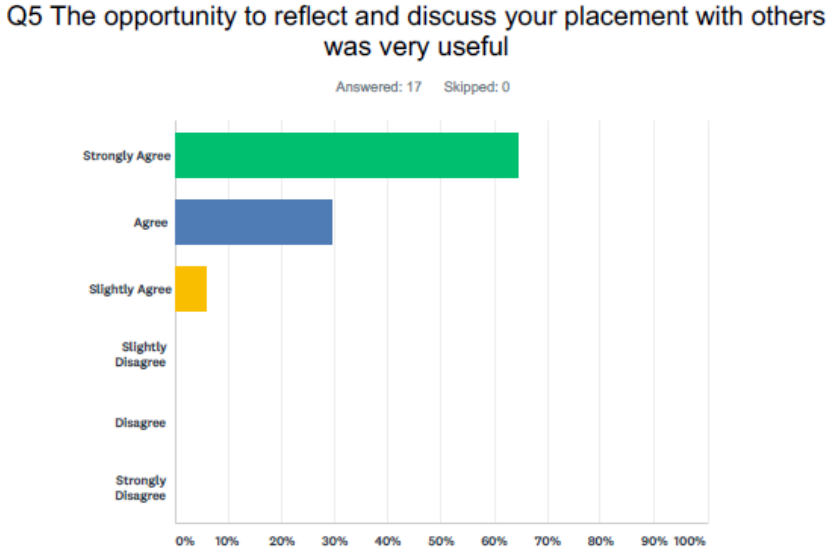

Figure 3. 64.7% of students responded 'Strongly agree' in relation to the value of reflecting and sharing.

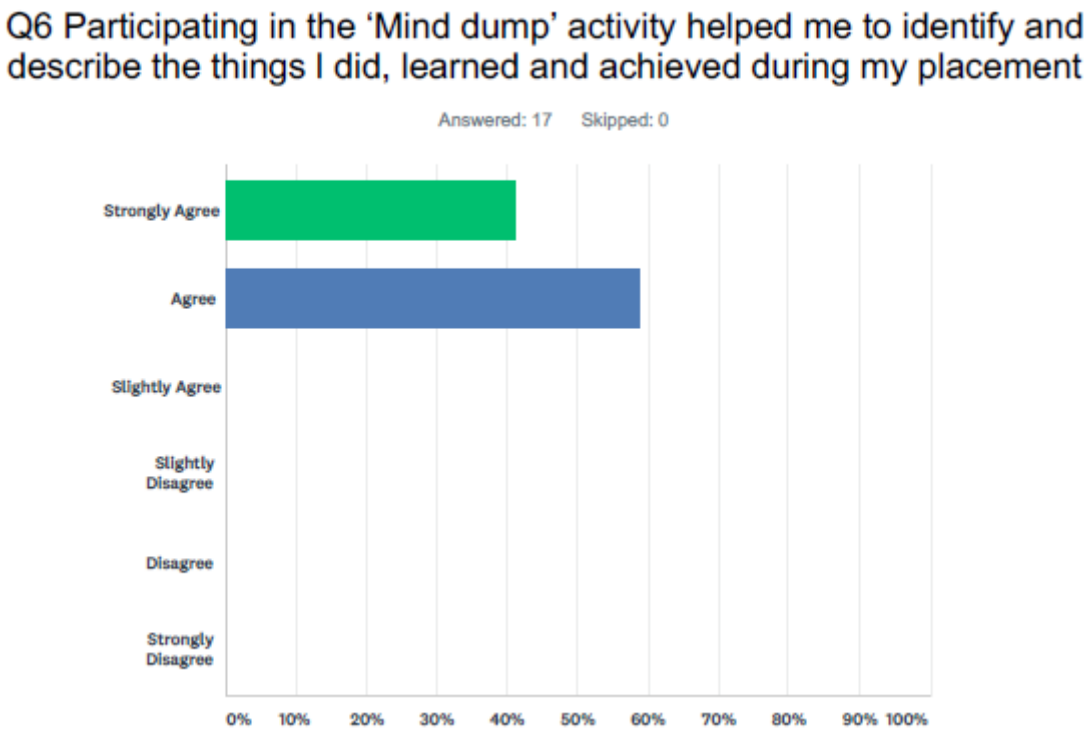

Figure 4. 41% of students 'strongly agreed' that 'Participating in the Mind Dump' activity helped them to identify and describe the things they did, learned and achieved during placement.

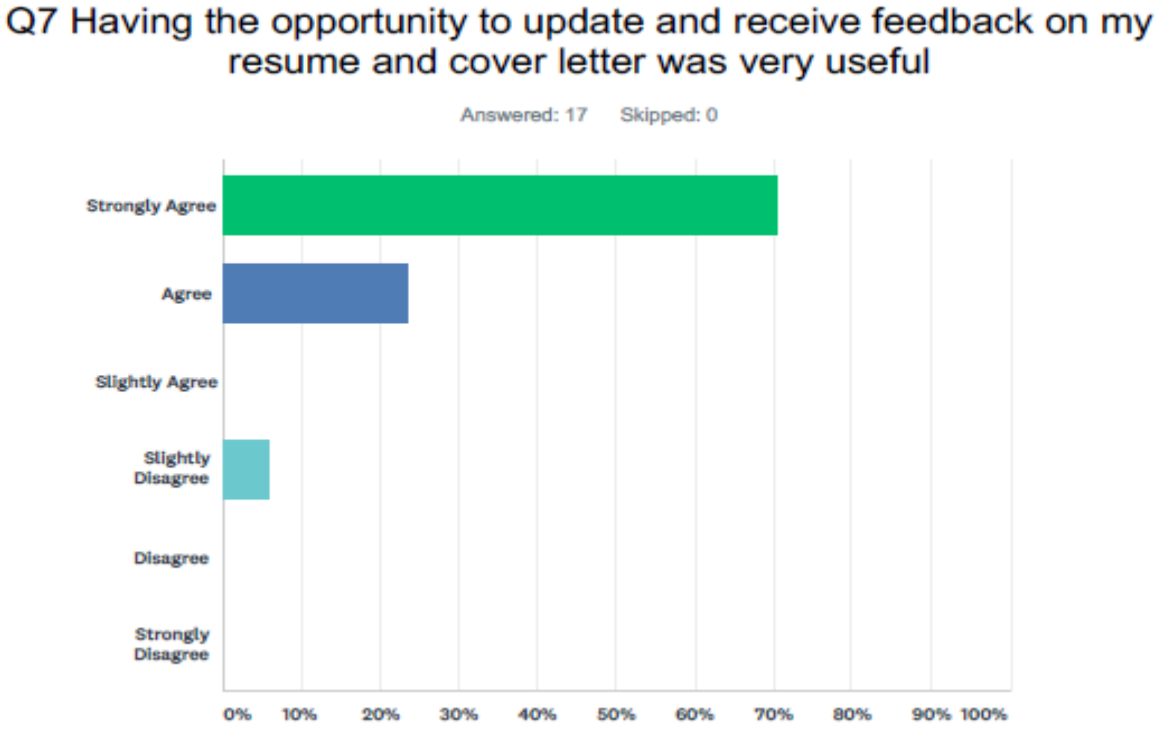

Figure 5. The majority of students, 70.5% strongly agreed that having the opportunity to update and receive feedback on their resumes and cover letters was of value.

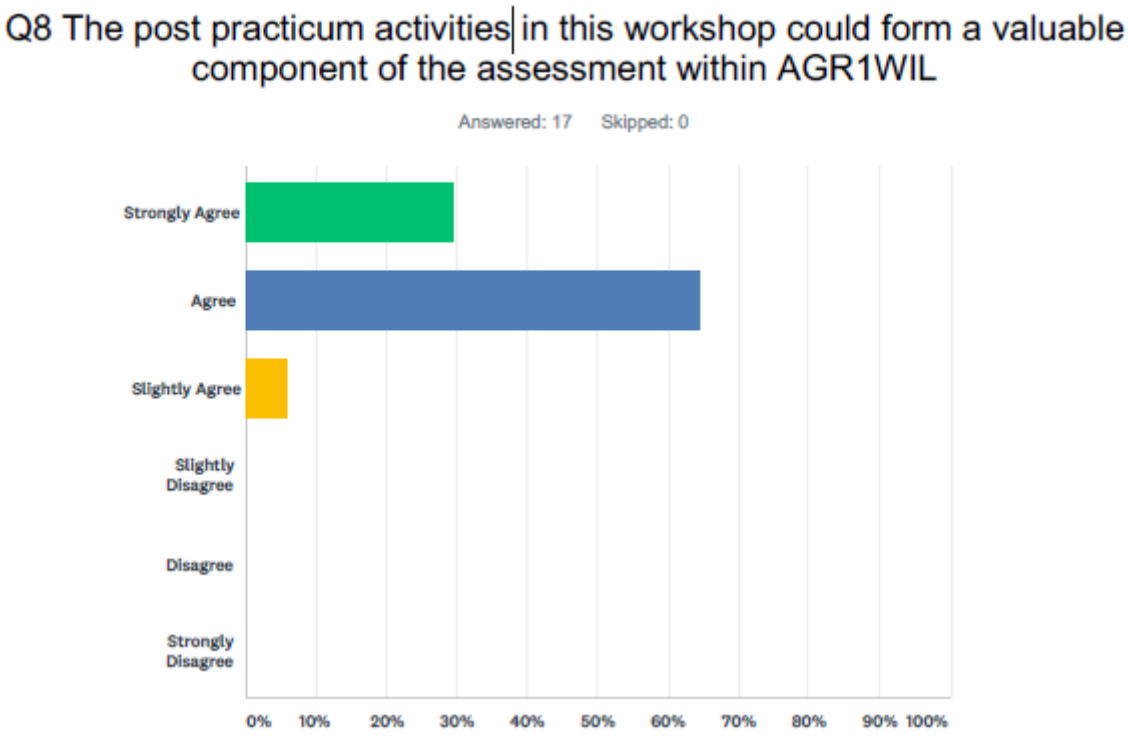

Figure 6. The importance of the post practicum from a student's perspective, with 94% strongly agreed or agreed that 'the Post practicum activities in the workshop could form a valuable component of the assessment within AGR1WIL'.

Q9 Please indicate the next activity you plan to do in order to further develop your employability skills:

Responses
Complete my undergraduate degree
Seek future volunteer or work placement in the industry
I Already Applied For Some Volunteer Work In Wildlife Sanctuary.
To rewrite my resume by using more concise terminology, and to practice my interview skills
Now I want to work with La Trobe wildlife sanctuary so get to know more about animals.
Update my cover letter
Become a volunteer at the farm I completed my placement on a permanent basis
Another placement or volunteer opportunity
I'd like to attend the same workplace but work in a different lab. I also have the opportunity to work there casually throughout the year.
Seek further experience in wildlife hospital/rescue areas
Volunteering
Look for a part time job that fits with my school timetable
Update my resume and apply for animal-related jobs.
Animal Nutrition Field
Applying to work in an animal associated environment whether it be volunteering or employment.
Second year of university
Find potential job opportunities and hand out my resume

Figure 7. Results from this question show that students are further motivated to seek out other opportunities relevant to their degree e.g. volunteer and update their resumes whilst some students focused on completing their degrees. It is evident from the responses that the placements correlated with the student's degrees and their career aspirations, as I had two students share that undertaking the placement confirmed they wanted to become veterinary surgeons.

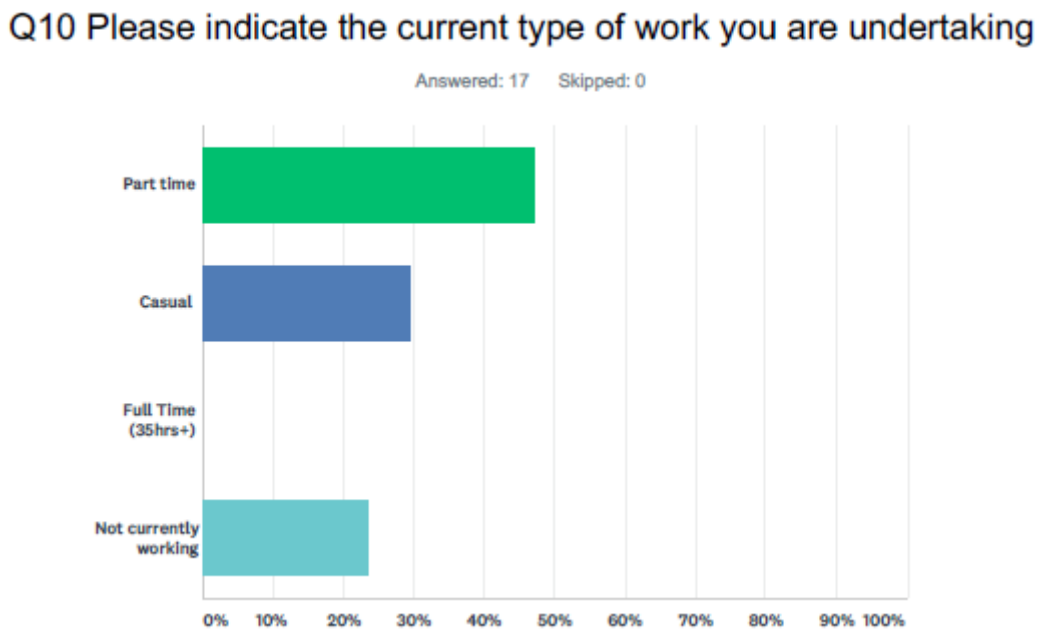

Figure 8. 47% of students advised they were currently working part – time, 29.4% working casually and 23.5% not currently working.

Q11 Please advise of the name of the organisation you are currently working at

Responses
Private house hold
Not currently working
Domino Pizza Coburg
Trident Equipment
Joys food
Victorian Animal Cancer Care
The Meadows (Greyhound racing)
Not working
Woolworths
Mr Ed cafe
I'm not working. I'm studying at Latrobe university
Croydon Medical Centre
McDonald's
Aquastar Swim School
MA & W de Boer
Pizza del mondos

Figure 9. Whilst only three of the organisations listed align with the disciplines students are undertaking it is encouraging to see that students are still developing valuable employability skills in other fields of work.

The analysis of the resumes clearly shows that students primarily tended to describe the technical aspects of the placements. Some described the interpersonal and operational aspects, but few described the physical or professional aspects.

It is pleasing to note that students do not frame their experience in terms of the physical work undertaken, especially in a placement such as these where, for some students, their work was limited to primarily physical labour. Most students made an effort to frame the physical aspects of their placement as technical. For example, one student described the cleaning of animal enclosures as "maintain[ing] the hygiene standards for animal enclosures", rather than simply *cleaning* them or *mucking them out*. The use of the word maintains and the reference to standards frames this task as one that is more technical and professional than purely physical.

Few students chose to describe their work in terms of professional skills. In the class discussion designed to generate and share ideas, a number of professional tasks were written down, including references to ethical, respectful, and professional behaviour, time management, dealing with difficult situations, and understanding broader issues in the profession. However, only three students chose to incorporate these ideas into their resume. Does this mean that students may not yet consider themselves to be a professional in their chosen field or perhaps reinforces their lack of understanding of what it means to be a professional?

This focus on technical over professional skills on student resumes, may not be a weakness. Employers may in fact prefer to read more about technical capabilities than more generic professional ones. Nonetheless, it is the professional skills that can sometimes say more about the students' *attitude* about their work and profession than purely technical tasks can, and their absence from the resume may leave a gap.

Observational research – We observed that the workshop is a valuable shared learning experience for students and initially some students were less engaged then other with incidental responses such as 'Oh, I just looked after dogs'. It was also challenging for students to look beyond the practicalities of the placement and to then try and capture the experience from an employability perspective. We encouraged students to research similar types of jobs via ethicaljobs.com.au so they could draw further correlations from their own placements and identify with professional wording within the position descriptions posted on the jobs board.

Positive project outcomes include, 68.75% of students 'strongly agreed' via the workshop evaluation that they found the opportunity to reflect and discuss their placement with other students very useful and 62.50% agreed that the post practicum activities within the workshop could form a valuable component of the assessment within AGR1WIL.

Value of the experience and group sharing – observations

Students who had undertaken placement at what they deemed a 'less prestigious' organisations initially appeared to 'simplify'/'downplay' tasks undertaken e.g. the students who went to - Pitter Patter Paws, – and Andy's Doggy Daycare stated– 'I just walked the dogs'.

We observed that once students commenced sharing their experiences they realised they all had relatively undertaken/experienced similar tasks and had much in common.

Another student enthusiastically shared that his experience within a farm environment 'provided him with the first opportunity to milk cows and observe how milk is pasturised'.

A student who undertook her placement at Feedtest, advised that she had been offered on going work and Feedtest had participated in La Trobe's cadetship program and would like to be contacted by the Experiential Learning team in relation to additional student placements.

Another student who undertook her placement with Eco Life expeditions in South Africa shared that she had the unique opportunity to 'inject a giraffe during her time in the field'.

The post practicum workshop and student discussion is not unlike Kolb's cycle of learning (Figure 10) a staged approach, combining theoretical and practical learning.

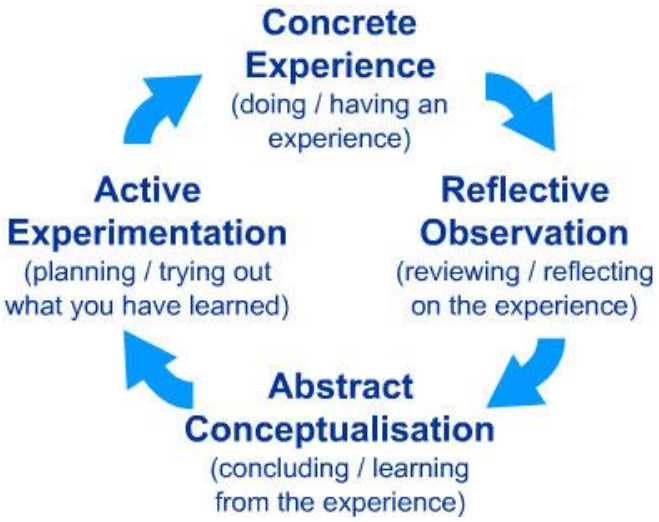

Figure 10. Kolb's Experiential Learning model

Whilst it is difficult to measure the value of the students learning from each other's placement it cannot be undervalued in terms of where there thinking will lead them next as reiterated in their responses to survey question 9.

Discussion

1. **Original Proposal and Project Resources**

Due to a number of internal changes, the original project proposal and intended outcomes were modified to compensate for staff changes and low workshop attendance.

We had to deviate a lot from the original project plan, mostly due to the challenges we experienced when recruiting students post winter and summer placements. The Careers area at La Trobe also experienced some major staff changes during this period which impacted on the ability to remark the student resumes. The original also included the Career Ready Advantage Do Reflection which we did not undertake as our advice was that there was not any real benefit in the students completing this exercise and given the issue we had trying to recruit students to attend the workshops we made the decision not to burden them with extra work.

The original project proposal included examples of the new integration of work experience skills into the students' resumes and cover letters to be provided as snapshots (resource) and being made available to all past, current and future AGRIWIL students. This also did not take place.

2. **Implementing a Post Practicum intervention**

- If we were to implement an intervention similar to this example it would need to form part of the subject curriculum and be adequately weighted e.g. -10% - 20% to entice students to engage and complete the assessment criteria. Submission timelines would need to be negotiated with Student administration to ensure alignment with result release as the project post practicum workshops were scheduled outside the summer subject schedule. Engagement with students is difficult unless post-practicum intervention is made compulsory.
- A post practicum workshop would be difficult to time table due to current subject offerings i.e. Winter and Summer. The Post Practicum intervention would need to

occur ideally for the winter cohort during week 1 of semester 2 and during week 1 of semester 1 for summer cohort.

- We would need to seek feedback and endorsement from the subject coordinator regarding the possibility of implementing an on- going post practicum intervention. Responsibility would need to be determined in regard to facilitation of the post practicum workshop – ELA team/Subject coordinator and/or Careers and Employability team.
- AGR1WIL will be offered as a 2nd year subject in 2019. So, there is opportunity to suggest a post practicum intervention as part of the subject development.

3. Recruitment of participants

It was very difficult to recruit students to attend the workshops even with the $50 incentive. The value of attending the workshops would require plenty of lead time, week 2 – 3 of each semester and workshop attendance and resume updating would need to contribute to a student's final mark e.g. – 10% - 20%.

4. Students' knowledge of editing documents

Surprisingly students were unaware of how to apply 'tracked changes' to their resumes and some students attended the workshop without an electronic copy of their resume and could only make changes to a hard copy or take down notes and then apply the changes after the workshop.

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Master of Teaching: Developing the first practicum experience

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Abstract

In response to calls for graduate teachers to be better prepared for employment, this study sought to understand preservice teachers views of their readiness for their future professional roles as teachers. Little is known about how preservice teachers perceive their developing professional identity as they move through their program of study. Teacher educators need to draw on an understanding of developing teacher identity throughout student programs of study to create innovative pedagogical experiences. In the context of teacher education, this is important because of the varied practicum opportunities each student might experience. A survey using four established and scaled measures of general self-efficacy, teacher self-efficacy, resilience and work skills were administered, and descriptive statistics were analysed for three groups: those who had completed no practicum, one practicum and more than one practicum. The pattern that emerged identified a decline following the first practicum as students experience the reality of their professional role. On the basis of this data, an existing Work Skills Development framework was adapted for use with preservice teacher education students. The 'Becoming a Teacher' framework includes six facets of a developing teacher identity including – embark and clarify, find and generate, reflect and learn, plan and manage, problem solve, and communicate and collaborate. The framework has been implemented in the Master of Teaching program as a tool for teacher educators use to invite preservice students into a discussion before and following practicum. The framework is focussed on identifying different pathways to teacher identity and augments work already embedded within teacher education programs based on the graduate level of the Australian Professional Standards for Teachers. The intervention involved embedding the 'Becoming a Teacher' framework within the Master of Teaching practicum during coursework, and a final assessment task was established to connect students to a post-practicum meeting. At this meeting, students shared examples of artefacts from their placement that demonstrated their developing identity and explored the variety of different opportunities that were possible across a wide range of practicum sites. The E-portfolio task of evidence and reflections were then submitted following the post-practicum meeting. The 'Becoming a Teacher' framework has provided teacher educators with a framework and language for engaging and inviting preservice teacher education students to talk about their developing teacher identity.

