Transitioning from Nursing Student to successful Graduate Registered Nurse

by

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DEFINITION OF KEY TERMS

**Clinical Placement/Practicum** - a component of a nursing education program that provides students with opportunities to marry theoretical knowledge with practical application and develop the required clinical competencies through the care of patients/clients (Report on the Inquiry into Nursing - The Patient Profession: Time for Action 2004).

**Competence** - the combination of skills, knowledge, attitudes, values, and abilities that underpin effective and/or superior performance in a profession/occupational area (Australian Nursing and Midwifery Accreditation Council 2014).

**Competency** - the description of the knowledge, skills, experience, and attributes necessary to effectively carry out a defined function (Anema & McCoy 2010, p. 6).

**Criteria** - the actions and behaviours of the RN that demonstrate the standards for practice (NMBA 2016).

**Mentorship** - a relationship between an experienced nurse and a less experienced nurse whereby the experienced nurse may provide advice and/or assistance which is likely to be career-oriented rather than clinically-oriented. Mentorship is usually longer-term than preceptorship (Report on the Inquiry into Nursing - The Patient Profession: Time for Action 2004, p. 210).

**Graduate Nurse** (also referred to as new graduate or new graduate registered nurse) - a person who has completed a preregistration nursing program; has met Australian nursing registration requirements; and is in their first 12 months of full-time (or equivalent) clinical practice (Australian Nursing and Midwifery Accreditation Council, 2014).

**Planfulness** - consists of three inter-related facets that map onto the broad cognitive strategies that self-regulation research shows to be reliably associated with ‘improved goal outcomes in experimental settings: temporal orientation (TO) to the future implications of present behaviour, mental flexibility (MF) in contextualising one’s actions in terms of one’s goals, and cognitive strategies (CS) to anticipate and deal with potential obstacles’ (Ludwig et al. 2018, p. 2).

**Preceptor** - the preceptor is a role model with a responsibility to inspire students to develop clinical skills and appreciate the value of nursing practice (Hilli et al. 2014, p. 1420).

**Preceptorship** - a particular teaching/learning method in which an experienced nurse provides direct guidance to a beginning or less experienced nurse. Preceptors are expected to be competent clinicians and are required to be role models. The preceptor role is clinically-oriented, shorter-term rather than longer-term, and linked to particular learning goals or a particular period of
Registered Nurse - a person who has completed the prescribed education preparation, demonstrates competence to practise, and is registered under the Health Practitioner Regulation National Law as a RN in Australia (NMBA 2016).

Standards for Practice - are the expectations of RN practice. They inform the education standards for RNs; the regulation of nurses and determination of the nurse’s capability for practice; and guide consumers, employers, and other stakeholders on what to reasonably expect from a RN regardless of the area of nursing practice or years of nursing experience (NMBA 2016).

Supervision - includes managerial supervision, professional supervision, and clinically-focused supervision (NMBA 2016).

Transition to professional practice program (also referred to as a TPPP, graduate nurse program, GNP or transition program) - the stated aim of a transition program is to provide a safe and positive environment with a range of supporting resources that assists graduates to develop skills and confidence in their professional roles as part of a high-quality and sustainable workforce. Transition programs are referred to by many different names in the international literature, such as graduate programs, transition programs, internships, orientation programs and residency programs. There is considerable variation in program content and program length, with the majority of programs 12-months long but varying in length from 6 weeks to 18 months (Masso et al. 2019, p. 28).

NB. Please note that the term competency was removed from the registered nurse standards for practice due to confusion with the term 'competency based assesment' in vocational education and training, and the use of the term 'competency' in other settings (NMBA 2019). As this is a recent development, the term 'competency' may be present in the published documents presented for this PhD by prior publication.
DECLARATION OF AUTHORSHIP

I certify that this thesis does not incorporate without acknowledgment any material previously submitted for a degree or diploma in any university; and that to the best of my knowledge and belief it does not contain any material previously published or written by another person except where due reference is made in the text.

I give consent to this copy of my thesis when deposited in the University Library, being made available for loan and photocopying, subject to the provisions of the Copyright Act 1968.

The author acknowledges that the copyright of published works contained within this thesis resides with the copyright holders (non-open access publications).

PEER REVIEW

All publications presented for this PhD by prior publication have been already peer-reviewed and approved by the editors of the journals according to their publication standards and the standards of the discipline wherein they are published.

DECLARATION OF ETHICS

Ethics clearance was either not needed or is declared in every publication submitted for this thesis.
ABSTRACT

On a yearly basis, thousands of students successfully complete their nursing degree and are eligible to register with the Nursing and Midwifery Board of Australia. Entry into practice is primarily via health services who offer employment via graduate transition programs in the form of one year fixed-term contracts. Transition programs and the graduate nurse have been the subject of research over a number of decades. The research focus has been on the nature of the support provided and the lived experience of the graduate nurse. The purpose of this study was to generate further knowledge and theory about graduate nurses in transition, and to investigate how nursing students successfully transition to become graduate nurses.

This study reaffirms the failure of education institutions and health care organisations to effectively support the passage of graduate nurses in their transition from student to professional registered nurse. An integrative review, a critical review of the literature, a literature review, and two grounded theory studies were undertaken to explore the spectrum of factors and perceptions that have an impact on graduate nurses and their passage to competent professional nurse in Australia from the perspectives of the graduates and the published research.

The findings of my research have revealed that graduate nurses are succeeding, not as previously assumed due to the transition programs provided, but from other factors which are filling the gaps. The reliance on transition programs is fraught with problems, because it is customary for graduate nurses to initiate their own support, engage in self-care, and action self-advocacy strategies. This has prompted the development of a new model which uniquely advocates a self-support framework for the purpose of preparing nursing students to successfully navigate their transition year. This unique theoretical construction reconceptualises both the nature of the transitional support provided to graduate nurses, and university preparation for practice. Recommendations include development of curricula by universities to ensure that nursing students are prepared with the essential self-support skills to successfully transition to being a professional nurse.
ACKNOWLEDGEMENTS

(In memory of my mother who inspired my career in nursing and my sister Wendy, a very caring nurse)

I would like to acknowledge a number of valuable contributors to my academic success with the publication of the manuscripts submitted for inclusion in this thesis. Firstly, I was located in the Riverland, South Australia and gained valuable support from Associate Professor Linda Starr and Professor Jennene Greenhill (Director of the Flinders University Rural Clinical School). Professor Greenhill introduced me to the field of research and provided guidance with regard to initial publication and scholarship. Professor Greenhill also introduced me to Lucy Atkinson. Ms Atkinson, whom I thank as a research assistant, provided a valuable service with regard to accessing informants, assisting me with interviews and providing support with the data collection process. Over this time, I also had connection with Associate Professor David Gillham who