Brief description of academic area and students involved

Postgraduate initial teacher education has undergone a shift from one-year graduate entry programs into two-year Master of Teaching programs. Understanding more about the developing teacher identity and lifecycle of a teacher education student aimed to provide information that supported the teaching and learning for the Master of Teaching (Secondary) students enrolled to commence for the first intake Semester 2 2017. Based on explorations of the general cohort including graduate entry students in Semester 1 2017, we implemented a new approach to a post-practicum discussion in Semester 2 2017.

Particular purpose

Postgraduate initial teacher education students entering a Master of Teaching (Secondary) bring with them a range of skills and abilities from their previous studies and work experiences. However, the literature and policy suggest that there is a rhetoric that teaching graduates need to be better prepared and work ready (Bahr & Mellor, 2016; Teacher Education Ministerial Advisory Group, 2015). In the context of initial teacher education that requires programs to demonstrate their impact on student learning (Australian Institute for Teaching and School Leadership (AITSL), 2016) we were interested to explore the way to best support students through their first practicum experience and see them develop their teacher self-efficacy, resilience and become work ready.

Hence, we sought to create an appropriate pedagogical intervention based on our understanding of the Semester 1 2017 data from initial teacher education students. The data included student responses to a survey that explored student general self-efficacy (Schwarzer & Jerusalem, 1995), resilience (Smith et al., 2008), work readiness (Walker, Storey, Costa, & Leung, 2015) and initial teacher education self – efficacy (Pfitzner-Eden, 2016). Based on our reflection on the data and through engagement with the Work Skills Development framework (Bandaranaike & Willison, 2015) we created new ways to engage students with their developing identity as a teacher during coursework and then following up during their post-practicum discussions. The focus on developing quality post-practicum discussions is based on the important role they play in the development of student professional capacity building (Billett, 2009a). Post practicum discussions provide opportunities to share and compare experiences, connect practicum and coursework, engage students in critical reflections on work contexts and emphasise and highlight learning through practice and the development of agency (Billett, 2009b).

Classroom readiness is a policy imperative (AITSL, 2014) that needs to be interpreted by higher education institutions in a positive and empirically-based way. We focussed on a strengths-based approach with an emphasis on authentic practices and their application in the development of career agency and professional autonomy. There is a challenge currently that much of quality teacher debate is being driven by those with qualifications outside of education (Bahr & Mellor, 2016). The approach adopted within this project provides an opportunity to develop pedagogy in response to student data and expand our understanding of how students experience and develop their identity as a teacher in our programs.

Enacted post-practicum interventions

Firstly, we aimed to gain an understanding of how students engaged in our programs regarding self -efficacy, resilience and work readiness. We sought to understand how that changed as they progressed through the different professional experiences across a program. Based on this understanding we then adapted the Work Skills Development framework (Bandaranaike & Willison, 2014) to embed within our coursework and use as a guide for post-practicum conversations.

During Semester 1 2017, we surveyed students and developed a profile of our current USC teacher education students' perceptions at the following stages: when they have completed no practicum; after one practicum; and when they have completed more than two practicums. The results of these data sets assisted in developing an understanding of how resilience, self-efficacy and work readiness developed across different stages of the program. Based on this data we explored the Work Skills Development framework (Bandaranaike & Willison, 2014) and rearticulated this into an approach that supported initial teacher education students as they engage in the process of becoming a teacher.

The framework was introduced during one semester, and the results of the student survey were shared to illustrate to students the typical responses regarding reliance, self-efficacy and work readiness at different stages of their teacher education program. The 'Becoming a Teacher' framework was then used to support student reflections as they developed their E-Portfolio task and became the focus for shared experiences within the post-practicum discussion. Appendix 1 illustrates the revised task developed for this cohort.

Data gathered and analysed

In Semester 1 2017, a survey was designed to capture student information that would support our reflection on the development of a post-practicum experience that would support students. Our work explored a range of existing tools, both qualitative and quantitative, that formed one survey. At the commencement of the semester students completed the survey including demographic information and answered quantitative questions on general self- efficacy (Schwarzer & Jerusalem, 1995), resilience (Smith et al., 2008), work readiness (Walker et al., 2015). In addition, students who had completed one placement also answered questions focussed on pre-service teacher efficacy (Pfitzner-Eden, 2016) and critical incident technique explorations of readiness for the profession. Seventy-three students attempted the survey and three were identified as incomplete with a final total of 70. Using descriptive statistics, the patterns of student self- efficacy, work readiness and resilience emerged as it related to three groups: those who had completed no professional experience, one professional experience and two or more professional experiences. This initial analysis was presented at the Australian Teacher Education conference in Brisbane (Heck, Simon, Grainger, Willis, & Smith, 2017). Based on the analysis of student pathways throughout current programs we then adapted the work skills development framework (Bandaranaike & Willison, 2014, 2015) into a format to support our work with the Master of Teaching students. The outcome of this analysis was accepted and presented at the "International Conference on Models of Engaged Learning & Teaching" held in Adelaide in December (Heck, 2017). Following this work, the team then explored the implementation in the Semester 2 2017 professional experience course. Appendix 1 illustrates the revised E-Portfolio task developed to apply the adapted framework to teacher education and also connect the post-practicum discussion with an assessment task.

Key findings

The data were analysed according to the number of supervised professional experiences that students had completed to create three cohort groups as illustrated in Table 1. Findings are reported according to the four main tools used in the survey.

Table 1 *Participant groups according to number of supervised professional experience (SPE) placements*

No SPE	1 SPE	2+ SPE	Total Number
19	22	29	70
47.5%	35.5%	69.0%	48.6%

General self-efficacy for the cohort surveyed before undertaking a professional experience was high, with a mean of (32.4/40) and decreased as more supervised professional experience (SPE) placements were undertaken one SPE (31.7/40) and two or more (30.9/40). The finding that general self- efficacy declined was to be expected as students often found out the teaching was more complex than their own experience as a student. However, all these scores are above the typical average of (29/40) (Schwarzer & Jerusalem, 1995) that indicated the cohort arrives with and maintain an above average general self-efficacy with positive emotions and optimism for teaching.
Personal resilience or the ability to bounce back revealed a different response. The mean for those who had not undertaken any professional experience began at (3.7/5.0), then reduced to (3.5/5.0) for those who had completed one SPE and then increased to (3.9/5.0) for those who had completed

two or more SPE. This range of scores is similar to the average range for studies between (3.53/5.0) and (3.98/5.0) (Smith et al., 2008). This finding demonstrated a pattern that suggests further evidence to support the notion that students' initial SPE can impact negatively on their resilience. However, over time and with further experience, personal resilience does build.

In contrast to the general self-efficacy scores, the **student teacher self-efficacy** created and validated by Pfitzner-Eden, Thiel, and Horsley (2014) presented a different picture of teacher self-efficacy development. The survey included items that are grouped into the four components that Bandura (1997) identified as the main sources of information drawn upon by individuals when assessing their own capabilities: mastery experience, vicarious experience, verbal persuasion by mentor teachers and others as well as physiological and affective states. Mastery experiences are identified as having the biggest impact on self-efficacy and as expected increased as students undertook more professional experience within their program. The student experiences of teaching in classrooms provided them with information about their self-efficacy with means scores of (7.0/9.0) for one SPE and (7.5/9.0) for two or more SPE. Vicarious experiences are also typically experienced during placement through viewing models of others teacher's performances. The learning from others improved from a mean of (7.4/9.0) for one SPE to (7.6/9.0) for more than one SPE. Support or verbal persuasion by mentor teachers also improved from (7.3/9.0) for those who completed one SPE to (7.6/9.0) for those who completed two or more SPE. A more significant shift was evident in the verbal persuasion provided by others both in the school context and outside with a shift from (7.0/9.0) for those who had completed one SPE to (7.7/9.0) when two or more SPE were completed. However, self-efficacy scores related to physiological and affective aspects of teaching were not as positive. These items were negatively scored, so a lower score represents a more positive outcome. Students with one SPE scored (3.2/9.0) while those with who had completed two or more SPE had a mean of (3.8/9.0) indicating a decrease in this aspect with more SPE. However, the negative wording of this scale may have impacts on the outcome and should be considered in future iterations of the work.

The work readiness scale (WRS) provided an overview of four broad aspects of work readiness personal characteristics, organisational acumen, work competence and social intelligence (Caballero, Walker, & Fuller-Tyszkiewicz, 2011; Walker et al., 2013). The work readiness scale questions were only asked of students who had completed at least one professional experience. Hence, only 46 of the participants answered these questions. It demonstrated that these students identified with a high-level awareness of workplace principles and practices with a mean for these items of (8.98/10) (see Table 2). The personal work characteristics were negatively worded, so when scored positively, a mean of (9.0/10.0) represents a high score. The two aspects that scored the lowest for work readiness were work competence and social intelligence. Work competence related to student understanding of work practices and capacity to learn with a mean of (7.51/10). Social intelligence, the ability to interact socially at work, had a slightly higher mean of (7.63/10). These represent further areas to be developed and were incorporated into the 'Becoming a Teacher' framework Figure 1.

Table 2 *Work Readiness Scale*

	N	Mean	Median	SD	Range
Personal Work Characteristics	46	4.50	4.63	1.600	1-8
Organizational Acumen	46	8.98	9.16	1.349	1-10
Work competence	46	7.51	7.54	1.438	3-10
Social Intelligence	46	7.63	7.88	1.752	3-10

These patterns provided us with evidence and data that we could use with the students to explore the pattern of how they might feel as they experience placements and work through their program of study. During coursework, we sought to include examples and data from the survey findings to illustrate how students might feel. We decided that exploring these feelings and looking at examples of how they might develop their work practices and capacity for learning would be a good focus for the post-practicum discussions. Undertaking this in the context of a discussion with colleagues around evidence would also support the development of social intelligence regarding developing ways of interacting socially around work. We believe it was important to explore with the group the range of experiences from their placement immediately following placement to seek to support students as they experience some of the decreases identified in the data between no SPE and first SPE experience.

Discussion

The key issues that were distilled from this work had implications for the development of the SPE and other core courses within the MTeaching Program (Secondary). The analysis of the student journey through their program of study led to the development of the 'Becoming a Teacher' framework. The six facets of the framework – embark and clarify, find and generate, reflect and learn, plan and manage, problem solve, and communicate and collaborate – integrate key findings from the survey into actions that draw upon both cognitive and non-cognitive processes.

The 'Becoming a Teacher' framework was used to guide the reflective discussions after the first supervised professional experience. The data from the survey was shared with students during coursework when the framework was presented, so they had an understanding of the way initial teacher education students experience the process of developing their teacher identity.

The SPE course required students to return following placement. However, this post-practicum experience needed some further development. The data from the study identified the need to make use of Figure 1: Becoming a teacher as a way to engage students with their developing identity and to provide some language for the discussions. We connected the becoming a teacher framework within the E-Portfolio assessment task (Appendix 1). Providing students with a framework to gather and reflect on evidence from their placement provided a common language for conversations with students. The aim of the post-practicum discussion day was then framed around students bringing in examples of evidence and sharing their experiences before their final submission of this task following the post-practicum day. The post-practicum session provided an opportunity for small groups to discuss their experience of placement and consider the evidence of how it has impacted on their development as a teacher. It also provided scope to understand the experiences of a range of other students across a variety of settings to put into context individual experiences. For example, not all students can experience rural and remote settings, however, in the context of the post-practicum discussion they can compare their experience and identify similarities and differences. The approach attended to the key features of post-practicum reflection identified by (Billett, 2009b). Further work will need to be undertaken to understand the impact of these pedagogical innovations on the short and longer term self-efficacy, resilience and work skills development of students studying to becoming teachers. We plan to continue to track the initial Master of Teaching (Secondary) students to understand their program experiences and how these develop across a program of study.

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Appendix

M Teach E-Portfolio Task

During professional experience you will engage in 10 days of supervised professional experience. During this time, you will undertake observations and reflections of learning, teach mini-lessons, and engage with the school community to explore professional practice.

During your practicum please use the *becoming a teacher framework* identified in Figure 1 to connect your professional experience with what you have learned during your coursework. Collect evidence during your professional experience across the six facets to demonstrate your understanding of:

- school context:
- classroom organisation and structure: and
- connection between the syllabus and classroom teaching and learning strategies that engage learners.

At the conclusion of your professional experience, identify between three and five artefacts from your professional experience that demonstrate your engagement with the framework and the three areas identified above. Write a 1000-word reflection that refers to the artefacts included as appendices.

E-Portfolio Reflection format

- Statement of understanding developed on professional experience (reference your artefacts in appendices as evidence) (300 words)
- Identify three examples of connections between educational theory and your professional experience. (500 words)
- Based on your professional experience placement identify two areas of professional growth or development that you would like to work on before your next professional experience. Identify the Australian Professional Standard that is best associated with your growth areas. (200 words)
- Reference List
- Appendices (three to five artefacts)

Your E-Portfolio reflection will be assessed according to the following criteria

1. Application of knowledge of learning and teaching strategies.
2. Application of knowledge of student engagement strategies.
3. Application of knowledge of professional practices.
4. Identification of personal professional development needs and goals.
5. Professional reflection on the nexus of educational research and practice.

Facet	Description	Disposition
Embark and clarify	PST are motivated to identify and clarify the cognitive and affective knowledge required to undertake their role as a teacher. Including setting goals and identifying approaches to embark on the breadth of aspects of their role as a teacher.	Curious
Find and generate	PST know how to use the most appropriate approaches to find and generate information for both the cognitive and affective aspects of their role as a teacher.	Determined
Reflect and learn	PST critically evaluate the cognitive and affective aspects of their role as a teacher. They can reflect on a variety of sources of evidence and feedback with a focus on lifelong learning and continual improvement.	Discerning
Plan and manage	PST organise, plan and manage information and data for application in the context of their role as a teacher as an individual and as part of a team of education professionals. PST can positively manage and influence difficult situations.	Harmonising
Problem solve	PST critically analyse and synthesise information to create coherent understandings and innovative solutions as individuals and teams of educational professionals. PST have self-direction, drive and adaptability and strive for professional excellence.	Creative
Communicate and collaborate	PST discusses, listens, writes, presents and performs the role of the teacher in collaborative contexts with a range of professionals. PST have the cognitive and affective capacity to build relationships and apply ethical, cultural, social and professional standards required of teachers.	Constructive

Figure 1. Becoming a Teacher: Facets of pre-service teacher (PST) professional development

Augmenting career development learning and professional identify development through post-practicum interventions

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Abstract

The project involved implementing two post-practicum interventions. One aimed to enhance career development learning and the other professional identity development among students completing Work-Integrated Learning (WIL) as part of their degree program. Despite significant effort among higher education providers to produce rounded graduates, this does not always translate to positive employment outcomes and career development learning is important for assisting graduates to achieve professional success. One important area of career development learning is being able to articulate one's achievements and capabilities to prospective employers. Educating students on the value placed by employers on both work experience and student understanding of what they gained from this and how it aligns to advertised graduate roles was a key driver in the design of the first intervention. The second intervention was designed to augment professional identity development among students, an often-overlooked dimension to individual employability yet highly important for confident graduates who can drive innovation and change. Participants (*N*=139) included both undergraduate and postgraduate students from the areas of Business and Communication in two Australian universities. Findings indicated room for improvement in both professional identity development and student ability to draw on their work experience when addressing graduate selection criteria. It appears that that engaging students in post-practicum interventions can be problematic due to workload and perceived importance of required activities. Incorporating interventions into assessment appears preferable. Variations in the student cohort should also be considered when designing and implementing interventions. Finally, there needs to be continued attention to designing interventions which – in collaboration with employers –focus on developing student understanding of the importance of employability and their need to be proactive in preparing for their transition to the workplace.

Brief description of academic area and students involved

The project involved two post-practicum interventions. The first intended to enhance career development learning and involved 63 undergraduate students who were completing a Work-Integrated Learning (WIL) program in the School of Business and Law at Edith Cowan University in Western Australia. The second intervention was focused on professional identity development and involved two institutions. First, 33 undergraduate and 20 postgraduate students, all completing a WIL program in the School of Business and Law at Edith Cowan University. Second, 23 undergraduate students completing WIL as part of their Business / Communication undergraduate degree program at Charles Sturt University in New South Wales.

Particular purpose

The project aimed to achieve two educational goals. First, to enhance career development learning through guiding students on how to draw on their WIL experience to address certain selection criteria. Despite the focused efforts of HE providers to produce 'rounded' graduates who have

undertaken WIL, volunteering, participated in student societies and networked with industry through projects, competitions and other initiatives, this may often not be 'converted' to positive employment outcomes. While this may be attributed to reported bias in graduate recruitment and selection processes (Horverak, Sandal, Bye, & Pallesen, 2013), it could also reflect an inability among students to draw on their relevant experiences and articulate their strengths, capabilities and achievements to prospective graduate employers. Work experience is highly regarded by graduate employers and applicants need to be able to articulate the value-add gained by their own experience. Quality WIL provides rich and highly-valued examples of experience in applying theory and non-technical skills in a real work context. To gain true benefit from the experience, and to better align employability development with employment outcomes, it is important that students understand how to effectively draw on relevant aspects of their WIL experience in their job applications.

The second goal was to improve professional identity development among students to assist in their successful transition to the workplace. Developing professional identity is important for producing reflective practitioners who are confident and equipped to take a positional stance in their profession and augment continuous improvement and innovation. While it can be viewed through a variety of lenses, Baxter Magolda's (1998) theory of self-authorship is considered a useful framework for professional identity development in HE students (see, for example, Jackson, 2017; Nadelson et al., 2015) and underpinned the project. Nadelson and colleagues argue a self-authored student is one who is able to 'be self-reliant and more discerning in their perspectives, judging claims using multiple inputs, and pondering different perspectives' (4). This development of professional identity is important for HE students to 'achieve good learning, to feel confident, and to stay motivated' (Jessen & Jetten 2016, 1034). In a broader sense, graduates are expected to be prepared for their imminent transition to the workplace. At the very least, they need the disciplinary expertise, non-technical capabilities and an understanding of professional ideology and appropriate code of conduct so they can 'become' like a professional. They also need to develop 'a frame of mind that allows students to put their knowledge in perspective; to understand the sources of their beliefs and values; and to establish a sense of self that enables them to participate effectively in a variety of personal, occupational, and community contexts' (King & Baxter Magolda, 2011, 207). Although empirical analysis appears limited, the expectation that students can make meaning independently from authority and become self-authored, and thus be capable of leading change and innovation in their profession, is ambitious (Baxter Magolda 1998) and should not be assumed.

Enacted post-practicum interventions

Career development learning

- Students attended a workshop on 'how to draw on your WIL experience when addressing selection criteria' at the mid-point of their WIL experience. This was conducted by an HR professional experienced in graduate recruitment. University careers service were in attendance so the workshop could be repeated in future semesters. The industry professional developed and shared resources for the workshop, available for student and later use.
- Students were invited to submit a simulated application for a real graduate role/program (private or public sector) where they were required to explicitly draw on their WIL experience in addressing certain selection criteria. This was marked by the industry professional who rated different aspects of their application, in addition to providing written feedback to each student.
- Students completed a pre- and post-intervention evaluation of their career management competencies and commented on the effectiveness of the intervention

Professional identity development

- Students participated in a workshop, at the conclusion of their WIL experience, where they were placed into 'huddles' (informal learning circle groups) in groups of five.
- Students were provided with one to three key points for discussion which were relevant to professional identity development (for example, 'reflect on an/any unforeseen situation(s) that you found confronting and describe how you responded').
- Student discussed the points in their groups for 30 minutes, recording their thoughts on butchers' paper. This was retained by the facilitator and a photo kept by each student. Students provided feedback on their discussion to the larger class group via a two minute debrief.
- Individuals wrote a brief reflection on their take away from the huddle. This included if and how it influenced their individual responses and key action points to assist their professional identity development and employability going forward.

Rationale for intervention design:

- Both could be implemented with limited resources
- Both added value and produced valuable outcomes regarding individual employability
- Both were sustainable and could be repeated in future semesters

Data gathered and analysed

Career development learning

The following data were gathered:

- Pre- and post-intervention evaluation of career management competencies (paper/online survey)
- Student evaluation of the value of the intervention (online survey)
- Industry written feedback to students on their addressing of selection criteria
- Industry ratings to coordinating academic on quality of selection criteria submission
- Follow-up focus group session with careers and leadership team to better understand low student engagement with the mock job application activity.

Data were analysed as follows:

- Evaluation of pre-intervention career management competencies using descriptive techniques
- Evaluation of industry professional ratings of student performance in mock job application activity using descriptive techniques
- Evaluation of student feedback on workshop and mock job application using descriptive techniques (for quantitative ratings) and thematic analysis (for open response questions).

Professional identity development

The following data were gathered:

- Student output from huddle activity (butchers' paper)
- Student evaluation of the huddle activity and their understanding of professional identity development (paper survey)

Data were analysed as follows:

- Thematic/content analysis of huddle activity output

- Thematic analysis of student evaluation of the huddle activity and if/how it affected their understanding of professional identity and their assessment of their stage of development.
- Thematic analysis of student evaluation of their understanding of professional identity and their stage of development

Key findings

Career development learning

Findings indicated that students are confident in their ability to draw on relevant work experience in job applications and showed low levels of engagement in the intervention designed to develop their capabilities due to time constraints from their study commitments. The following are suggestions for better engaging students in career development learning to enhance their individual employability:

- Incorporate career development learning into assessment to ensure adequate take-up from students
- Ensure centralised careers provision are immersed and highly visual in discipline areas to improve take-up of their service among students.
- There is a need to educate students on both how to draw on relevant work experience and the importance of being able to do this. In particular, enhance their awareness of the value placed by graduate employers on student ability to comprehend and articulate their worth in respect of advertised roles and opportunities.
- Be mindful of the impact of variations among student cohorts (such as vocational/non-vocational degrees and student residency status) on their engagement with career development learning.

Professional identity development

The WIL experience provides a useful platform for both gauging and developing professional identity among participating students. It exposes students to situations which demand an internal voice and invoke, in partnership with deliberate reflective activities, complex meaning making of their learning experience. Crossroad situations challenge students in two main areas. First, navigating tensions between workplace practice realities and their theoretical knowledge and second, managing their desire to add value in the workplace through self-directed learning and autonomy while being reliant on others for meaningful work, feedback, and guidance. Many students are aware of the importance and value of their internal voice and acquired knowledge but struggle with navigating well-established norms and resistance from others to make changes in the workplace. Although progressing through these feelings of discomfort is inherent to the crossroads stage, it appears some adjustment among both industry partners and those responsible for WIL curriculum design may aid students on their journey to self-authorship. This is critical for developing confident and capable future professionals who - with enhanced self-authorship - can drive creative and innovative practices. The following are suggested guidelines for WIL design which may enhance professional identity development:

- Ensure co-workers and supervisors actively listen to WIL students' concerns/ideas in supportive forums which promote collegiality could develop confidence and a willingness to speak up.
- Ensure students are provided with meaningful work of suitable scope and challenge and their workload is regularly reviewed to help them add value and enhance self-worth.
- Ensure students are suitably skilled and resourced to facilitate independence and self-regulation.

- Incorporate collaborative working into the student's WIL experience to build confidence and help-seeking behaviour.
- Give students valuable insight into their industry partner's organisational structure and mission to help them understand culture and operations, providing context to their work and enhancing their contribution.
- Clarify reporting lines and how students should raise concerns, and with whom, to guide them in their work and to avoid inactivity which invokes feelings of despair and a lack of worth.
- Ensure workplace supervisors are suitably skilled to facilitate student learning; are equipped to identify meaningful tasks for completion; are versed with providing useful and timely feedback; and are engaged with supporting students.
- Prepare students to make sense of applying theory in practical situations through, for example, mentoring processes.
- Ensure students can connect with others and work collaboratively online to enhance a sense of belonging among students who attend the workplace irregularly or only on a weekly basis.
- Ensure workplace supervisors have realistic expectations of student capabilities.

Discussion

- Engaging students with interventions may be problematic due to workload and perceived importance of the activity. Incorporating the intervention into assessment appears preferable.
- Variations in the student cohort should be considered when designing and implementing interventions.
- There remains significant value in designing interventions which – in collaboration with employers –focus on developing student understanding of the importance of employability and their need to be proactive in preparing for their transition to the workplace.
- While post-practicum interventions are critical for students to grasp the full benefit of WIL, close attention should be paid to how these interventions are 'marketed' to students. They should be presented as a seamless part of the WIL design in order to ensure students are fully engaged with any required activities.

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Developing resilience, self-efficacy and professional identity in allied health students

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Abstract

Two workshops to develop resilience, professional identity and self-efficacy was delivered to speech pathology and dietetic students, one before and one after their first placement. Pre- and post-questionnaires were completed by students at three-time points, along with one workshop evaluation questionnaire. Focus groups with both students and also their clinical supervisors captured any changes in practice from the intervention, but have not yet been analysed. Questionnaires did not show any significant changes between the time points although students were positive about the workshop. It is hoped further analysis of the focus group data will reveal qualitative differences as a result of the workshop.

Brief description of academic area and students involved

Twenty-four 3rd year Bachelor of Speech Pathology (SP) students and nine Master of Nutrition and Dietetics (DT) students from Edith Cowan University were invited to participate in the project, along with 9 SP and 4 DT clinical supervisors. The WIL requirement for the DT students was a minimum of two days participation in a university student clinic where they delivered nutrition intervention under the guidance of their supervisor. SP students completed a day a week with either children or adults for 12 weeks.

Particular purpose

There are increasing mental health issues arising in the general population and among young people in particular (DHA, 2013). Attending practicum, receiving feedback from clinical educators and experiencing anxiety about achieving clinical competencies whilst simultaneously completing coursework and juggling other commitments can add stress to students. It is well known that increased stress impacts learning (Bellinger, DeCaro & Ralston, 2015). This project aimed to develop students' levels of resilience, self-efficacy and professional identity in order to reduce stress and improve learning from clinical experiences.

Both groups of students attended a workshop on feedback before their first practicum. Then SP students attended a longer training workshop after their first major practicum but before their second practicum. DT students received the same training after their placement in the university student clinic in semester one and prior to their placement in semester two.

It was anticipated that subsequent to training, students will actively seek specific feedback and show increased resilience and self-efficacy and development of professional identity as shown by self-evaluation and clinical supervisor report.

The research questions were:

- Does supporting the development of students' resilience, self-efficacy and professional identity through training and small group activities improve students' self-report of resilience, self-efficacy and professional identity?
- Do clinical supervisors notice changes in students in terms of seeking feedback, managing stress and development of professional identity?

Enacted post-practicum interventions

Study design

Convergent parallel mixed methods study.

Intervention

Students participated in two workshops 1) *Feedback* (semester 1, 2017) and 2) *Bouncing Forward* (semester 2, 2017). The workshops aimed to enhance feedback skills, and develop self-efficacy, resilience and professional identify. The feedback workshop was a one-hour interactive session covering types of feedback and how to seek and respond to feedback effectively to develop self-efficacy. The Bouncing Forward workshop was 2.5 hours and included brainstorming definitions and strategies for resilience, self-efficacy and professional identity. An evaluation of the *Bouncing Forward* workshop was completed by students to determine relevance, usefulness, and changes in knowledge or behaviours using a five-point Likert scale for agreement. Workshops were supported with weekly tutorials including learning circles (semester one) and mindfulness (semester two).

Measurements

Students completed three questionnaires on three occasions; the start of semester one, the end of semester one and the end of semester two. The questionnaires measured self-efficacy, resilience and professional identity (adapted from Adams, Hean, Sturgis & Clark, 2006; Schwarzer & Jerusalem, 1995; Smith, et al., 2008). A unique non-identifiable code was used to match participant results. Questionnaire data was analysed using SPSS, version 24 (SPSS, Chicago, IL, USA). The same students were invited to participate in a focus group at the end of semester one and two. Focus group questions were developed by the researchers and explored how students conceptualise self-efficacy, resilience and professional identity with reference to their practicum experience. Separate focus groups were held for the SP and DT students to obtain homogenous groups. University clinical supervisors were invited to participate in focus groups at the end of semester one and two. Focus groups questions were developed by the researchers and explored how clinical supervisors conceptualise self-efficacy, resilience and professional identity and how they foster the development of these constructs in students. All focus groups were audio-recorded, transcribed verbatim and will be analysed thematically. Ethics approval was obtained from Edith Cowan University HREC (approval number 17482). The study procedure is detailed in Appendix A.

Data gathered and analysed

Demographics

Student demographic data is given in Table 1, showing mean and standard deviation. All students were domestic with one First People's student in SP. Some students had received previous training in self-efficacy (27.8% SP and 50% DT), resilience (27.8% SP and 37.5% DT), engaging in feedback (50.0% SP and 50.0% DT), emotional intelligence (50.0% SP and 25.0% DT), mindfulness (55.6% SP and 37.5% DT) and developing a health and wellness plan (38.9% SP and 12.5% DT).

Table 1 *Demographic data for each of the three questionnaires*

Demographic variable	Questionnaire number	SP[1]	DT[2]
Age (years)	1	24.0 ± 6.60	29.0 ± 6.97
	2	24.4 ± 5.46	27.6 ± 5.59
	3	24.6 ± 6.24	27.6 ± 5.59
Gender	1	16 F 2 M	7 F 1 M
	2	20 F 1 M	5 F 0 M
	3	15 F 1 M	5 F 0 M

[1] Response rate for questionnaire 1 n = 18; 2 n = 21; and 3 n = 17

[2] Response rate for questionnaire 1 n = 8; 2 n= 5; and 3 n = 5

F female; M male

Workshop evaluation

The Bouncing Forward workshop was relevant and useful (Table 2). The workshop was delivered too late in their studies for DT (100%) students while the majority of SP students indicated it occurred at the right time (72%). SP students reported a greater extension of their knowledge and skills than DT students for professional identify (4.18 compared to 2.80), self-efficacy (4.18 compared to 3.00) and resilience (4.06 compared to 2.80). SP experienced more 'aha moments' than DT (62% compared to 0%). A modest self-reported improvement was observed in the ability to describe the constructs of professional identity (0.35 for SP and 0.40 for DT), self-efficacy (0.47 SP and 0.60 for DT) and resilience (0.24 for SP and no change for DT).

Table 2 *Bouncing Forward workshop evaluation by SP (n = 18) and DT (n = 5) students*

Statement	SP	DT
Relevance[1]		
The workshop covered areas important for my development as a practitioner	4.06 ± 0.64	3.00 ± 0.71
The workshop was applicable to my clinical placement work	4.06 ± 0.64	3.00 ± 0.71
The workshop was applicable to my life, more broadly	4.00 ± 0.91	3.00 ± 0071
The workshop gave me new information to consider	3.89 ± 0.90	3.20 ± 0.84
The program was well paced within the allotted time	4.06 ± 0.54	3.60 ± 1.14
The material was presented in an organised manner	4.22 ± 0.55	3.20 ± 1.10
I would be interested in attending a follow-up, more advanced workshop related to these topics	3.39 ± 1.04	3.00 ± 1.00
Usefulness[2]		
Professional identity	4.44	3.60
Self-efficacy	4.67	3.40
Resilience	4.78	3.40
Clinical dilemma activity	4.83	2.60

[1]Five-point Likert scales (1 = strongly disagree and 5 = strongly agree)

[2]Seven-point scale (1 = not at all; 2 = limited; 3 = somewhat; 4 = moderately; 5 = very; 6 = extremely)

Questionnaire

Questionnaire response rates at each time point for SP students were 75%, 95% and 89% (n=18, n=21 and n=17, respectively) and for DT students 80%, 50% and 56% (n=8, n=5 and n=5, respectively). Responses are presented in Table 3. No significant differences were observed between the questionnaire responses for the SP students at the 3-time points. DT students reported an increase in the strength of ties with other DT students ($\chi^2(2) = 8.962$, $p = 0.011$). No differences were observed between SP and DT students for questions relating to resilience. SP students reported higher levels of distraction from their studies (U=344.5, p=0.0.31) and perceived the clinical experience to be more daunting (U=257.0, p=0.001). Compared to the DT students, SP students reported a higher level of pleasure being a SP student (U=236, p=0.001), a higher level of belonging to the profession (U=250, p=0.001) and considered it important to be a SP student (U=294.5, p=0.006). Paradoxically they reported higher levels of trying to hide their studies (U=369.35, p=0.026). DT students reported stronger ties to other DT students compared to SP (U=340, p=0.034).

Table 3 *Self-efficacy, professional identity and resilience questionnaire responses at three-time points for SP (n=18, n=21 and n=17) and DT (n=8, n=5 and n=5) students*

Statement	Questionnaire 1		Questionnaire 2		Questionnaire 3	
	SP	DT	SP	DT	SP	DT
Self-efficacy[1]						
I can always manage to solve difficult academic and /or clinical problems if I try hard enough	3.50	3.25	3.24	3.80	3.41	3.60
I frequently feel overwhelmed by my studies	1.81	3.25	1.71	2.40	2.09	2.40
If someone opposes me in the classroom or clinic, I can find means and ways to get what I want	2.11	1.88	2.48	2.20	2.47	2.60
It is easy for me to stick to my aims and accomplish my educational goals	3.17	2.88	3.00	3.20	3.24	3.20
I constantly rely on others to support my clinical development	1.97	2.38	1.95	2.20	2.06	2.60
I am confident that I can deal efficiently with unexpected academic or clinical events	2.89	2.50	2.86	3.00	3.00	3.00
Coping with the academic demands of this program is difficult	1.75	3.19	1.67	2.80	1.82	2.80
Thanks to my resourcefulness, I know how to handle unforeseen academic situations	2.94	3.00	2.95	3.00	2.94	3.00
I feel well supported in my academic studies	3.25	3.00	3.10	3.00	3.00	2.80
I am easily distracted from my studies	1.89[c]	3.06[c]	1.88[c]	2.80[c]	2.03[c]	2.40[c]
I can solve most academic problems if I invest the necessary effort.	3.33	3.38	3.14	3.40	3.41	3.40
I can remain calm when facing academic difficulties because I can rely on my coping abilities	2.67	2.31	2.95	3.00	3.00	3.00
The clinical situation is daunting for me	1.67[d]	3.13[d]	1.88 [d]	2.80 [d]	1.94 [d]	3.20 [d]
When I am confronted with a school problem, I can usually find several solutions	2.83	3.13	2.91	3.00	3.06	3.00
If I am in academic and/or clinical trouble, I can usually think of something to do	3.11	2.88	2.93	3.00	3.06	3.20
Some aspects of this program are easier than I expected	2.50	2.00	2.41	1.80	2.21	2.40
I find the clinical demands to be more stressful than the academic demands	2.61	2.44	2.33	2.20	1.94	2.20
No matter what comes my way academically or clinically, I'm usually able to handle it	3.19	3.06	3.07	3.60	3.15	3.20
Professional identity						
To what extent do you feel like a Speech Pathology/Dietetics student?[2]	7.83[e]	7.63[e]	7.90[e]	7.40[e]	8.35[e]	9.00[e]
To what extent do you feel strong ties with other Speech Pathology/Dietetics students?[2]	6.67	7.13[a]	7.14	8.60[a]	7.59	9.20[a]
To what extent do you feel pleased to be a Speech Pathology/Dietetics student?[2]	8.00[f]	6.50[f]	8.05[f]	7.20[f]	8.41 [f]	6.80[f]
How similar do you think you are to the average Speech Pathology/Dietetics student?[2]	5.89	6.88	6.38	7.60	7.18	7.20
How important is it that you are a Speech Pathology/Dietetics student?[2]	8.39[g]	7.25[g]	8.05[g]	7.40[g]	8.35 [g]	7.60[g]
How strongly connected to you feel to your most recent professional or student identity?[2]	6.94	6.38[b]	7.05	8.00[b]	7.53	7.60[b]
I feel I am a member of the Speech Pathology/Dietetics profession[3]	3.83	3.63	3.81	4.20	4.41	4.00
I feel I have strong ties with members of the Speech Pathology/Dietetics profession[3]	3.56	3.38	3.38	3.80	3.65	3.40
I question my resourcefulness in undertaking the demands of the Speech Pathology/Dietetics program[3]	3.22	4.12	3.62	3.00	3.06	2.80
I find myself making excuses for belonging to the Speech Pathology/Dietetics profession[3]	1.83	1.75	1.81	2.40	1.65	1.80
I try to hide that I am studying to be part of the Speech Pathology/Dietetics profession[3]	1.39[h]	1.50[h]	1.14[h]	1.80[h]	1.18[h]	1.80[h]
I am pleased to belong to the Speech Pathology/Dietetics profession[3]	5.44[i]	4.50[i]	5.43[i]	3.60[i]	5.35[i]	4.80[i]
I can identify positively with members of the Speech	4.61	4.50	4.90	4.80	4.82	5.00

Pathology/Dietetics profession[3]						
Being a member of the Speech Pathology/Dietetics profession is important to me[3]	5.28	5.13	5.19	5.00	4.88	5.00
I feel I share characteristics with other members of the Speech Pathology/Dietetics profession[3]	4.33	4.50	4.57	4.80	4.41	4.80
I believe that I am capable of becoming an excellent speech pathologist/dietitian[3]	4.89	5.13	5.10	5.40	5.12	5.40
Resilience[4]						
I tend to bounce back quickly after hard times	3.50	3.38	3.67	4.40	3.59	4.0
I have a hard time making it through stressful events	3.0	2.63	3.19	3.20	3.47	3.40
It does not take me long to recover from a stressful event	3.28	3.13	3.29	3.80	3.06	3.60
It is hard for me to snap back when something bad happens	3.22	3.13	3.48	3.80	3.35	3.40
I usually come through difficult times with little trouble	3.33	3.25	3.24	3.60	3.18	3.60
I tend to take a long time to get over set-backs in my life	3.33	3.13	3.52	3.60	3.76	3.80

[1] Four-point Likert scale 1: not at all true, 2: hardly true, 3: moderately true, 4: exactly true

[2] Ten-point rating scale 1: not at all and 10: completely/ extremely

[3] Six-point Likert scale 1: strongly disagree and 6: strongly agree

[4] Five point rating scale 1: strongly disagree and 5: strongly agree

[a] $\chi^2(2) = 8.962$, $p = 0.011$ (chi-square); [b] $\chi^2(2) = 6.883$, p = 0.032 (chi-square); [c] $U=344.5$, $p=0.0.31$ (Mann-Whitney U); [d] $U=257.0$, $p=0.001$ (Mann-Whitney U); [e] $U=340$, $p=0.034$ (Mann-Whitney U); [f] $U=236$, $p=0.001$ (Mann-Whitney U); [g] $U=294.5$, $p=0.006$ (Mann-Whitney U); [h] $U=369.35$, $p=0.026$ (Mann-Whitney U); [i] $U=250$, $p=0.001$ (Mann-Whitney U)

Focus groups

Student and Clinical Educator focus groups have been conducted and data is undergoing analysis.

Key findings

In the original literature review to inform this study there was a lack of literature on professional identity, self-efficacy and resilience in SP and DT students. Generally, 50% or less of students had received any training in these areas prior to the workshop. The Bouncing Forward workshop came too late for the DT students and needs to be tailored more specifically for them as they did not deem it useful at the SP students. DT students were more negative about the workshop, perhaps reasons will become clearer from the qualitative data. SP students were very positive re workshop but no significant changes in professional identity, self-efficacy or resilience were shown in the self-report measures over time. This may be because the training was not long or targeted enough or perhaps there was not long enough after the training for students to apply the information. The tools may not be sensitive enough to measure change over 3 months. Changes might be shown after the first block placement instead. There are some significant differences on some items between SP and DT students. It is unclear whether these are due to discipline differences or differences in courses (i.e. Master's/Bachelor). Further comparison with other project data may illuminate this further.

There were low numbers in this study which limits the interpretation. Long-term follow-up is required (and planned). Feedback from clinical supervisors may also give further insights.

Discussion

- Workshops to develop resilience, professional identity and self-efficacy need to be tailored to the students and at the 'just-in-time' point in the course.
- Students do value the training if it occurs at the correct time.
- There are discipline differences that deserve further attention

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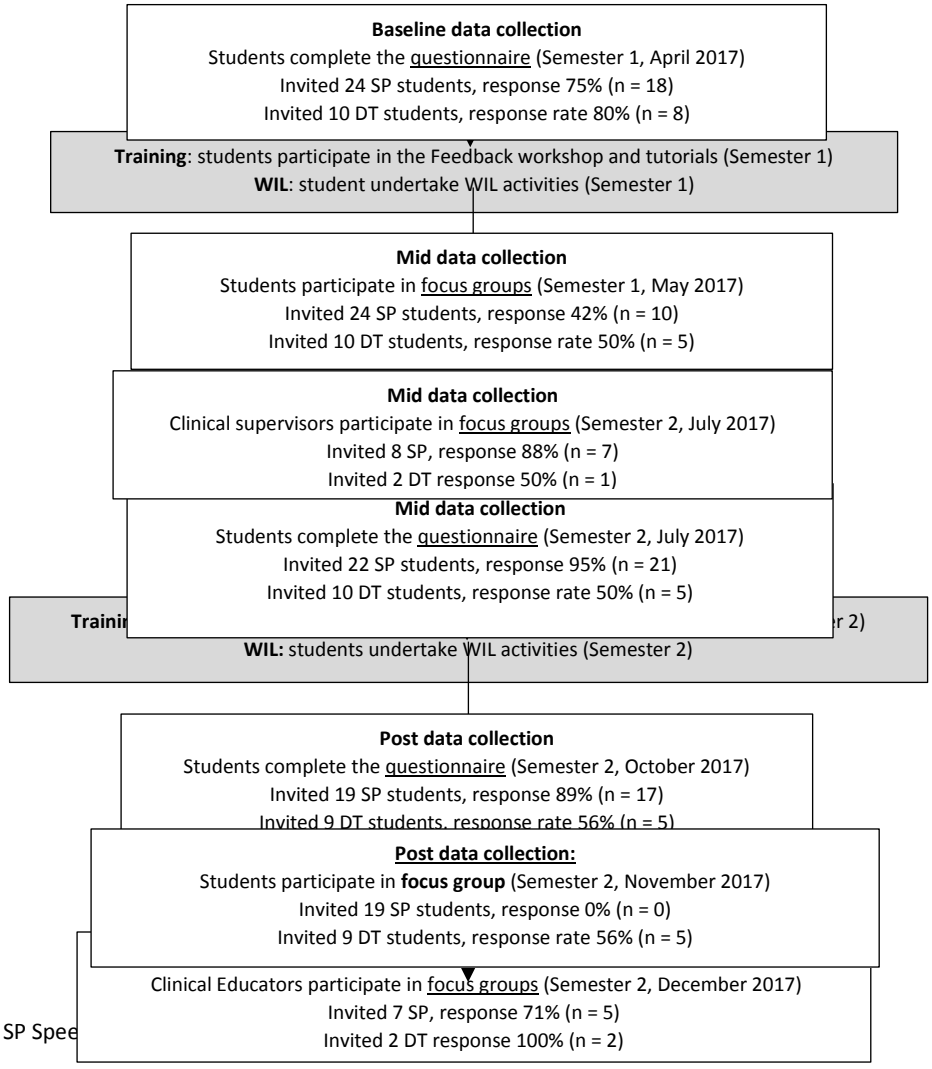
Appendix

Procedure



Embedding Clinical Reasoning beyond theory using simulation: Nursing students' rural placements

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Abstract

N/A

Brief description of academic area and students involved

The target group for this project included undergraduate nursing students enrolled at either the University of Newcastle or Southern Cross University. Students from University of Newcastle were in their 2nd year whereas SCU students were in their 3rd year of the degree. Thirty students in total were recruited between the two sites.

Particular purpose

Clinical placement and clinical reasoning are both essential components in the undergraduate nursing curriculum that contribute to the preparation of nursing students to transition knowledge into practice (Shulman,2005, Banning 2008). Clinical reasoning is a focus area of content currently taught to nursing students in undergraduate nursing curriculum throughout Australia, however this theory is not often formally reintroduced during clinic placements. National standards for students incorporate elements of clinical reasoning and critical thinking, however they do not specifically follow the same format taught in the classroom and may be a contributing factor to student's difficulty in transitioning theory to practice (Lasater 2007). For nurses working in rural areas clinical reasoning skills are even more important as the complexity of clinical presentations are accentuated due to limited access to specialised services (Smith 2008).

Increasing demands within the clinical setting, including the increasing complexity of patient care, competes with the time taken for nurse educators to develop nursing student skills in understanding the rationale behind their approach to nursing care (Rhodes et.al 2005, Benner et.al 2009). Too often within the clinical learning environment the focus is placed on the clinical tasks of nursing care. The opportunity to develop decision making skills within the context of the factors affecting patient care are diminishing (Waters et.al 2012).

Clinical reasoning skills are a crucial component in preparing nursing students transition into practice. Investigations conducted within New South Wales Health have identified incidents where health professionals, including post graduate nurses, failed to provide the correct diagnosis and the subsequent correct treatment and also failed to correctly manage complications associated to patient care (NSW Health, 2006). Underlying each of these contributors to incidents was the recognition of inadequate clinical reasoning skills by the health professionals involved in the incident.

Due to the challenges faced with integrating clinical reasoning into the clinical learning environment, there is a need to explore innovative approaches that will enable nursing students' exposure to the practical application of clinical reasoning while on placement (Bremner et.al 2006). One approach that is gaining momentum in the development of nursing students' practical application of clinical reasoning skills is simulated scenarios.

Simulated learning has merit as a teaching and learning approach which assists in augmenting nursing student's clinical skills and prepare their transition of clinical knowledge about clinical reasoning into clinical practice (Jensen 2013). Nursing students who participated in clinical simulated learning activities were shown to have increased reliance and confidence in the use of their knowledge to collect data, make assessments based on realistic clinical cues and plan for appropriate actions to implement the correct nursing intervention (Feingold, et al., 2004).

Expected outcomes

Outcomes will be measured using a variety of tools to evaluate the proposed learning activities. This includes:

(1) Educational tutorials:

   a. Evaluation of the clinical reasoning tutorials (for the intervention group only)

(2) Clinical reasoning simulated learning activity including the:

   a. Level of student satisfaction with the simulated learning activity.

   b. Level of student satisfaction with the feedback provided after completion of the simulated learning activity.

   c. The Clinical Reasoning rubric rating from students in the intervention and non-intervention groups

   d. The Clinical Reasoning rubric rating from academic staff member facilitating the learning for the intervention and non-intervention groups

Due to the higher focus on clinical reasoning education for the intervention group and orientation to practically apply clinical reasoning throughout their clinical placement it is proposed:

(a) The tutorial based education sessions will have an influence on reinforcing previous theoretical knowledge of clinical reasoning which will be reflected in the post simulated learning rubric results.

(b) The intervention group overall will obtain higher rubric scores in the clinical reasoning simulated learning activity than the non-intervention group

Enacted post-practicum interventions

This project was conducted over two regional sites, Lismore and Tamworth. As a result, consultation was required to ensure the development, implementation and evaluation of all post-practicum activities occurred in a consistent manner. All activities were conducted by the key researchers located at each site to ensure consistency with the approach to delivery of these activities. The post-practicum interventions were as follows:

(1) Educational tutorials and feedback reflections:

The education tutorial focused on the application of the clinical reasoning cycle using a clinical scenario relevant to students on their clinical placement. The case scenario included physical and mental health components which was relevant to the students learning objectives for their placement. Student feedback was a key component of the education. This allowed students opportunity to reflect on how they were applying the clinical reasoning cycle to the clinical scenarios they encountered on placement. The importance of feedback is acknowledged by education providers and students alike, however there are limitations in its integration despite the benefits of improved confidence, self-worth and interpersonal communication (Clynes and Raftery 2008). (See Appendix A-Education and feedback evaluation)

(2) Clinical reasoning simulated learning activity:

The case scenarios used in the simulation learning activities were developed in conjunction with the University of Newcastle Clinical Skills Unit. A "Fast track-scenario to simulation Workshop" was held in May 2017 where key clinicians and a mental health consumer were invited to develop the scenarios for the simulated learning. Two scenarios were developed as a result of this workshop. (see Appendix B and C). Two clinical reasoning rubrics were designed following a format previously developed by the Newcastle Clinical Skills Unit. The Rubrics included the components of the clinical reasoning cycle with the contextual pathway identifying the appropriate student response required for the specific scenario (See Appendix D and E).

Studies assessing the capability of students to apply clinical reasoning skills in a simulated learning environment are limited with a lack of tools available to reliably evaluate students' clinical reasoning skills (Kardong-Edgren et al., 2010, Simmons, 2010). The rationale to use a rubric as an appropriate tool to assess clinical reasoning was determined on a number of factors. A rubric decreases ambiguity in the expectations surrounding an assessment task and delineates what is required for learning. In addition, it encourages critical thinking, enhances opportunity for communication and provides consistency in assessment when dealing with diverse student populations (Steven and Levi, 2005).

Procedures

Two interventions occurred during and on completion of the student's placement.

Education workshops:

Intervention group:

(a) Structured orientation occurred inclusive of the clinical reasoning cycle with the explanation provided to students to apply clinical reasoning skills throughout their placement

(b) Weekly tutorials were provided reviewing the application of the clinical reasoning cycle to practice

(c) Students participated in a simulated learning activity designed around the practical application of clinical reasoning. This activity was scheduled to occur at the end of the student's clinical placement. A brief overview of the clinical reasoning cycle was provided at the commencement of this learning activity particularly for the non-intervention group.

(d) Students as a group conducted the peer-peer assessment of the simulated scenario using a rubric specifically designed for clinical reasoning and also tailored for the particular scenario (i.e. mental health/ COPD). A nominated academic staff member from each site conducted the rubric to add to the student feedback process.

(e) Student feedback post simulation was provided incorporating both the student and academic staff members perspective

Non-intervention group:

Students who participated in this group received interventions (c) through to (e).

Simulation program:

The students participated in a simulated scenario relevant to their recent clinical placement (i.e. medical/surgical and mental health placements). The aim of the simulation program was to assess the student's ability to apply clinical reasoning. The program was approximately 3 hours duration allowing for 2 hours to complete the scenario and 1 hour for debrief and feedback. The simulation was conducted with groups of 3-4 students. The scenario was staged and progressive as the clinical problem evolved with students able to enter at set points throughout the scenario.

Data gathered and analysed

Data was obtained from all activities conducted in the project. This included data from the following:
1. Workshop education evaluation including description comments from students
2. Satisfaction with simulation including satisfaction with the feedback provided and how the activity contributed to the students understanding of clinical reasoning
3. Clinical reasoning rubric including the overall scores from both the students and the facilitator
Due to the student sample being smaller that first estimated a descriptive analysis of the data was used. Although the results are not conclusive there are positive indications that may inform future research on a more comprehensive level.

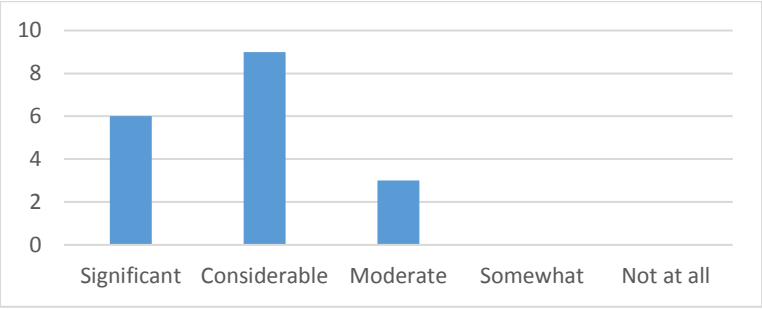
Key findings

Twenty three students from SCU completing an acute health focused placement and seven UON students completing a mental health placement participated in the study. The method and practice of teaching clinical reasoning varied between the two research sites. The University of Newcastle nursing students receive theoretical knowledge of clinical reasoning in their first year including a written assessment. SCU students receive theoretical knowledge of clinical reasoning in the second year of their degree, comprising of written assessments and an exam.
Students from both universities have limited opportunity to apply theory to practice with some clinical laboratory practice incorporated in the first year for UON students. SCU students complete clinical laboratory practice in the late stages of first year and then across multiple points in second and third year.

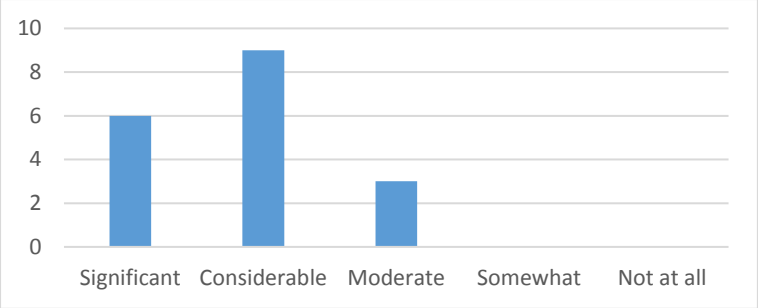
Descriptive data analysis

Education evaluation:

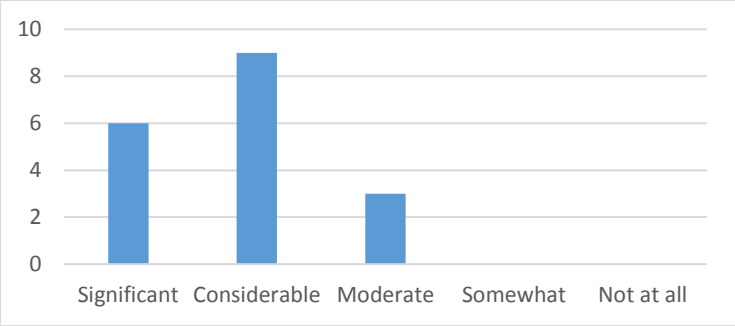
Eighteen students completed the education workshops on clinical reasoning. The workshops were evaluated using a combination to Likert and reflective feedback responses. A majority of students found the workshops useful in contributing to the development of their clinical reasoning skills.
Chart 1: Student responses to tutorial sessions



“The tutorials gave us further insight into the clinical reasoning cycle and how to apply it in practice”
“It was explained well in context to a patient situation”
“We refreshed what we knew, going over things helps them stick”
“How much of the cycle I remember without prompts…. how realistic it is in practice as not everything can be done in order”
Students predominantly rated the scenario discussion as considerable or significant to developing their clinical reasoning skills.
Chart 2: Student responses to scenario



“It allowed us to discuss all options as a team and gather further insight”
“Good way to learn the cycle relating it to a patient situation”
“Comparing answers with other groups was useful to know if we were on the same track”
“Good to do as a team and hear other opinions”
The opportunity to reflect on the learning objectives was a key aspect of the workshops. Students felt that what they discussed in the workshops helped to link the theoretical knowledge of clinical reasoning to real life scenarios.
Chart 3: Students views on reflective feedback discussions



“We were able to share our ideas and discuss what we did well, or could have done better”
“Good to hear about different ways we could have gone through the patient’s situation”
“Reflection always make you think of the situation and improve skills”

Simulation evaluation:

The simulated learning activities were evaluated using three separate measures, the Simulation Satisfaction Scale, the Simulation feedback evaluation and the Simulation Rubric.

Simulation satisfaction scale

The Satisfaction with Simulation Experience Scale (SSES) was designed to assess nursing student satisfaction levels when participating in simulated learning activities, although its validation for use has extended into other areas of health. The level of student satisfaction is reported to have an influence on overall student learning and performance (Levett-Jones et.al 2011, Williams and Dousek 2012).
Thirty students overall completed the SSES. Of these eighteen were students who completed the clinical reasoning workshops (intervention group) with twelve students completing the simulated scenario only. Due to the higher number of students in the intervention group the following graph demonstrate the overall student rating and the rating when the UON (mental health) students were removed.
Chart 4: SSES rating both sites

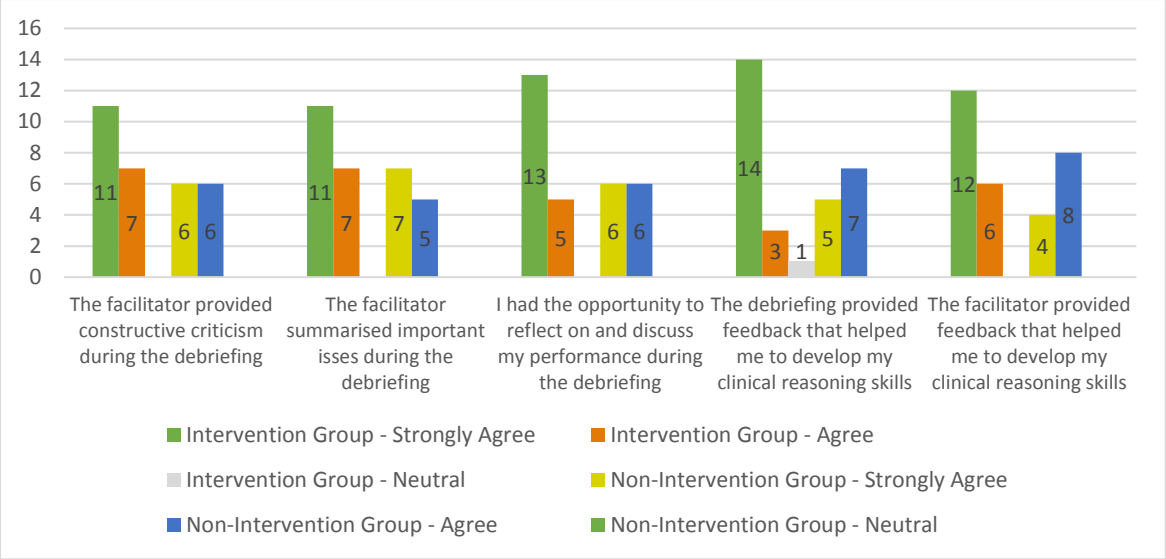


Chart 5: SSES rating SCU students

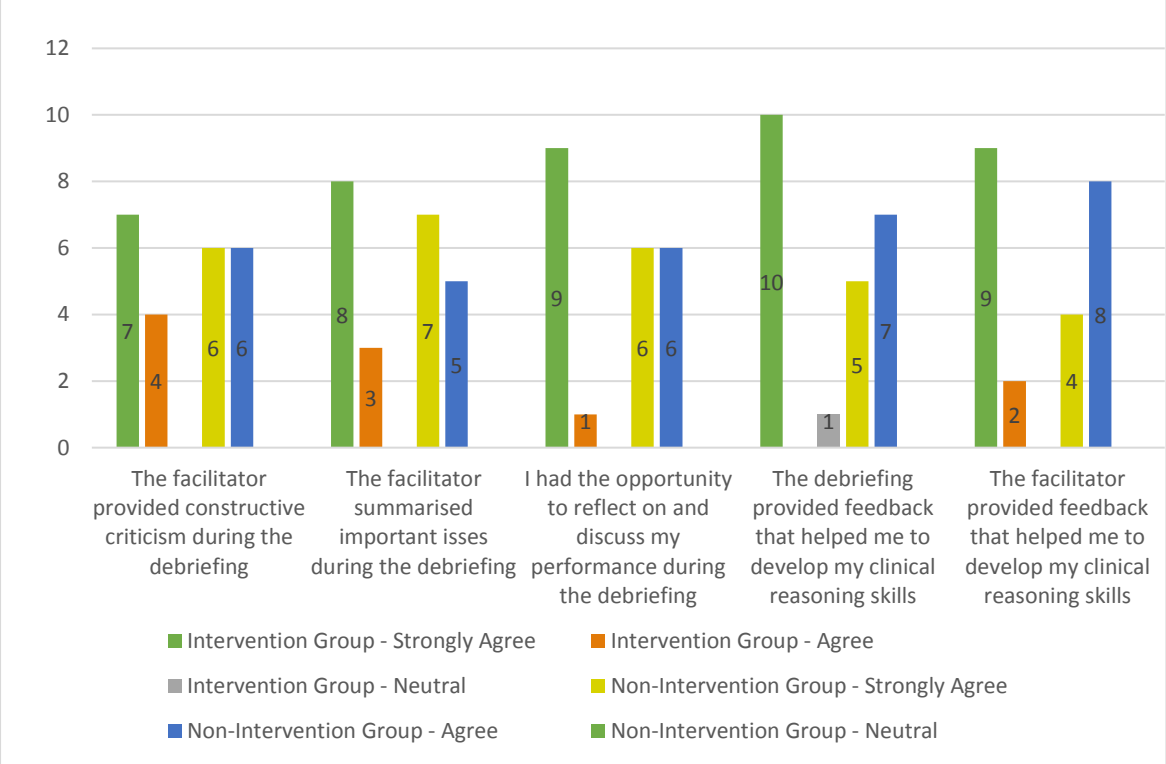


Chart 6: SSES rating both sites

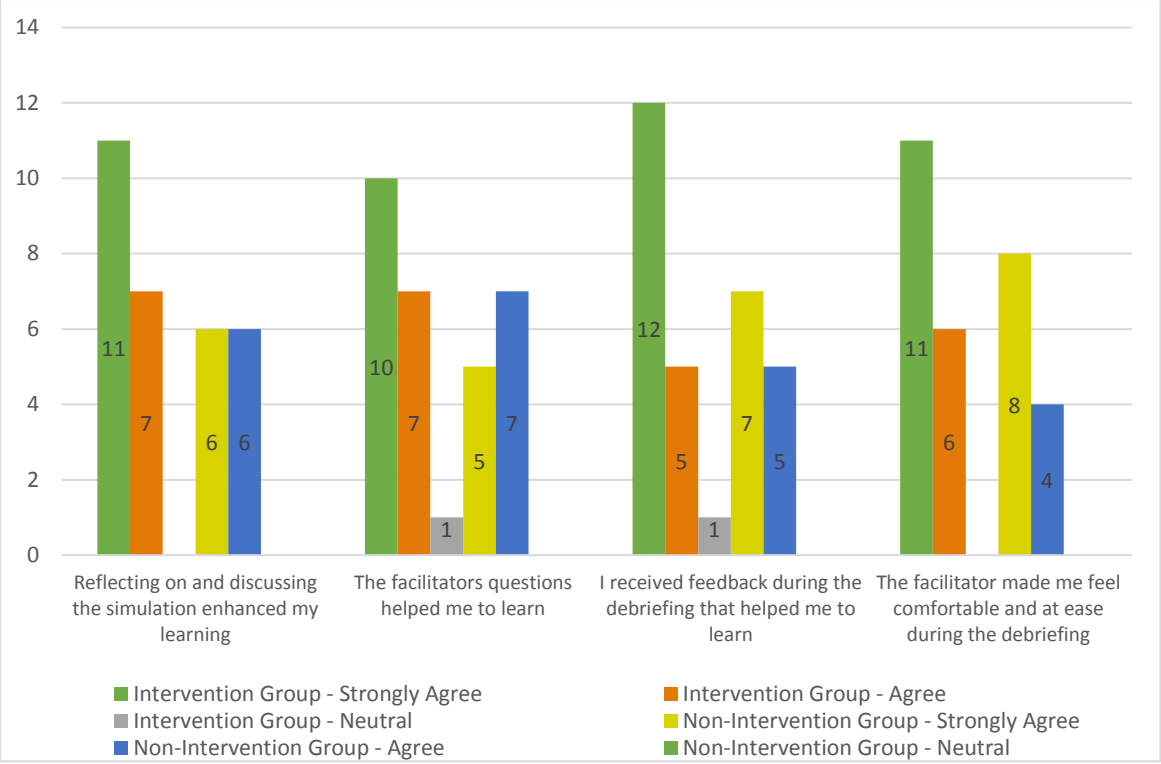


Chart 7: SSES rating SCU students

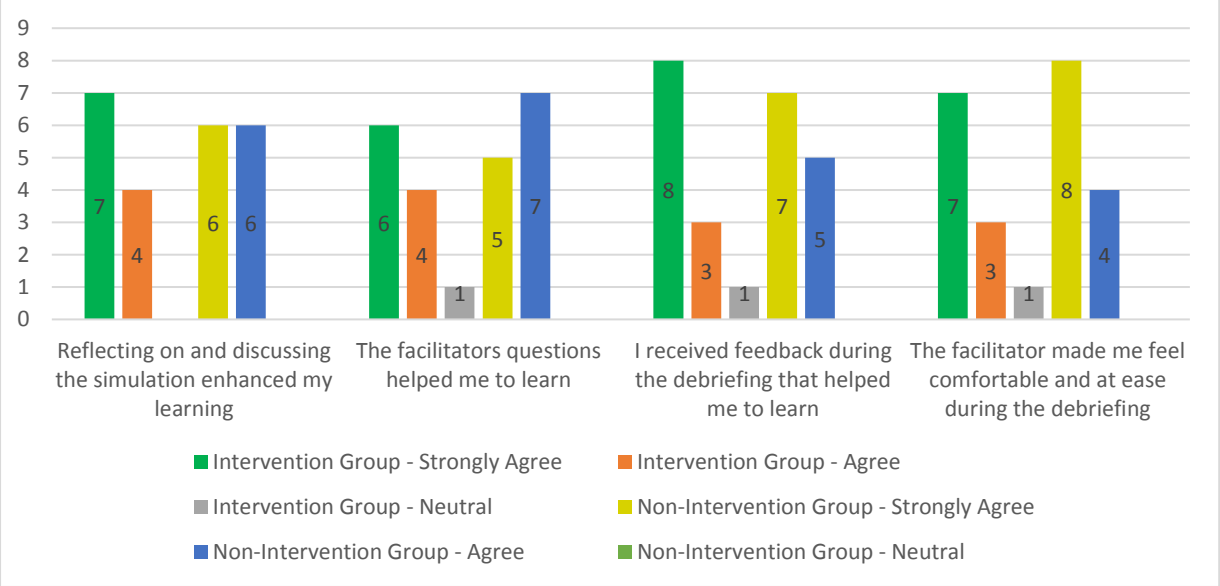


Chart 8: SSES rating both sites

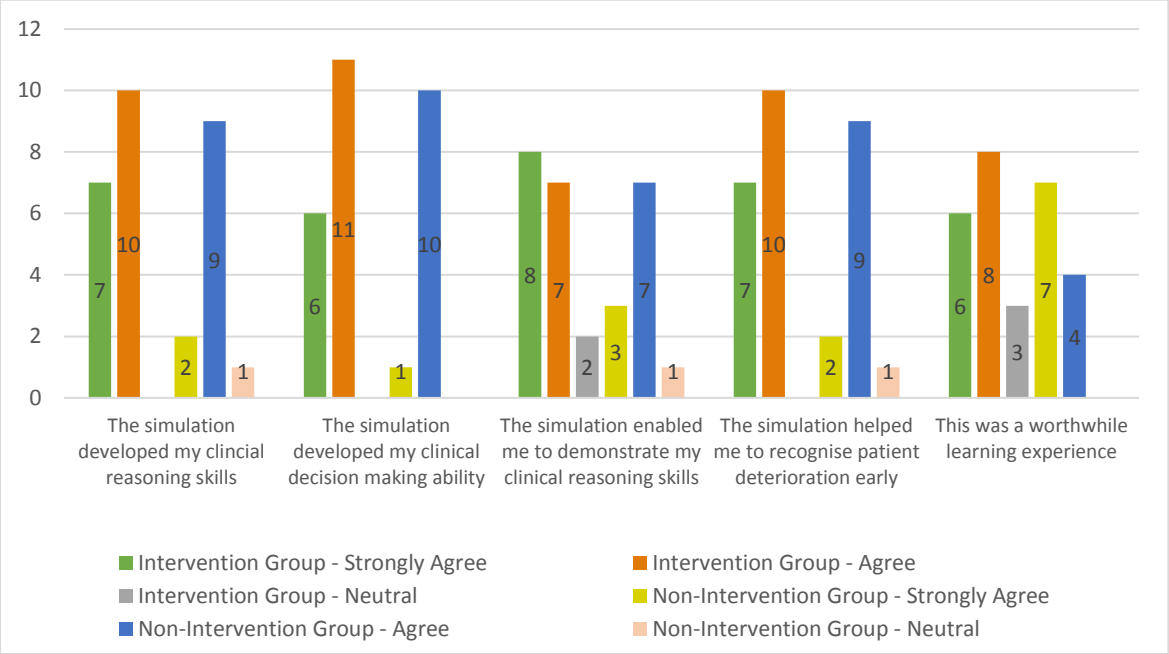


Chart 9: SSES rating SCU students

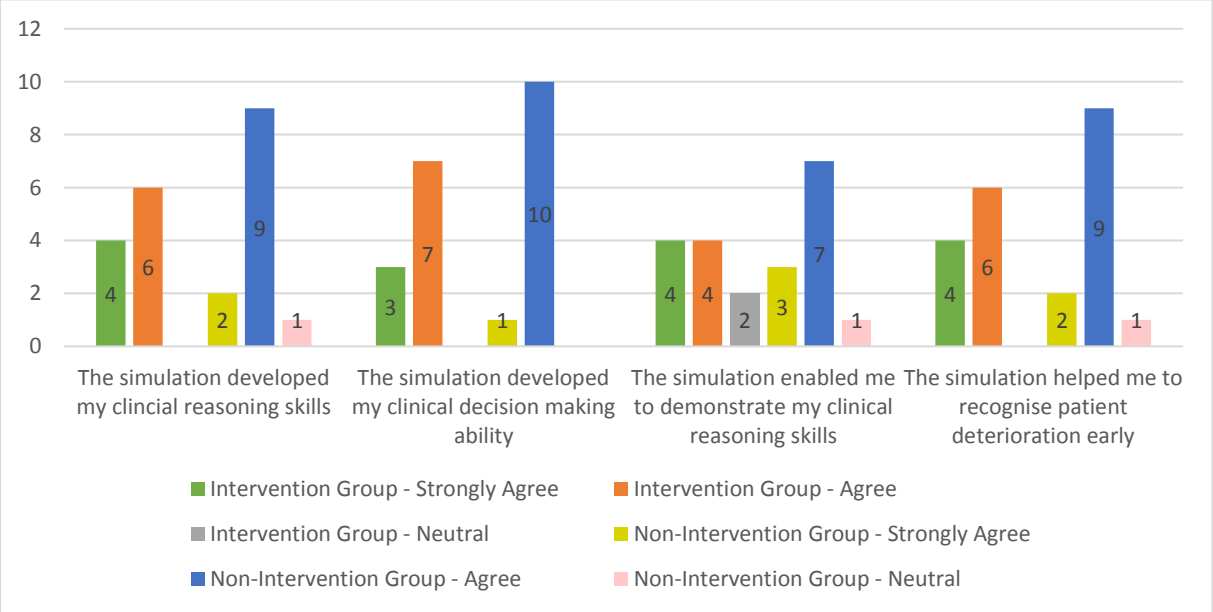


Chart 10: SSES rating both sites

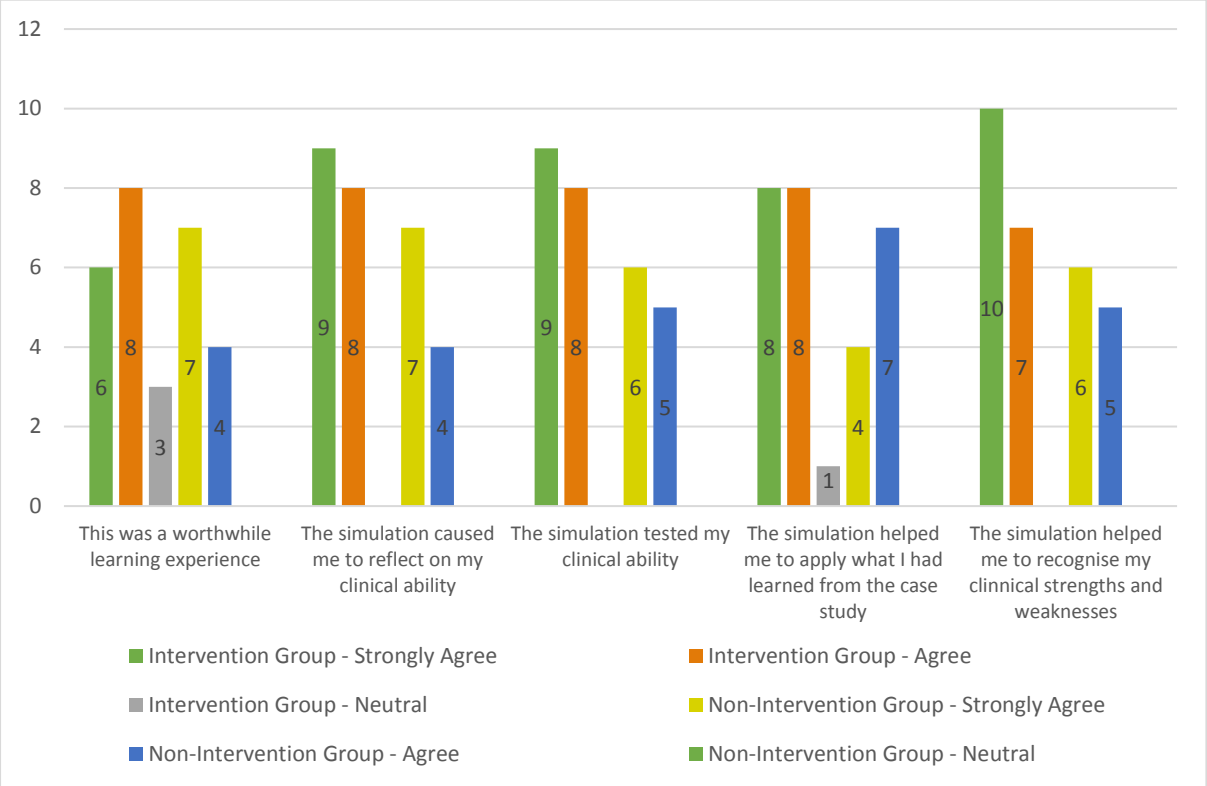
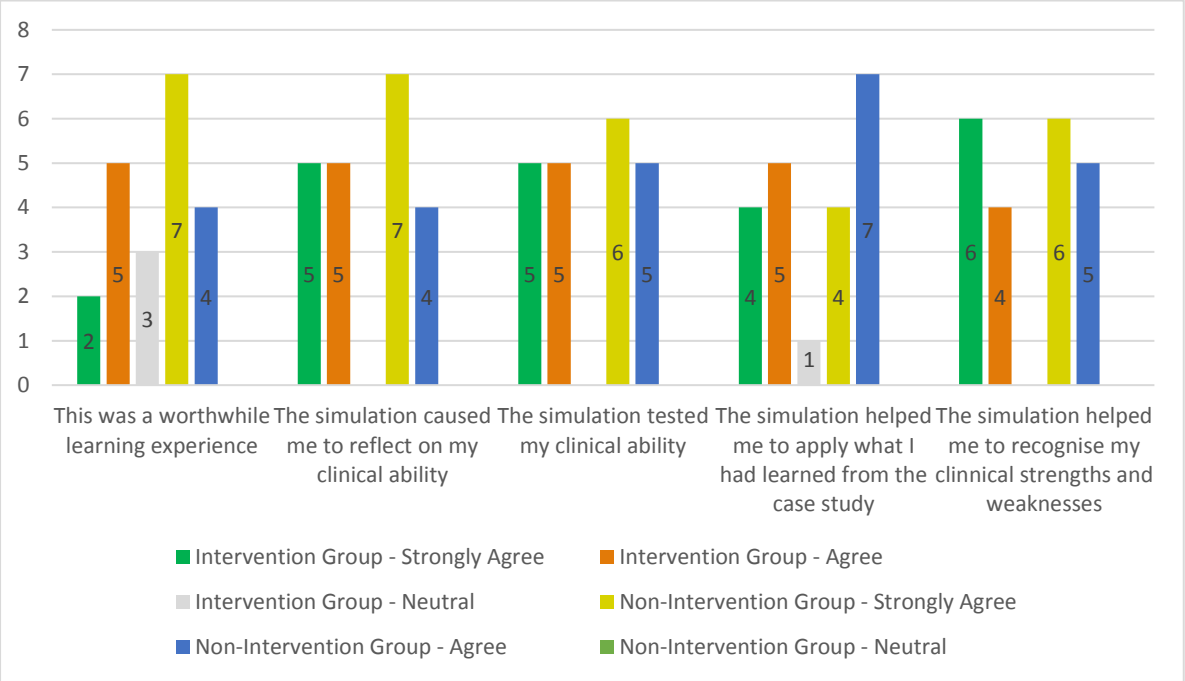


Chart 11: SSES rating SCU students



Simulation feedback evaluation:

Thirty students completed the Simulation feedback evaluation with eighteen from the intervention group (including seven mental health) and twelve from the non-intervention group.

Chart 12: SSES rating both sites

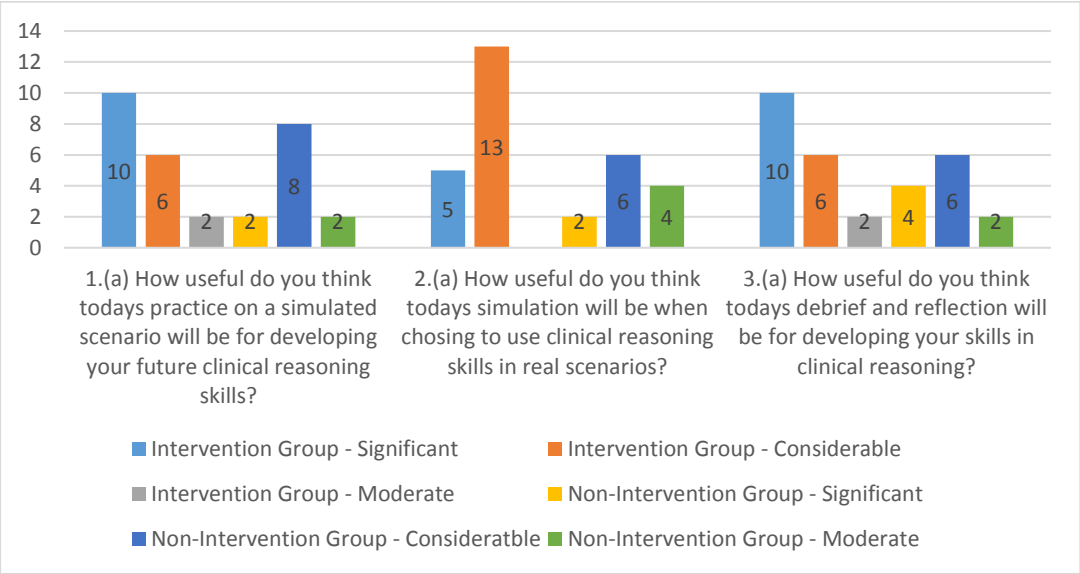
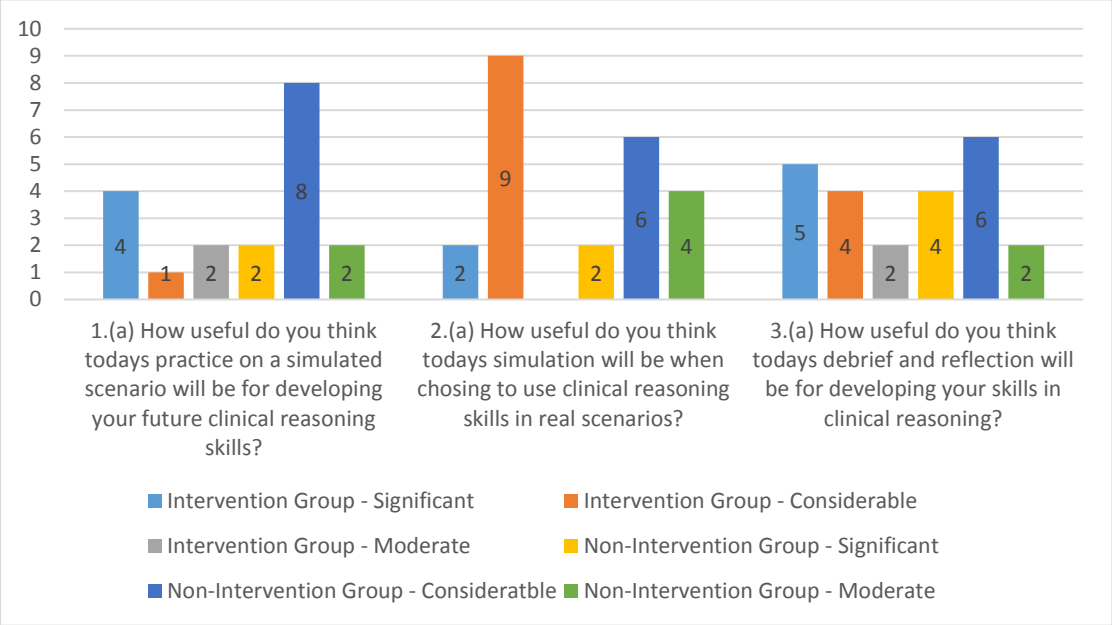


Chart 13: SSES rating SCU students



Clinical reasoning rubric: Comparison between scores rated by students and scores rated by the facilitator:

During the simulation activity students were given the opportunity to use the rubric to peer review each student as they completed the simulation activity. Students felt this activity was beneficial and contributed to their overall engagement in the simulation exercise.

Data from the UON students was collated separately as all students from this site elected to be involved in the intervention group with no participants electing to be in the non-intervention group. As a result this data has been reported separately with a comparison between the student global ratings and the facilitator global rating.

Students from the SCU showed very little difference for the global rating score between the intervention and non-intervention group. A majority of students completed the peer review rating as either competent or expert. There was however a difference between the facilitator global rating

rubric score between the intervention and non-intervention groups. A majority of students in the intervention group rated at the expert level while the rating for Novice/Advanced beginner was the highest in the non-intervention group. Due to the low number of participants and the method of data analysis it is difficult to provide a conclusive rationale as to why this may have occurred. It may however indicate that the intervention had some impact on the students' ability to apply clinical reasoning skills to practice.

Chart 14: SCU Student rated global CRS rubric score

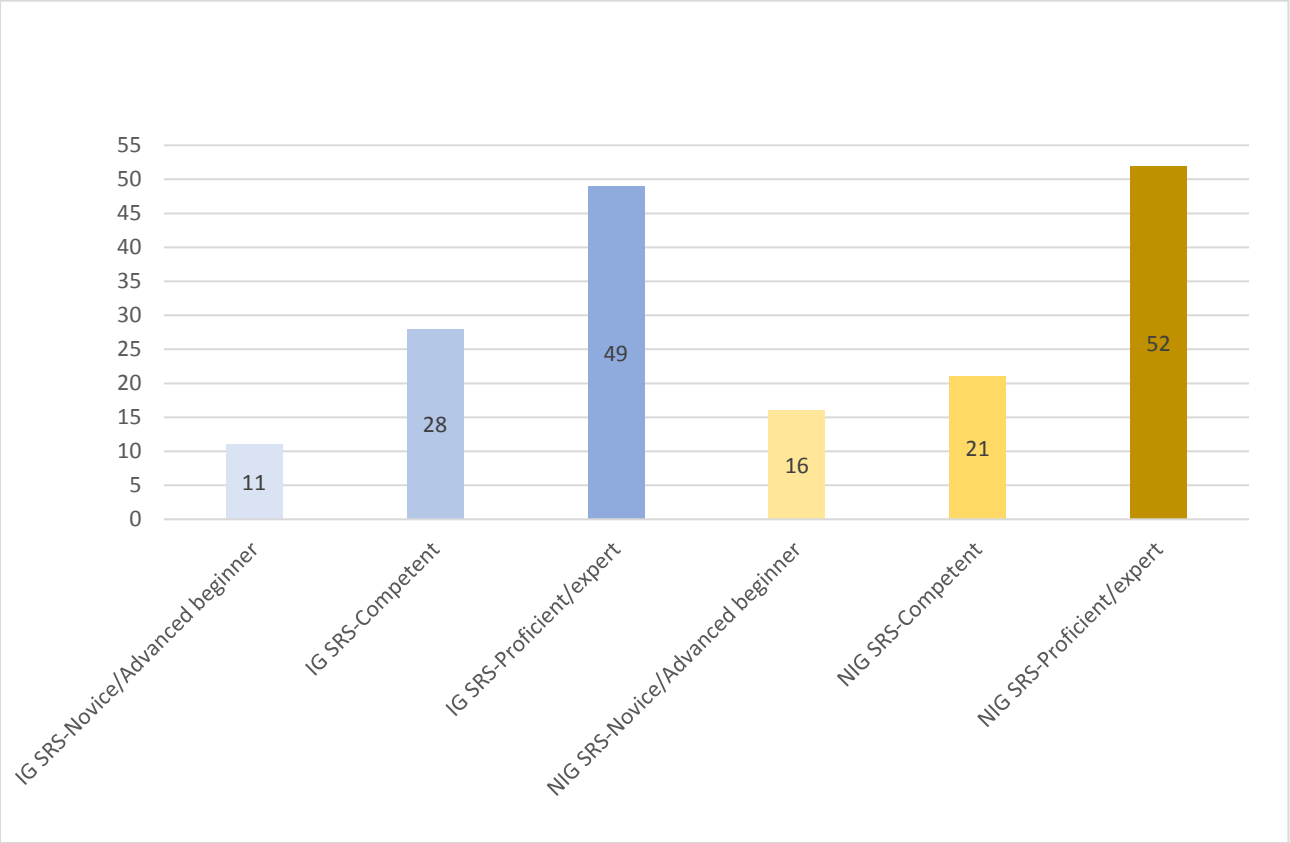


Chart 15: SCU Student rated global CRS rubric score

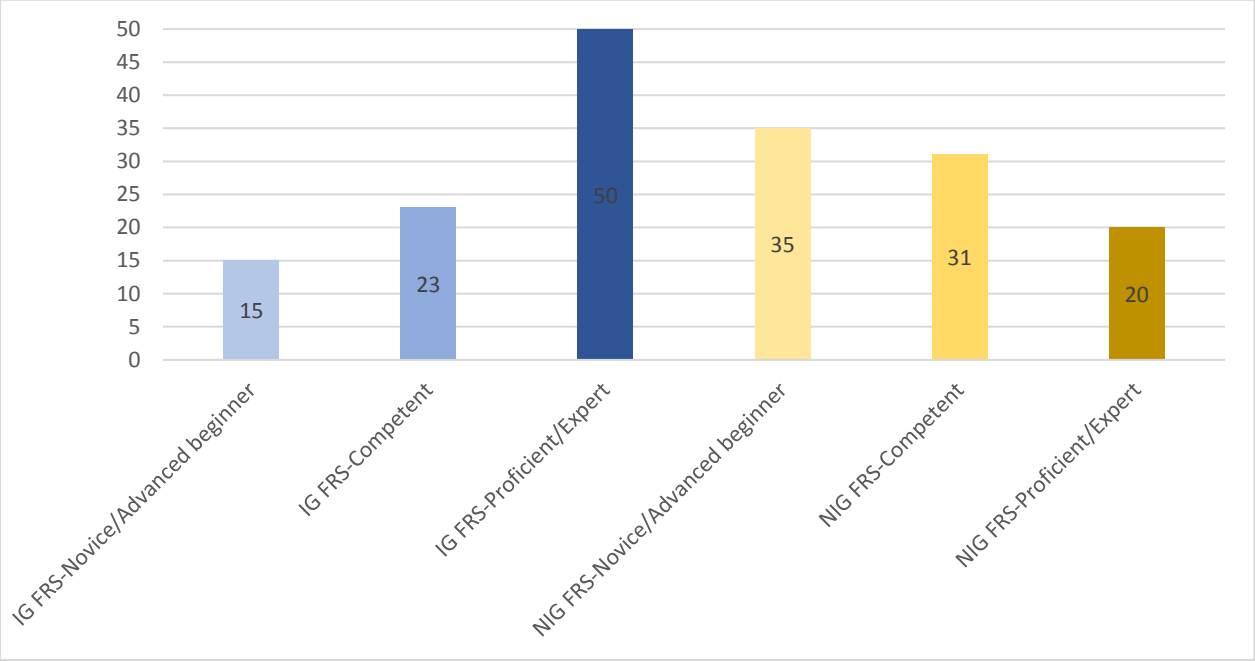
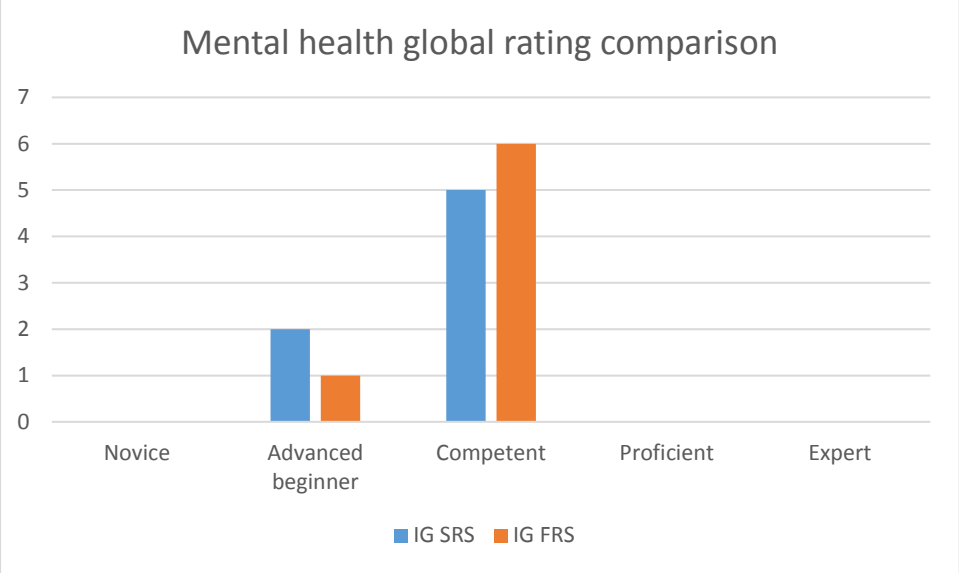


Chart 16: UON Mental health global rating comparison



Discussion

- Although the student numbers for this pilot study were small there is an indication that students found both the clinical reasoning educational workshops and the simulated learning activities valuable. The integration of clinical reasoning theory into clinical practice settings could prove beneficial in preparing students for practice. This would require further consideration about how to modify the current undergraduate nursing curriculum to integrated clinical reasoning into student placements in a sustainable manner.
- Implementing and applying clinical reasoning skills for students in the practice setting requires available resources to build students confidence to develop this skill. During the orientation to placement students reported that they had very little opportunity to practice the application of clinical reasoning and that it did not feature in their clinical placement. Further education to clinical facilitators regarding the components to clinical reasoning and how to use the clinical reasoning during placement would be of benefit

- The simulated learning activities were well received by a majority of the students. Students felt that review by their peers and by the facilitator increased the importance of the activity and that it contributed to their learning. The opportunity to review their rubric score and receive feedback at the completion to the simulation was valued. Students appreciated the opportunity to learn using a tool to measure their progress but without the pressure of the outcome contributing to an assessment.

Limitation and barriers to research project

1. Differences in student placement allocation between university sites affecting recruitment.
The nursing students attending the UON participate in clinical placement which occurs in two-week blocks throughout Semester 1 and 2 of their second year. As a result, the delivery of learning activities occurred more frequently and in small group numbers. Students attending the SCU completed their placement as one block and as a result were able to participate in the learning activities over a two-day period. Recruitment as to the research project was able to occur more intensively over a shorter timeframe.
2. Competing access to placement sites from other universities
It was anticipated that a majority of UON students could be recruited to the project during the latter part of the first semester and early into the second semester 2017. Competition for placement sites from other universities is lowest at this time due less overlap with curriculum and placement scheduling. Delays in ethics approval through the UON ethics board impacted on the project start date and subsequently the UON student numbers available to participate.
3. Changes to predicted student numbers.
The initial recruitment plan for each site was predicted against the number of students who had attended a nursing placement in 2016/2017.It was forecast for 2017/2018 that these numbers would remain the same or increase. For the UON the number of students attending placement had decreased during the project timeframe due to changes in the placement curriculum for 2018.

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Post-practicum interventions for advancing the professional disposition of postgraduate nursing students

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Abstract

Background:

Post-practicum experiences for postgraduate nursing students are often undertaken in nursing their existing workplaces, without a clear set of learning objectives or related activities. Consequently, there appears to be a disconnection between knowledge learnt in tertiary education settings and enactment of this knowledge in the workplace. These students may be aspiring to become advanced practitioners as a consequence of their postgraduate study, yet receive little direction on how to achieve this.

Aim:

Interventions in this project aimed to facilitate better links between university and clinical settings, enhance student engagement and understand professional disposition development in postgraduate nursing students.

Interventions:

Two main interventions: in-class Clinician Peer Exchange Groups (CPEGs), and Online Reading/Resource and Reflection Activities (ORaRDAs) were enacted for these purposes.

Method:

Twenty-three postgraduate nursing students enrolled in one subject for one semester participated in the study. Quantitative data were collected in the form of pre/post-semester, 5-point Likert scale surveys. Qualitative data were collected in the form of students' discussion board (ORaRDA) posts.

Results:

Career advancement was stated as a major reason for undertaking postgraduate studies. Students viewed both the CPEGs and ORaRDAs favourably. They reported enhanced leadership, teamwork and communication skills because of these activities, and considered that the CPEGs and ORaRDAs had helped to advance their nursing careers. Discussion board posts revealed some of the language of an advanced nurse, along with factors that both supported and inhibited nurses' professional dispositions.

Conclusion:

Blended learning (i.e., face-to-face and online) appears to be the best approach for postgraduate nursing students. Teaching and learning activities should be explicitly linked to the workplace, with a focus on enhancing employability and career advancement. Formalised support for postgraduate students in the workplace is recommended. Further research that utilises qualitative methods and longitudinal designs may enhance understanding of how professional disposition develops during and beyond postgraduate nursing programs.

Brief description of academic area and students involved

This project was undertaken in the Faculty of Health at the University of Technology Sydney in 2017. Twenty-five nursing students enrolled in one subject offered in the first year of a postgraduate nursing program (i.e., Graduate Certificate, Graduate Diploma, Masters) consented to participate in the study. Two students withdrew from the subject before data collection concluded, therefore complete data were collected from 23 students in total. These 23 students comprised 20 females and three males, ranging in age from 22-55 years. 70% of the cohort had ≥ 4 years of experience as a Registered Nurse. Eleven students were born in Australia, while the remaining 12 were born in China, Philippines, Thailand, Vietnam and Zimbabwe. Nineteen students were enrolled as domestic students, three were international enrolments.

Particular purpose

The overarching aim of the national teaching and learning project is to provide post-practicum experiences that improve the employability of students. Further to this aim, a set of interventions were developed and trialled in this small project that aimed to:

1. Encourage postgraduate nursing students to link knowledge taught/learnt in on-campus workshops, to their individual work settings;
2. Support peer and individual learning and engagement both on and off campus; and
3. Understand professional disposition development in postgraduate nursing students.

Intensive professional preparation programs, e.g., Master of Advanced Nursing, require students to develop their professional identity, including associated expertise and attributes, in a relatively short time frame (18 months full time, 3 years part time). Postgraduate nursing students' practicum experiences are often undertaken in their existing workplaces, without a clear set of learning objectives or related learning activities. Consequently, there appears to be a disconnection between knowledge learnt in tertiary education settings and enactment of this knowledge in the workplace. These students may be aspiring to become advanced practitioners (e.g., nurse managers, clinical nurse educators) as a consequence of their postgraduate study, yet receive little direction on how to achieve this.

The benefits of postgraduate nursing programs e.g., attitude change, practice change, acquisition of knowledge and skills have been widely reported (Ng, Eley & Tuckett, 2016; Ng, Tuckett, Fox-Young & Kain, 2014). A more holistic nursing outlook, increased confidence in clinical decision-making, enhanced self-esteem, career advancement and increased job satisfaction are considered as facilitators of postgraduate nursing education (Ng et al., 2016; Ng et al., 2014). Improved problem solving, critical thinking, leadership and clinical skills, along with better management of complex situations are also attributed to postgraduate education programs (Ng et al., 2016). Ultimately, nurses with postgraduate qualifications are well placed to contribute to better quality and safety outcomes for patients (Ng et al., 2016).

Conversely, a number of inhibitors for nurses taking up postgraduate programs are also reported. Postgraduate education programs may not adequately prepare nurses to work in their clinical area (Johnson & Copnell, 2002; Ewens, Howkins & McClure, 2001). Some postgraduate nursing students find the traditional academic practices of teaching, learning and assessment (e.g., essay writing) to be challenging and disconnected from their work practice (Burrow, Mairs, Pusey, Bradshaw, & Keady, 2016), while others consider online learning modalities e.g., discussion boards, podcasts, email, information searches, video conferencing as a major source of stress (Ng et al., 2016). The challenges in finding a work-life balance when studying, prohibitive costs and lack of support from employers are also barriers to postgraduate nursing education (Ng et al., 2016).

Making connections between postgraduate nursing education and the workplace can be a positive (Ng et al., 2016) or negative emotional endeavour (Illingworth, Aranda, De Goeas & Lindley, 2013). Many nurses perceive postgraduate education in terms of professional requirements and accountability, feeling positive about the contribution that these programs make to their own personal and professional development, and to the nursing profession overall (Ng et al., 2016). Others are concerned mainly with reconstructing their professional identities in preparation for their advanced nursing roles, secondary to the acquisition of skills and knowledge (Illingworth et al., 2013). Consequently, this calls for a curriculum approach that can accommodate a variety of learning styles, facilitate the development of a professional disposition for an advanced nursing role, and make strong connections between tertiary education programs and actual clinical practice. There is a paucity of literature that suggests the kinds of pedagogic practices that might comprise this curriculum approach. By trialling a set of interventions in one postgraduate nursing subject, this project sought to address this gap.

Enacted post-practicum interventions

Post-practicum interventions enacted for this project were selected in light of the project's objectives and findings from the projects presented from the 'Class of 2016'. The two main interventions were (a) on-campus 'Clinician Peer Exchange Groups (CPEGs)', adapted from the 'learning circles' developed and trialled by Harrison, Molloy, Bearman, Newton and Leech (2017); and (b) Online Readings/Resources and Reflective Discussion Activities (ORaRDAs), adapted from Harrison, Molloy, Bearman, Marshall and Leach (2017).

Students in this postgraduate nursing subject attended four full day workshops spread evenly over one semester. For the CPEGs, on-campus workshop activities were designed around the development of a professional disposition for an advanced nursing role. Students were divided into small groups of five-six, and time was allocated on each workshop day for CPEG activity. In Workshop One, this activity comprised establishing the attributes of advanced practitioners and professional goal setting. CPEG activity in subsequent workshops was related to professional journey, linked to professional goals and post-workshop experiences in the workplace. In the fourth and final workshop, students were also encouraged to revisit their professional goals set at the beginning of the semester. CPEGs were peer-led, with input from the facilitator only as required.

Three separate ORaRDAs scheduled between on-campus workshops were also designed to support the development of a professional disposition. Each ORaRDA addressed a key topic in nursing underpinned by patient safety: (a) leadership; (b) interprofessional collaboration; and (c) teamwork, chosen in light of the wide body of research attesting to their influence on patient outcomes (Levett-Jones. Oates & MacDonald-Wicks, 2014; Stone, 2009). For each topic, students were provided with one resource e.g., a reading, national guideline or a video clip. Key questions to guide learning and reflection accompanied each resource and were used by students to structure their online discussion board posts. Students were also provided with guidelines for responding to other students' posts. Participation in the ORaRDAs, including one original post and one response post to each of the three separate topics, comprised a mandatory assessment item for the subject.

Data gathered and analysed

The project adopted a mixed methods approach. Following ethics approval, quantitative data were collected in the form of pre and post-semester surveys. These tools used a 5-point Likert scale, with 14 and 20 items respectively. Questions were asked around three domains of skills and knowledge development; teaching and learning strategies; and professional disposition. These instruments were developed specifically for postgraduate nursing students in this study, although questions around professional identity were adapted from Bialocerkowski, Cardell and Morrisey's (2017) *Professional Identity in Speech Pathology* questionnaire. Free text questions around participants'

preferred learning styles were asked at the end of the survey. Demographic and occupational data were also collected, including age, gender, language, country of origin, type of enrolment (i.e., international or domestic) and years of experience as a Registered Nurse. Quantitative data analysis was performed using SPSS Statistics Version 24.0. Descriptive methods were used to analyse data and report findings.

Qualitative data were collected in the form of online discussion posts, (i.e., the ORaRDAs). These data were imported into NVivo Pro 11, and analysed using a general inductive approach in accordance with principles described by Thomas (2006). With 'professional disposition' firmly in focus, the primary researcher read and re-read each participant's transcript many times, establishing a set of categories and subcategories (i.e., themes) that constituted the preliminary findings. To enhance the credibility of the findings, a second researcher independently analysed the data.

Key findings

Detailed data analysis for this project is in progress, however preliminary findings from both data collection tools (i.e., pre/post semester surveys, ORaRDA posts) are set out below.

Pre- and post-semester surveys

Preliminary findings from these surveys are presented under sub-headings that align with this project's three specific aims (i.e., linking subject knowledge to the workplace, supporting peer and individual learning and engagement on/off campus and understanding the development of postgraduate nursing students' professional disposition).

Linking subject knowledge to the workplace

Post-semester survey responses suggest that strong links were made between students' postgraduate nursing studies and indicate their individual workplaces. Twenty of the 23 participants reported enhanced development of their leadership skills at work, and twenty participants also considered that their teamwork and communication skills had improved as a result of their studies in the subject.

Supporting learning and engagement

Preliminary findings indicate that the CPEGs and ORaRDAs were viewed favourably by students. Table 1 below provides a very rudimentary overview of the data collected around these learning and engagement activities. Twenty-three post-semester survey responses were received in total. The number of participants reported in this table are those who responded either 'agree' or 'strongly agree' to the related survey questions.

Table 1 *Positive responses post-semester in relation to learning and engagement activities*

	CPEGs	**ORaRDAs**
	n = number of participants reporting	
Facilitated development as an advanced nurse	21	17
This activity is generally valued	21	17
Engagement with others in this activity enhanced learning	21	21
Learning from this activity has been integrated into nursing practice	19	20

To reiterate, these findings are unrefined at this stage. There were responses to these questions where students either disagreed or were undecided about the effectiveness of the learning and engagement activities.

Professional disposition

Responses related to the development of professional disposition over the semester were encouraging. Nursing career advancement was strongly reported as a reason for undertaking postgraduate studies. Twenty-three of the 25 participants who completed the pre-semester survey stated that they were undertaking postgraduate studies for career purposes. Eighteen participants also indicated pre-semester that they were intending to apply for an advanced position at the end of their program. At the conclusion of the subject, 22 of the 23 participants who completed the post-

semester survey considered that they had made progress towards becoming an advanced nurse, and 21 reported that the subject had helped to advance their nursing career. Free text responses in this survey included references to becoming *"a more confident nurse"* and *"more confident in my practice".* Fifteen participants stated that they were ready to apply for an advanced nursing position because of their studies in the subject, and nine of the 23 participants had already applied for such a position.

Discussion board posts

Since the actual tasks that constituted the ORaRDAs in this subject were explicitly asking for students to link subject knowledge to their workplaces, and required learning and engagement with others, data collected from participating students' online posts were analysed in relation to professional disposition only. Three main themes emerged: (a) the language of an advanced nurse; (b) factors supporting the development of postgraduate nurses' professional disposition; and (c) factors inhibiting this development.

Developing a professional disposition: advanced nurse language

Language indicative of an advanced nurse was evident in the ORaRDA posts. Perhaps due to the content of the ORaRDAs (i.e., leadership, interprofessional collaboration, teamwork), words and phrases such as *"teamwork", "communication", "patient safety"* and *"patient advocate"* were used frequently by participants. Using this kind of language is unsurprising, as it underpins all levels of nursing practice (Levett-Jones et al., 2014; Stone, 2009).

Noteworthy in these posts was that 16 of the 23 sources analysed either referred to themselves as *"experienced"* or *"senior",* or referred to others in their various work settings as *"junior".* When recounting various experiences in their workplaces, quotes included *"As a senior member of my team I understand…", "While communicating to junior medical and nursing staff, I always…"*. These quotes do not suggest that professional disposition had developed because of the ORaRDAs, although perhaps this activity may have encouraged postgraduate nurses to express their dispositions more openly.

Open expression was also evident in the number of posts where students acknowledged the gaps in their nursing practice: *"…being a reasonably senior nurse I felt extremely embarrassed and incompetent that I did not know how to do this";* and the steps they had taken/were taking to address them: *"[I] learnt from this…studied clinical teaching and became an educator."* ORaRDA posts were also supportive of others when they recounted their own adverse experiences: *"Thank you for sharing your story…"* and *"Your practice was very professional in this situation…"* These quotes may support honest reflection as a hallmark of advanced nursing practice (Chirema, 2007), although more research is needed around how nurses' reflection progresses or deepens over time (Dubé & Ducharme (2015).

Developing a professional disposition: supporting factors

Five factors were reported as supportive of advanced nursing practice: (a) formal directives and guidelines; (b) workplace education; (c) reflective practice; (d) support from senior nurses; and (e) peer interaction/debriefing. These factors, specific examples, the number of participants (i.e., sources) who reported them and supporting quotes are presented in Table 2 below.

Table 2 *Factors supporting the development of a professional disposition in advanced nursing*

Supporting factor	Examples	No. of sources	Supporting quotes
Formal directives and guidelines	Nurses' Code of Conduct, Code of Ethics, National Safety and Quality Health Service Standards, hospital or area health policies, clinical pathways e.g. 'Sepsis Kills'.	20	[Nursing] practice needs to be grounded in a capacity for compassion and empathy, as is evident in our standards of practice and codes of ethics…[it's]what it means to be a professional.
Workplace education	Ward in-services, simulation, clinical supervision/mentoring, online programs e.g., 'DETECT'.	19	…in my workplace…ward in-services…reinforce nurses' knowledge of doing the primary [surveys] accurately and efficiently…these skills are important for early recognition and response to patient deterioration
Reflective practice	Reflecting on challenging clinical situations; reflecting on time as novice or new graduate	19	I reflected on the case in a systematic way and presented it at a clinical case meeting…This allowed me to explore positive and negative aspects of the case
Support from senior nurses	Escalating issues of discussing concerns with Nurse Unit Manager, Clinical Nurse Consultant, Clinical Nurse Educator	15	Against my gut instincts l was instructed not to perform a 12 lead ECG or collect formal bloods for electrolyte monitoring. I escalated this to my NUM who supported [me]…
Peer interaction and debriefing	Gaining feedback from others in relation to knowledge/skill deficits; post critical incident	14	I've initiated post-critical incident debriefing in our unit and my colleagues have reported that they feel better after these sessions. We are able to express how we feel about events and brainstorm the best possible management strategies for the next time we encounter a similar situation

Developing a professional disposition: inhibiting factors

The overarching inhibiting factor in developing a professional disposition for an advanced nurse role was frustration at their concerns being dismissed in the clinical environment, particularly in relation to situations of clinical deterioration or potential compromises to patient safety. Twenty-two quotes from 13 participants reflected this frustration, outlined in Table 3.

Table 3 *Inhibitors to professional disposition development in advanced nursing: "being dismissed"*

Inhibiting source	No. of quotes	Sample quotes
Medical officers	20	I have had a number of incidents where I have tried to escalate concerns to medical teams before and have been dismissed…It is such a helpless feeling, you feel like you're not being taken seriously. I also find the lack of support from medical staff…can be incredibly frustrating and also feel quite disheartening as you walk away from your shift feeling like you have not done your best job which is not the case.
Nursing colleague	1	I was particularly intimidated by this RN, and she immediately dismissed my concerns. The patient ended up having had a stroke. The RN was a great model for how not to be, and I learned that patients in my care rely on my ability to speak up.
Executive management	1	The patient's lonely death left me very sad and remorseful, besides very angry with the facility managers who had repeatedly ignored my request for more staff members. I felt that I was failing my patients, but I also did not know what I should do to address such a situation.

Discussion

This is a small-scale study and its findings should be considered as tentative and exploratory. However:

- The majority of postgraduate students in this study were undertaking postgraduate education for career advancement. Therefore, teaching and learning activities in postgraduate education programs should make explicit exactly how they will enhance employability in various work settings, and should be designed with career advancement in focus.
- Considering the positive responses to both the CPEGs and the ORaRDAs, a blended learning approach may work best for postgraduate nursing students. Learning activities in both of these approaches should be designed to complement each other, with the development of a professional disposition for advanced nursing roles a major objective.
- Teaching and learning activities in postgraduate nursing education should support students to make clear links between their university studies and their work settings. From the preliminary findings, these links may be in the form of: (a) clear alignment with industry directives and guidelines; (b) encouraging nurses to convey key/relevant learning to their workplaces in the form of ward inservice, committee participation etc., (c) well-designed reflective practice activities (which appear to remain a valuable tool for nurses).
- Given that these study participants viewed support from senior nurses e.g., NUMs, to be an enabler in developing professional disposition, a more formalised arrangement for workplace support (e.g., mentoring, clinical supervision) should be considered.
- More research is needed. Qualitative data in the form of focus groups and/or interviews with postgraduate nursing students may better understand factors that support professional disposition and the teaching/learning interventions that best facilitate this. Longitudinal studies could elaborate how professional disposition develops over time, including links to employability. Research into the effectiveness of blended learning programs for postgraduate nursing students should be ongoing.

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Developing personal and professional identity through transformational experiences

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Abstract

Work-integrated Learning (WIL) is an approach which has proven to be a popular option for higher education in Australia to support students in developing their professional skills and helping them become "work ready" (Patrick et al 2007). It is considered one of the most effective ways of preparing students for the workplace (Goulter & Patrick 2012). However, when the structured work placement format is applied to the design of a service-learning (SL) experience there are opportunities for deeper and broader development than just students' professional identities. The Community Internship Course is an SL program structured as a WIL shell course which accommodates students from any discipline, to take up roles in a range of not-for-profit organisations. Unlike traditional WIL courses, this course positions students to consider their role in relation to aspects of Human Rights, Community Engagement, Leadership and Social Justice that their organisations and the roles the students assume, aim to address. This course has been designed to raise student awareness of their growing identity, both professional and personal, resulting from their community-based experiences. The course design embeds a major focus on personal and professional skill development through reflective assessment and course content both of which provide rich opportunities for students to recognise transformation in their perceptions of themselves and their role in the community. This paper will report on how this WIL based SL course has designed and implemented a post placement intervention to support students in recognising their growing sense of personal and professional identity, enhancing students' confidence as graduates and citizens.

Brief description of academic area and students involved

Literature indicates that WIL programs and service learning environments enhance students' awareness and development of professional and personal skills through exposure to opportunities in the workplace and the community respectively (Kiely, 2005; Mezirow, 1997; Schor, Cattaneo & Calton, 2017). By combining these formats, the Community Internship course has been designed to transform student's perspectives about themselves and the world (Mezirow, 1978, 1991) to focus not only on becoming a capable professional but also a socially responsible citizen (Palmer, Zajonc, & Scribner, 2010).

The Community Internship course is a WIL shell course which accommodates 600-700 undergraduate and postgraduate students who enrol each year. Students enrol in the course from all discipline areas of the University, with some students having the course as a core requirement, others a listed/recommended elective, or as a free-choice elective. The only requirement is that the student has completed 80CP of their degree program. There is no minimum GPA requirement.

Particular purpose

The goal of the post practicum intervention for students is to raise their awareness of their growing identity, both professional and personal, resulting from transformational experiences. As a Service Learning program, the course provides students the opportunity to volunteer at one of a range of not-for-profit organisations. In addition to completing a minimum of 50 hours volunteering, the course requires students to critically reflect on their personal and professional skills through

individual, written and oral academic assessments through the lenses of Human Rights, theories of social justice and a growing understanding of personal privilege. These assessment tasks are designed to support students to identify their personal and professional growth and the potentially transformative learning that they take from this experience. Collaboration is an important element in preparation of the assessments which is provided by structured activities and peer reviews conducted at the workshops. Students are supported by both an Academic Advisor as well as a designated supervisor at the community organisation. The high level of scaffolding and support provided by the internship course design fosters a supportive and safe environment for reflection and growth. However, there was an opportunity to enhance and reinforce the transformational value of the experience through the implementation of a post placement intervention.

Enacted post-practicum interventions

To design an effective intervention tool to capture and enhance students' awareness of how these course elements work together to contribute to a sense of growing personal and professional identity and potential transformation, it was important to first consider what factors were required to ensure this outcome.

Self-efficacy and agency

Universities equip students with a broad range of skills, however, entering the workplace and successfully transferring the learned skills is not necessarily a simple process for all students. To be able to develop skills, it is essential to have a sense of self-efficacy, which Bandura (1977) defined as one's belief in their personal capabilities to succeed in tasks. This means that for students to overcome challenges as presented in new environments, educational as well as professional settings, it is essential to possess a certain sense of self-efficacy (Bandura, 1977). Skill application and development by offering, amongst others, 'mastery experiences', such as WIL programs, is incredibly effective in increasing self-efficacy (Bandura, 1982). This is in line with Trede's, Macklin and Bridges (2012) higher education literature examination on professional identity development: that to enhance students' self-awareness, an active an independent/autonomous (agency) attitude is required to engage in the learning opportunities. Thus, the design of the intervention tool needed to emphasise self-efficacy and agency to enhance the impact of the service learning experience on a student's professional growth. However, to raise student awareness of the personal growth and transformational nature of their experience other aspects of the course design required accentuation.

"Disorienting dilemma"

The main focus of the course is to facilitate a transformational learning experience that expands students' conception of themselves as citizens. The course is designed to scaffold and emphasise the transformational opportunities of the internship that act as a mechanism to increase awareness of personal and professional development. The service learning environment exposes students to new concepts, and, often, such a critical experience causes a 'disorienting dilemma' which needs resolving (Mezirow, 2000). In support of this concept Kiely (2005) classified five consecutive stages for students to deal with the discomfort of a confrontation with only the two final stages of processing and connecting leading to transformation. 'Processing' occurs on an individual reflective level as well as a social, dialogic learning process, where on both levels the learning opportunity is being problematised, questioned and analysed. The final 'connecting' step is for those previous conclusions/outcomes to be understood within the student's own/personal environment, and, consequently, results in accepted and adapted new thought patterns. These transformational opportunities encourage students to be autonomous and be their own social agents of change in a collaborative environment which is considered a key aspect for the learner to succeed in a twenty-first century workforce (Mezirow, 1997). Based on these concepts to enhance the concept of

transformation and personal development the intervention would need to emphasise how an experience impacted the student's ability to process and resolve different situations. However, to leverage the impact of the 'disorienting dilemma' the intervention required an element of critical reflection.

Reflective Thinking

Mezirow (1991), for the model of transformative learning, has underpinned the importance of reflective thinking. Through reflection in and on action, the level of personal, professional identity development and, ultimately, transformation can be determined. The academic component of the course requires students to critically reflect upon their learning experiences and enhance their awareness of personal and professional identity development. To measure the level of reflective thinking, Kember et al (2010) introduced a questionnaire where one's reflective thinking can only lead to a transformation of perspective when it reaches the fourth and final level of "critical reflection". This also ties in with Kiely's (2005) framework where in a service-learning environment the learning occurs by challenging existing mindsets, processing and, ultimately, connecting new perspectives. However, without critically reflecting upon the opportunities, there is no learning. In other words, in order to facilitate students experiencing transformational opportunities, critical reflection has to become an embedded part of their process. The post-placement intervention, therefore, has to embed reflection in its design to augment and establish the effect transformational opportunities have on student's personal and professional identity development.

With the factors of self-efficacy, 'disorienting dilemmas' and reflective thinking as criteria an intervention tool was designed so as to complement and reinforce the content and outcomes of the course. It was an opportunity to also create an evaluative tool for the effectiveness of the course in providing transformational experiences. Based on the work of Kember, Leung, Jones, Yuen Loke, McKay, Sinclair, Harrison, Webb, Yuet Wong, Wong, & Yeung (2000) who have developed a quantitative method for identifying transformation a survey was developed. Kember et al (2000) used a "combination of the literature review and initial testing [which] led to the development of a four-scale instrument measuring four constructs; habitual action, understanding, reflection and critical reflection" (p.381). These four constructs were used to create a validity tested survey which was repurposed to suit the Community Internship Course as a post placement intervention tool incorporating elements of self-efficacy and agency and embedding reflection. As a post placement intervention this survey was designated to be implemented at the end of the course to encourage students to reflect on all elements of the course and how these elements supported their raised awareness of their personal and professional growth. The survey asks students 19 questions. The first ten questions were to assist in identifying any potentially influential external factors. The remainder were a Likert scale series of questions specifically designed to engender, through encouraging critical reflection, an increased awareness of their personal and professional growth as well as identify transformational aspects of the internship experience.

Data gathered and analysed

To assess the design of this tool, that was to act as both the intervention as well as the evaluative measure of the student's awareness of their professional and personal growth, it was implemented with a smaller number of students to allow for time to adjust before its full implementation in the following trimester. The tool was provided to all students who participated in Trimester 3 2017. The students were from multiple campuses and had range of different internship workplaces. Due to the short time frame, only a small number (n=20) of the larger student cohort (N=248) responded. This low response rate informed the process by identifying the need to ensure that the students are prepared for and made aware of the importance and purpose of this tool throughout the course.

Key findings

The results from this smaller sample show that there was a representative spread of demographics in most questions however, the majority of respondents came from the area of health. There was also a larger percentage of students with a GPA over 5; only three had less than 5 while no respondents were under 4.

Where students were asked about their experience as a result of the course in almost every instance only three students selected the lowest two options indicating little to no impact on their personal or professional growth. These were the same three respondents that also indicated that they were Dissatisfied (1) or Neutral (2) about their experience overall where the other students indicated they were satisfied (11) or extremely satisfied (7).

With the series of 10 Likert scale questions there is a risk of respondents selecting the same response to each question without understanding the what is being asked. However, of the 21 responses only one student gave the same response to each of these questions. The result overall showed that students were mindful of the impact of the course and how the experience changed or did not change them both personally and professionally.

Discussion

With only a small sample to examine the responses indicate that the design of the tool will capture and guide students in reflecting on their personal and professional growth and highlight those students who have had a transformative experience. It will, however, require further integration to ensure student preparation and participation. The course elements already provide a major focus on personal and professional skill development and the assessment and content of the course provide rich opportunities for students to recognise transformation in their conceptions of themselves and their role in the community. This intervention will capture and augment students' awareness of how these elements together contribute to a sense of growing personal and professional identity, enhancing their confidence as graduates and as citizens going into the world.

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Post Practicum Debriefing: putting the 'wise' into wise practice within university-led work-integrated learning projects

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Abstract

This project set out to evaluate the role and impact of the group reflective debriefing session within a university-led WIL journalism project by exploring how it contributed to student learning, professional identity, and enhancing the student experience. More specifically to identify key elements for the structure and format if an ideal group debriefing session as part of a university-led WIL project within a journalism program. The post-practicum intervention for students was incorporated within the case study to not only to assist in developing their reflective learning through a guided group debriefing, but to evaluate the transformational change experienced in undertaking university-led WIL. The practice of debriefing has been identified as one of the important factors contributing to positive WIL outcomes for students. Debriefing sessions were adopted to capture students' perceptions of identity and self-efficacy on commencing study in the television journalism unit. Student development and transformation in confidence and ability was also assessed through analysis of comments made about their learning and transformation during the group debrief session. A mixed-methods approach was adopted combining a quantitative survey with qualitative data collection incorporating two small-group peer reflective sessions. Data analysis for this project is in final stages, however the following key findings have been obtained from the initial review of the three data sets. The initial key findings indicate that students truly value the practicum experience broadly: they recognised how their skills developed through scaffolded learning and then applied in a real-world context, they came to appreciate and understand the challenges associated with working in a real newsroom, and they gained confidence in their own skills and abilities. Of particular relevance though, was the students' appreciation for the value of reflection and feedback throughout the practicum. The students overwhelmingly saw the value in the debriefing sessions for their practice and enjoyed the benefits of ongoing group and individual feedback and the opportunity to reflect on their practice and considered them an integral part of the overall experience.

Brief description of academic area and students involved

Journalism education in Australia is trying to find its way in a constantly evolving convergent and shrinking news culture (Deuze, Bruns, & Neuberger, 2007). WIL in journalism education has a "key role to play in extending learning experiences" (Forde and Meadows (2008, p. 5). This research project involved (n=36) third-year journalism students enrolled in Television Journalism as part of their final year at Griffith University. Students participated in the post-practicum experience as the final segment of two intense university-led WIL projects embedded within the unit. A select group of nine students participated in the World Press Briefing for the 2018 Commonwealth Games; and the whole cohort participated in the Blues on Broadbeach music festival.

Particular purpose

This project set out to evaluate the impact of a group reflective debriefing session and it's place within a university-led WIL journalism project, with a particular view to exploring how: group debriefing compounded the learning experience; contributed to student professional identity; and enhanced the student learning experience. The aim of the post-practicum intervention for students was to assist in developing their reflective learning skills through a guided group debriefing, and as a process for students to evaluate the transformational change experienced in undertaking university-led WIL. The practice of debriefing has been identified as one of the important factors contributing to positive WIL outcomes for students (Billett, 2009; Ferns et al., 2014). This project presented an opportunity to build on the prior work of Meadows and Forde (2011) around WIL in journalism education, with particular emphasis on the significance of reflective sessions at the conclusion of WIL experiences within journalism programs in Australia, and further explore the comparative role debriefing played in University-led WIL experiences. Debriefing refers to the process of facilitated reflection on experiences and acquired learning (Ferns et al., 2014), thereby assisting students to critically appraise their experiences through practice. The process of debriefing is particularly important as it challenges students to actively evaluate their strengths and weaknesses (Helyer, 2015), for example, the systematic reflection of experiences encourages students to learn from their experience by considering thoughts, such as, "what else could have been done?", and "what could be done better next time?" (Gibbs, 1988). Moreover, research has indicated that the benefits of reflective skills are further enhanced when individuals collaborate and share WIL experiences with others (e.g., debriefing), since this encourages students to critically reflect and disclose their thoughts and feelings with supportive others (e.g., academic advisors, students) (Gray, 2007; Helyer, 2015). Together, the development of these personal and professional skills is said to help students adapt to the future job market (Helyer, 2015).

Enacted post-practicum interventions

The intervention tools in the present study included measures that were adopted to capture students' perceptions of identity and self-efficacy on commencing study in the television journalism unit. Student development and transformation in confidence and ability was also assessed through analysis of comments made about their learning and transformation during the group debrief session. At the conclusion of each of the intense WIL practicums, the group debrief session was conducted immediately after all professional tasks had been completed and prior to the end of the working day.

Data gathered and analysed

A mixed-methods approach was adopted combining a quantitative approach (surveys), and qualitative data collection incorporating two small group peer reflective sessions. These reflective sessions were informed by qualitative interviews with two of the student leaders.

At the beginning of the trimester, all students were invited to complete a quantitative survey to establish perceptions of identity and self-efficacy. Survey design drew on surveys used by Smith and Ferns (2014) to assess *the impact of WIL on student work-readiness* amalgamated with *The General Self-Efficacy Scale* survey models used by Dr Elizabeth Cardell (2017) for her *Personal Resilience Questionnaire*. These questions were adapted to reflect the professional requirements of journalists. All students were surveyed at the beginning of the semester and at the end of the semester to measure development and transformation in confidence and ability.

Two qualitative face-to-face interviews were conducted post-survey and pre-group debriefing session. These interviews focused on obtaining insight into the student perception about the role that the debriefing sessions played in their WIL experience and what students wanted to

obtain from future sessions. These interviews were used to develop the structure and focus of the reflective group debriefing session to be conducted as part of the university-led Blues on Broadbeach WIL project

Blues on Broadbeach students were separated into two groups based on availability (Saturday group and Sunday group). Each group of students was invited to participate in a quantitative survey at the beginning of each day. Students then participated in a structured peer-reflective debriefing session based on information gleaned from the consultations with the two student leaders regarding their learning priorities. Following these session, students were invited to complete a survey about their experience and perceptions of the debriefing session. This exit survey was designed to measure the deeper learning that might have occurred for the student's post-practicum; and the exit survey also allowed for the evaluations of the debriefing sessions as a learning tool.

Key findings

Data analysis for this project is in final stages, however the following key findings have been obtained from the initial review of the three data sets described in previous section. The findings can broadly be categorised into three areas: first, the development of practical, workplace-relevant skills, second, the value of the broader practicum format, and finally, the role of the debriefing sessions.

Student perceptions of skill development

The first broad area of findings refers to student perceptions of how their professional skills have developed. The students took away practical lessons from the professional practicum (i.e., how to approach talent, edit and compile a video package), which they noted they would not have learnt otherwise in the classroom. Despite the associated challenges, students valued the opportunity to learn how to adapt and be flexible when approaching journalistic tasks and challenges. The students also learned how to deal with setbacks and adapt to changing situations. As one student succinctly put it: "*The main thing I learned was nothing ever really goes to plan".* Such a realisation was a recurrent theme, with students realising the importance of evolving their approach as circumstances change and remaining open, agile, and flexible in how they approach journalistic tasks.

Students also developed their practical time management skills. Working within deadlines is crucial for journalists; while the students noted their struggles with the time constraints, they were reminded that "real" deadlines are often much tighter. One student recognised this challenge, but was able to reflect on how it impacted her professional practice: *"I think it was hard, but it pushed us more"*. Many students did find the pressure challenging but most found themselves more driven and motivated to meet the deadlines. This could be due to the students' increased confidence resulting from the professional setting. Working in this environment and carrying media identification, made the students feel more confident and develop a new respect for the craft of journalism. One student offered the following example:

> *"...confidence is a massive thing. Like, first week, I was like I don't want to be behind… I don't want to be in front of a camera at all. I want to be behind it. But, by the fourth week, I was standing on the Griffith Bridge… looking like an idiot trying to make up a story and I didn't care… especially with interviewing, like, I could walk up to anyone and I'd be pretty lax."*

The students recognised the trust placed in them as "real" journalists in a "real" newsroom, and gained the confidence and motivation to rise to the associated challenges.

Student perceptions of the practicum format

The second broad area of findings refers to how students experienced the broader practicum and the value they saw in it. Broadly, the students consider work-integrated learning to be 'invaluable'. When asked whether they learned more in the classroom or in the professional practicum, the

response was overwhelmingly in favour of the practicum. Similarly, students almost unanimously found the practicum experience to be more rewarding than time spent in the classroom. Having said that, the students did recognise the value of their classroom learning and how they were able to apply it during the practicum. Seen to be of particular value was the scaffolded learning format over the years. One student said:

> "*But I think we need, like, kind of maybe just a little bit in the beginning… like, if it was the first week and you threw us in this, I think we would all just die. But now that we've done those other assessments, we know how it works…"*

Students overwhelmingly valued the practicum and recognised the impact on their learning. They also gained a new appreciation for the scaffolded learning that built up to the practicum.

Student perceptions on the value of debriefing sessions

The final broad area of findings refers to the students' perceptions of the value of the debriefing sessions. Based on initial analysis, students overwhelmingly were supportive of the debriefing sessions and recognised their value for improving their practice. In terms of format, students generally valued feedback given in real-time with an opportunity for discussion after a professional practicum. As one student said: *"We survive and thrive off feedback whether it be positive or negative because that way we can adjust how we're conducting ourselves in a professional setting".* Individual feedback emerged as a key desirable outcome of the debriefing sessions Several students expressed the preference for debriefing sessions to provide individual feedback on what they are doing well (strengths) and what they need to improve on (weaknesses).

In terms of format, students expressed a desire for ongoing written and verbal feedback. Students want a combination of oral and written feedback, and suggest using a performance review checklist in order to have a record of their performance, as well as engaging in 'face-to-face' critique. One student suggested that a checklist adds accountability and a point of reference:

> *"...when you've got it on a hard piece of paper and you're responsible for that rather than just hearing it. A lot of people, I find, disregard a lot 'cause it comes through one ear and goes out the other. But if it's on a piece of paper, you've both acknowledged it. You're responsible for how you conduct yourself'."*

Students would also like debriefing session feedback to relate practical experiences to course content (theory). While students recognised the value of their scaffolded coursework learning, many expressed the desire for feedback on the application of the coursework. One student wanted feedback on *"...how well we've applied our journalistic knowledge that we've learned through class to the real-life situation".* A common thread throughout the responses was the desire for ongoing feedback, namely during *and* after the professional practicum.

In a group setting, the students want to review specific examples of what was done right and what was done wrong. They also suggest the use of visual references for television journalism. As one student put it: **"***I think it's good to have a practical vantage point to say, this is something good, this is something bad. This is an example of what happened here that was good and bad".* The use of examples from the practicum itself is supported by a further finding: that students were able to complement each other's strengths and weaknesses through the process of reflective peer feedback.

Finally, the majority of students found the post-practicum debriefing sessions to be highly valuable. Students recognised that debriefing and reflecting was crucial to their learning and ongoing skill development. The format of individual and group feedback was very useful, with one student noting: "*I appreciate individual feedback even if it's harsh. I go, 'Well, [that was] upsetting.' But I kind of learn from it, so I think individual comments for each person is really helpful*".

In summary, the key findings indicate that students truly value the practicum experience broadly: they recognised how their skills developed through scaffolded learning and then applied in a real-

world context, they came to appreciate and understand the challenges associated with working in a real newsroom, and they gained confidence in their own skills and abilities. Of particular relevance though, was the students' appreciation for the value of reflection and feedback at conclusion of the practicum. The students overwhelmingly saw the value in the debriefing sessions as an integral part of their practice and learning experience and enjoyed the benefits of ongoing group and individual feedback and the opportunity to reflect on their practice.

Discussion

- While students reported high levels of efficacy in their pre-practicum survey, this was revised and contextualised by students in the debrief sessions, with students identifying they didn't know as much as they thought they did, however they learnt much more during the practicum
- What is the best format for a group debriefing that incorporates the students' need for detailed, individual feedback and positive aspirational examples.
- How group debriefing sessions facilitated learning and reflexive practice, and how reflection reinforces the concepts learned through WIL.
- Challenges associated with resourcing and staffing debriefing sessions: the format of the debriefing sessions placed a lot of pressure on discussion leaders as they were tasked with providing group feedback and individual feedback, while still facilitating the reflective process.

A smart person learns from their mistakes, a wise person learns from the mistakes of others – Anon

Two parts

Group Session

Recommend a Semi Structured Format taking a flexible approach that would also allow exploration of unique learnings of the individuals within the group, and the group as a collective.

Suggested Questions.

- What works
- What doesn't
- What did you learn
- What would you do differently
- Focus on strengths
- Compounding on what you learnt

Individual Checklist feedback

Students have also indicated that while they see the value of the group debriefing session, they also appreciate additional individual feedback in written form that can be handed out after the debriefing session, possibly in the form of a checklist.

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Listening Circles for Journalism Placements

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Abstract

The Listening Circles for Journalism Placements at RMIT University was adapted from a similar small group peer-led discussion used by medical students at Monash University (Harrison, Molloy, Bearman, Newton, & Leech, 2017). Medical students and journalism students are similar in that students in both cohorts often work in isolation from student peers during professional placements, and often have vastly different learning experiences. Some journalism students, for example, will spend their time covering breaking news stories, such as attending an inner-city rampage or murder scene, while others will write about coffee shops or use social media to promote another journalist's interview with a famous sports person.

For this teaching and learning experiment at RMIT, the Listening Circles brought together students from the Bachelor of Communication (Journalism) and Graduate Diploma of Journalism to reflect upon their internship experiences, and to share what they had learned from those placements. The Listening Circles were not part of the mandated curriculum or assessment process in 2017 or 2018 and, as a result, drew small attendance numbers. However, in 2018 the Listening Circles were built into the teaching schedule for students in the Bachelor program, and were held on alternative weeks in the same room and at the same weekly time slot as the usual seminars.

The competitiveness of journalism students was also foreseen as a potential issue for group reflective practice. It has previously been observed by the chief researcher that in groups of generally high achieving students who will ultimately be competing against each other in an increasingly competitive job market, that one-upmanship between the students could become a problem, and there was a concern that the conversations would focus on current structural problems with the industry or placement providers rather than upon self-reflection. However, each Listening Circle was different. For groups dominated by high achieving students the conversation was more jobs-focused, while in groups dominated by students who generally require more pastoral support (for example, quieter students and students with mental health issues) the conversations were generally more self-reflective and collegiate.

Building Listening Circles into the assessment process in future years will ensure a larger attendance, however, care will need to be taken to balance the needs of the high achieving students against those who generally require more support.

Brief description of academic area and students involved

The Listening Circles were trialled from March 2017 to June 2018 and involved three student cohorts drawn from the Bachelor of Communication (Journalism) and the Graduate Diploma of Journalism). The Bachelor had an enrolment of 50 students in 2017 and 42 in 2018. The Graduate Diploma of Journalism in 2017 had an enrolment of 28 students.

To graduate from both programs students must undertake a professional placement for course credit. The students are encouraged to do two internships of no more than 15 days with each employer. Some students will do as many as five internships, particularly

with major news outlets that will only offer them five days of experience. There is a small number of longer internships (around six weeks) for students to intern overseas.

Students can do their internships over the course of a semester, either for consecutive days for between one and three weeks, or a day or two a week over a semester. These placements include public sector broadcasters, commercial broadcasters, newspapers, online news organisations, communications departments, sports media outlets, sporting clubs, and other non-government organisations that provide information services in a journalistic manner. While the majority of the placements require the students to attend an office setting some are done virtually using online communication and generally, but not always, at least one face-to-face meeting. Students can be required to do shift work including starting as early as 3am or finishing at midnight. They are often required to work weekends and public holidays. During non-standard work hours the students may find there is little or often very junior supervision available.

Historically, there has been no whole-group feedback from the internship process. To pass the course, students are required to keep a reflective log book of their daily activities, and to systematically list the skills undertaken on each placement. They are specifically asked to respond to these questions:

- I was provided with appropriate supervision and guidance
- My supervisor met with me regularly
- Staff took time to explain/show me how to do things
- I was provided with the opportunity to meet the agreed learning objectives
- Staff were friendly and made me feel comfortable
- My questions were answered in ways that made sense
- If I had a problem or concern, I could talk to someone about it and resolve it
- I was given ongoing, helpful feedback
- The placement was relevant to my studies
- I have a better understanding of the industry as a result of the placement
- I learned new skills on the placement
- My studies properly prepared me for the placement
- I would recommend this placement to future students
- Please list the 5 main activities undertaken while on placement
- List five of the MOST interesting/valuable/surprising aspects of the placement
- List five of the LEAST interesting/valuable/surprising aspects of the placement
- List five new things that you learned during the placement
- How valuable did you find the placement experience for preparing you for the workplace?

The timing of semesters, and the availability of internships, has meant that students attend internships at different times over the space of eight months. This means there has not traditionally been a time for a whole group meeting to allow peer-to-peer learning.

To encourage students to take time away from their internships to attend a Listening Circle, more than 100 specially-designed University t-shirts were created to give to participants. The meeting times in 2017 were made to ensure attendance availability of students. However, most students decided to attend an internship rather than to attend a Listening Circle. In 2018 the Listening Circles were officially included in the class schedule as optional events. This change increased participation, particularly for students who self-

nominated as needing or wanting more support. This was in line with the student feedback forms from the 2017 experience in which less confident students said they wanted more face-to-face support during their internships.

Particular purpose

There is a small but growing body of scholarly literature about journalism internships and the student learning experience during curriculum-based work integrated learning. Bowman and Lund (2007) were among the first to write about the challenges and benefits of students working alongside industry professionals. They concluded there was still much to be gained from more formal evaluations of student learning through internship courses. Forde and Meadows (2011) have also documented the value of work integrated learning for journalists focusing particularly on the value of "peer reflective sessions".

It is clear that internships and work integrated learning projects are a vital part of a journalism student's education. With excellent supervision and mentoring (McHugh, 2017), internships can provide a rich learning environment for students. They are often seen as an audition for a job in a hotly contested work environment. Journalists who impress during their internship will make vital contacts to help them find a way into the industry and significantly to create quality work for their portfolios to show potential future employers.

This need to impress during their internships can have an impact on the way journalism students report upon their experiences, in so far as they may not wish to formally record some of the tougher, or perhaps more negative, experiences from their internships. As a result, it was proposed for this project that using a learning circles model for post practicum discussion could be useful. Learning circles were already accepted as useful by medical professionals, and it was posited that journalism students would see them as an "informal, cooperative way of learning that is based on natural patterns of human interaction" (MacGregor, 1993).

Learning circles are designed to bring together diverse groups of people who have a unique take on a situation or issue, as is the case with journalism students working in a wide variety of roles during their internships. A learning circle can "serve as an opportunity to develop new relationships, share ideas and experiences, and brainstorm new solutions" (Dyck & Sommers, 2012). The defining characteristic of a learning circle is a joint interest in the subject being discussed. There is no one way to correctly run a learning circle, however it is generally understood that a facilitator will help guide the group through any discussion.

The goal of the journalism Listening Circles was to improve the students' reflection upon their internship experiences in an informal environment. Importantly, a "cone of silence" was imposed on the discussions. Students were told that under our "cone of silence" they could talk openly about what had occurred during their internships. Significantly they agreed that they were free to learn from the information discussed, and to use it to improve their own performance on subsequent internships, they were not to refer to the information or identify the people who spoke or the media organisation discussed.

A primary goal of the Listening Circles was to give students an iterative learning experience. One of the significant issues for internships with journalism students is that because they run in holiday periods and before and after the teaching year begins, there is generally not a formal opportunity to include an end-of-semester group reflective practice process. It was hoped that by using the Listening Circles students would be able to reflect and learn about their experiences as they completed their internships.

A secondary goal of the Listening Circles was to share information and learning between students. It was hoped that students who followed each other into an internship with the same employer would be able to share information and skills ahead of their placements. It was also hope

that students doing vastly different internships would be able to share their experiences. For example, students who were predominantly working with social media would be able to share those skills with students who were working with video editing and vice versa.

The third goal of the Listening Circles was to provide greater support for students while on internships from both their peers and from the teaching and work integrated learning staff. it was hoped that issues that were arising while on internships could be workshopped in a non-judgmental and caring manner by staff and students for interns to take back into the workplace.

Enacted post-practicum interventions

A total of six Listening Circles was organised. Three in 2017 and three in 2018.

Date	Number of Students
22 May 2017	5
26 May 2017	3
22 September 2017	5
5 March 2018	5
30 April 2018	7
21 May 2018	TBC

Each Listening Circle was an hour-long volunteer activity in which those students who had signed up to attend were given time to share an experience and/or a particular learning point from their internships. As the numbers in attendance were low for each of the Listening Circles only one group was formed. It had been hoped that a number of circles could be formed at each meeting, but the numbers did not justify this.

Although the students were aware that the sessions were being recorded for research purposes, they were told that the discussion was done according to a “cone of silence”. This is a technique well-used by journalists, and student journalists, who must become used to being told information that they cannot directly share or attribute.

Students were given a sheet of Do and Don’t questions (adapted from Harrison) to be used as prompts for discussion. The original plan was for the group to lead their own discussions, however the small size of the gatherings allowed the discussion to be facilitated by Dr Alex Wake with input at relevant times from administrative assistant and former recruitment officer Kristy Moore. This was a decision influenced by resource availability rather than the maturity of the students, or the potential for some educational benefit from student-led discussion.

Do:
Ensure everyone has an opportunity to contribute.
Share something with the group:
• A story
• Something you were taught
• A mistake
• What kind work did journalists do at your placement (features, broadcast)
• Something that surprised, pleased or disappointed you
• Summarise a common problem at your work placement
• Describe something that you did the first time
• A challenging situation
• What kind of journalist do you want to become?
• Was there an ethical issue that arose.

Don’t:
Share misinformation
Pool misery – try to be constructive as a group

The discussion was designed to be open-ended. Each student was given an opportunity to speak on whatever issue then wanted to raise, and other students were encouraged to respond or to further engage with the issue. The small size of the groups allowed each student to have adequate time to raise issues of concern and to respond to issues as they wished. At the end of each Listening Circle the students were surveyed by the work integrated learning officer about the process and its value.

Data gathered and analysed

The initial plan was to use the survey adapted from Harrison with journalism students at the completion of each Listening Circle. While the surveys were administered to each group, the numbers were small and not all filled in the forms. The students were asked:

- What did you like about the LC activity? And why?
- What didn't you like about the LC activity? And why?
- Based on your experience, how could this activity be improved?
- Did the LC change anything you did with your work? If so, please explain.
- Did the LC influence your learning behaviours in any way? (e.g. paying attention to particular things in the newsroom, reading up on things before or after a session etc). If so, please explain.
- What type of discussions did you find most useful?
- Can you identify which topic of discussion was the most useful for you? And why?
- How would you prefer the small group discussions to be facilitated?
- Is there anything else you would like to add about your experience of the LC activity?

Future discourse analysis is planned for transcripts of the de-identified one-hour sessions, with the students' words thematically grouped into:

- The nature of the information shared.
- Preferred topics of discussion.
- Learning behaviours.
- Preparation of students (soft and hard skills).
- Suggestions for future preparation of students (soft and hard skills).
- Difference of views between levels of students (Bachelor or Graduate Diploma).
- Student responses to difficult work situations.
- Usefulness of specific internships.
- Problems with specific internships.
- How students spoke about internships (language used).

Key findings

The Listening Circles were overwhelmingly considered valuable by students in both the Bachelor of Communication (Journalism) and the Graduate Diploma of Journalism. They responded that the Listening Circles were interesting, worthwhile, and where it was appropriate they reported that they could incorporate some of the learnings/strategies from the discussions into their future internship work. Students overwhelmingly wanted the process moderated by an academic or facilitator. In the open-ended question at the end of the survey, one noted that it was "Informative. Interesting to compare experiences" and "a great experience" and several that they'd like to have attended more sessions.

What did you like about the LC activity and why?	What didn't you like about the LC activity and why?	Based on your experience, how could this activity be improved?
Getting to share internship experiences / feedback with others.	The crowd was a bit small which made what we could get out of it limited.	Making it a compulsory event so that you have to attend once every three weeks would improve attendance.
It made me feel supported by RMIT because peers and staff understood any concerns and offered advice or similar stories.	I was concerned that as I've only just begun my internship, I might not have that much to offer but it was still good to give feedback. Would like to know if it could be implemented.	It would be good to know where your feedback is going.
Hearing others' positive and negative experiences. Challenges in different work environments and food.		
Listening to everyone's experiences.		More structured questions.
A comfortable setting, informative.		More of them. This is the only one I can make with internships.
I liked getting some insight into other people's experiences, and seeing any similarities.	There wasn't much discussion about how to deal with negative experiences - but also, that's because we've had solid experiences so far.	
Small group, change to exchange thoughts.		
I liked that we could debrief in a safe space.	It was very short. I would have liked to have kept chatting.	
Hearing about other's experiences and understanding everywhere has been challenging.	It was interesting.	
Loved the open forum setup. Freedom to chat about any and all experiences was great.	n/a It may be difficult with a much bigger group though.	Probably cap the session at 10 people. You need to run more if demand is high.
An environment where students can debrief and talk about the good and bad experiences of their internships.		

Although it is difficult to tell from the survey results, there were distinct differences between the groups. The students who attended the Listening Circles in 2017 predominately used the discussion to raise grievances with particular placements and processes, more than to share tips and skills about the workplace skills for other interns. However, students in 2018 found that the Listening Circles, which were built into their learning schedule time, provided ongoing support for internships they were still undertaking.

Did the learning circles change anything you did with your work? If so, please explain.	Did the learning circles influence your learning behaviours in any way?	What type of discussions did you find most useful?	Can you identify which topic of discussion was the most useful for you? And why?

Found a group partner due to the small number of people attending		Hearing other students' experiences	Problems other students faced
	Some of the solutions I offered weren't applicable to others.	The topics of how to do. So how to obtain a job after university.	Not to take too long of a break post-uni to start applying for jobs, because it's a real-world issue to be addressed.
	Made me adopt a more confident approach.	Who to talk to if you need support with the internship.	Who to talk to if you need support with the internship.
Feel a bit more prepared entering internship - what to expect eg stressed supervisors		What challenged people in workplaces.	
		How to deal with difficult work structures.	
More confident to apply for jobs.	Getting experience across different mediums	How we overcome challenges /obstacles	How to work independently. See behind the scenes of a news outlet.
It has just demonstrated that I should work on my skills through extra curricula further, to enhance my confidence.		Learning about how different organisations run their newsrooms.	Hearing about how other people settled in during the first few days.
		How others handled the challenges.	Problems the other students faced.
It reassures me that we're all in the same boat and there's always people to talk to.	Not yet.	Candid discussion about unique experiences both positive and negative.	It's helping to build my knowledge and understanding of the industry and people. Builds empathy etc.
I got some new tips and tricks I could take to my upcoming internships.			Things to do when there is a lull in the newsroom because I have experienced it in the past.

Survey group data revealed that students' most preferred topics were discussing ways of handling challenging people and stressed supervisors. Students commented that the Listening Circle activity impacted positively on aspects of their learning behaviours.

However, as Harrison et al found, it only took one student to dampen the enthusiasm for the rest, and one of the 2017 sessions was best described as "pooling misery". The lesson for facilitators is to try to steer the conversation back to the discussion points.

Discussion

The responses from the student surveys clearly show that Listening Circles are a useful pedagogical tool for improving learning for journalism students during and post the internship process. However, there are key issues which need to be addressed to ensure that they work successfully in other settings.

Firstly, a key to the success of the Listening Circles was their incorporation into the teaching schedule. Students require both time and space to attend, and were disappointed when they could not do so. By setting the meetings at the same time and place to formal classes (on alternative weeks), students could plan to maximise their attendance. Using incentives such as free food and t-shirts were useful in encouraging attendance for some cohorts. However, interest in the circles grew in 2018 as students talked among themselves about the value of debriefing about their experiences. A number of students who were not able to attend the session because of their scheduled internships formally asked for more sessions to be held.

Secondly, academic staff and/or the facilitators need to ensure that the purpose of the sessions, the role and processes are clear to ensure that students feel they can safely share mistakes and experiences with peers. Emphasising confidentiality is important. A "cone of silence" is possible when there is a clear person in authority emphasising this requirement in the room, but this is not necessarily enough. A sense of camaraderie within the cohort is also a useful way of ensuring that students maintain the confidentiality of the process. A sense of safety can also come from the students understanding that the discussion is not assessed, so there is no danger in losing marks from sharing a mistake with their peers, lecturers and other staff.

There is a third issue for competitive industries such as journalism, in that some students may fear that sharing information could give their peers an added advantage if they undertook an internship at the same organisation at a later date. While this fear may be well- founded, there was no evidence during the circles that students were holding back in their discussions for fear of advantaging others. There was some concern that more confident students might overshadow the less confident ones, however this was not witnessed in the Listening Circles held. In fact, it was beneficial for the less confident students to hear that others had had similar issues, or to get advice about how to appear more confident in the work place.

With the current disruption to the journalism industry, and increasing numbers of young people working in smaller newsrooms or as freelancers, there could be value in instigating a process of Listening Circles into their regular work routines. Just as doctors regularly have lunch together to discuss cases, there could be great value in journalists doing the same. It is hoped that the lessons of the Listening Circles provide a framework for students to carry into their working careers, and perhaps create a new attitude to learning in the future.

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Attachments from evaluator

Attachment 1: Advice from Round 1 Project Leaders to Round 2 Project Leaders

Summary of Advice from Stage One Participants to Future Project Leaders:
There were 10 responses from different projects that have been synthesised to provide the following advice:

1. **Grasp and Value the Opportunity**. The overall message throughout the responses was that engagement in this project with the benefit of Stephen Billett's expertise in the field, his style of providing support and guidance, and the accompanying resources is a **significant opportunity to be embraced** wholeheartedly. In particular, they recommend use of the 2-day conference to get started and then to stay linked to the bigger project over time.
2. **Selecting the Right Project**. The importance of **selection of the project** is underscored and deserves careful, focused consideration. They recommend having the big picture in mind as you develop your ideas, as well as to focus on issues that are of current concern and especially relevant to the students. Base the final choice on early consultation with end-users, and build on the work of others where appropriate. Finally, they underscored the importance of ensuring that the project is doable within the limits of the time frame and the resources available.
3. **Selection of the Team. Team selection** is important, including choosing people who will be active and engaged participants who will meet deadlines, and ensuring stakeholders are included such as students and other end-users being consulted and engaged from the outset.
4. **Planning**. **Planning and goal setting**, involving time frames, meeting deadlines, and clear division of labour amongst the project team is important for successful achievement of the project. Furthermore, it is important to ensure that the initial workshop time is used wisely to clarify and scope the project.
5. **Communication**. Remaining in **communicative contact** with the **project leaders and participants** is important. This includes ensuring Stephen and Melissa are aware of any issues that arise. In addition, it was emphasised that communicating and collaborating with similar projects was also helpful.
6. **Early Evaluation Planning**. **Evaluation design and processes** need to be planned from the outset so that information can be collected that can be used to ascertain the effectiveness of the intervention. This may also involve ethics clearance that can take time, so early attention is important. It was also advocated to look to similar projects in the design of the evaluation so that some cross project comparisons could be made.

Attachment 2: Survey of Round 1 Project Leaders

Engagement in the project

Q 1: Motivation for Engaging in the Project

The project leaders were asked to identify what had motivated them to engage in the OLT project. The following is a synthesis of the responses.

1. My Role:
    - It is a part of my role to assist in transitioning students to the profession through work integrated learning, so I took the lead role.

2. Improvement and Innovation in Education:
    - Desire to evaluate the effect of curriculum changes.
    - Opportunity to expand current program of work and collaborate.
    - Increased competition in the new graduate market made it imperative that we gave our students every opportunity to become employed at the end of their studies.
    - The opportunity to explore and be supported in exploring a specific aspect of post-practicum briefing (and student experiences).
    - To make (our university) graduates more employable.

3. The Chance to Undertake Research
    - The attraction for being involved was that I have undertaken research and teaching projects in this area and that I have the skills to be able to recruit various disciplines in my school to undertake work/research in this area

4. Invitation from, and opportunity to work with, Stephen Billett.
    - Originally an agreement was provided by my Head of School to support the project.
    - I have worked with Stephen previously and always enjoy and learn from his collegiality
    - I was invited by Stephen to be a CI on this project.
    - An invitation from Stephen, who is an esteemed colleague. It also aligned with an area of professional interest.

Q2: Have your expectation been fulfilled?

Seven of the ten responded in the affirmative. The remaining three responses provided a qualified yes. The following qualitative comments were also provided.

1. Affirmative:
    - Yes. Four disciplines have studies which are part of this project
    - Yes - have been able to explore this and have some outputs as well as some interesting and informative data
    - Yes. The provision of resources to all the review of the curriculum changes have been instrumental.
    - Yes. I wasn't sure what to expect but we have had flexibility to create a project that best suited our needs, the funding was provided in a smooth fashion without many concerns and the support from Stephen has always been timely and helpful.
    - Yes. I have been impressed with project organisation and enjoyed the engagement with health educators from across the country. This is a wonderful opportunity to be challenged about my ideas and learn from others

2. Qualified Yes:

- To a degree
- Moderately.
- Really too early to say, I'm looking forward to the Feb conference to hear of the other projects.

The Dialogue Forum February 2016.

Three of the ten survey respondents were not at the Dialogue Forum either because they could not due to other commitments or because they did not join the project until after the Forum. The following are the qualitative comments from those who attended.

In what ways did the Dialogue Forum assist you to:

Q 3: Understand your role and contributions to the overall program?

- It provided an overview of the large project and the contributions of the smaller scale projects.
- It provided me with some ideas to improve the project and made me aware of the other strategies being employed. The diversity initially made it difficult to understand how it would integrate for the broader project aims but we have successfully implemented our project with good outcomes
- My role in conducting a local project is clear. Our team has been invited to contribute to the Feb 2017 meeting.
- Very good - it was excellent to have face to face time with other collaborators and hear of the different projects - it is different than just reading them in an abstract
- Helped me to more clearly define what our project would 'look like' & some similarities/synergies with other projects
- Only somewhat, as I had a pretty clear understanding of the project and its goals.

Q 4: Advance your own project with confidence

- It provided a forum for peer-review.
- With the insight of a few participants it assisted the project but overall it didn't have a major impact on advancing our project as we had a clear idea and plan by the time of the forum.
- I feel confident and competent to conduct the project. Professor Billett's advice, particularly on innovative approaches to data collection and analysis has been valued.
- Very good - the networking and collegiate conversations have contributed to the development of my project.
- Group discussions were helpful - both in our own project group but across group discussions helped.
- Only a little, because my project is substantially different from the others and was already well developed at this point.

Q5: **Engage with other in the overall program team who are engaged in similar or related activities?**

- Resulted in the addition of outcome measures and cross program evaluation.
- I haven't really engaged with others outcries the forum as I primarily focused on our project and time for broader collaboration was not available for myself
- It has been a good team, willing to take responsibility for aspects of the project.

- Very good - the networking and collegiate conversations have contributed to the development of my project - whilst i have not kept close links with others - i know they are available when/should I need them
- Face-to-face was extremely helpful and allowed for close engagement and discussion. The dedicated time was invaluable.
- It was certainly a well-run and interesting collegial exchange.

Q6: **Prepare you for the task you've undertaken across 2016?**

- Provided structure and timelines.
- It provided some beneficial ideas but our project team had a clear idea by the time the forum was attended
- Good - it helped clarify and focus the project
- Provided a motivation and way forward. Kick started project meetings etc.

Support from Stephen Billett.

Q 7: In what ways has Stephen Billett assisted you with your roles and work within the overall teaching program?

- Responded to emails frequently. Sounding board for publications, dissemination etc.
- Stephen has always assisted with the development of the project methodology and helping to make sure it meets the broad project aims. This has been vital at key points and feedback was always timely
- Stephen provided an overview via project lead
- He has met with us and provided email guidance on what we might do, how we might do it and how we might report it.
- Stephen is always willing and available to discuss the project and associated activities. I usually feel satisfied following interactions with Stephen about the project.
- Stephen has been available on a number of occasions either via teleconference or via email to support the group - he's been extremely helpful and is very encouraging even when we feel we are making the tiniest of progress.
- 1) distribution of funds. This enabled the 4 studies in my school to be supported to do this work. I was able to ensure that all involved staff had access to correct cost codes etc. 2) feedback with respect to studies 3) assistance with dissemination of planned studies and results.
- His wise and gentle guidance has always been appreciated.

Q 8: **In what ways has Stephen Billett assisted you in developing your project**

- Discussed overall project, peer-reviewed proposal.
- Reviewing methodology
- He has met with us and provided email guidance on what we might do, how we might do it and how we might report it.
- Professor Billett met with me and provided feedback on my earlier ideas.
- Stephen is always willing and available to discuss the project and associated activities. He has provided feedback on presentations, abstracts, ethics applications and interview questions. He is a good critical friend, with a wealth of expertise on pedagogy and educational activities.

- He provided 1) feedback with respect to studies 2) assistance with dissemination of planned studies and results
- I valued his collegial and supportive comments as the project was developed.

Q 9: Suggestions for Stephen to consider in supporting the next group of projects?

- Provide links to research in similar fields
- Foster small working groups of like projects.
- Perhaps quarterly updates on all projects
- It would be good to follow our students over the first 2-3 years of their graduate work to understand how their studies may have compared with their employment needs
- Continue to be available for formal and informal discussions
- Not sure I'm afraid. Will have a better idea after the 2 day Feb conference/showcase.

Q.10 **Key factors that assisted the enactment of the projects.**

1. **Regular reporting:** Being required to engage in **regular reporting.** It also was noted the value of regular team meetings to discuss progress against the timeline.
2. **Funding:** The most consistent response was the **funding** was critical.
3. **Support and advice**: Being able to get expert advice when needed and in particular Stephen's clear leadership and direction added to by on-going project support from Melissa. In addition support from AHS and the Head of School was noted as significant in success.
4. **Student Engagement:** Willingness of students to volunteer to participate
5. **Team work.** This aspect was highly underscored. Being part of an actively contributing team was highly valued in the responses including the recognition of the willingness to **collaborate and work together** and the evident enthusiasm and belief in the value of the work from the team. In particular, mention was made regarding the **inclusion of clinical and academic teams** in project development and delivery. Another factor was that there was recognition that the individuals at the coal-face should be given the opportunity to gain publications outputs (not just the CIs).
6. **The Bigger Community of Practice**: A factor raised was the value of the presence of a larger **community of practice** of similar people coming together to develop similar projects which grew from being a part of the bigger collegial environment created by the February 2016 workshop.
7. **Concern for Quality Student Learning**. The presence of a strong motivation and desire to maximize students' learning in a meaningful ways was a significant factor in successfully enacting the project.

Q. 11**: Key factors that have inhibited the enactment of the project?**

1. **Time:** This concern included finding time for the project especially when it competed with the work demands of the primary employment. In addition it was felt that there was a relatively short time frame to enact the project.
2. **Recruiting:** Complexities of the clinical environment for recruiting and conducting the intervention.
3. **Managing and Overseeing Projects:** This included managing the input of busy team members who had varying levels of engagement with the project.
4. **None**: Many reported that they had experienced no constraints.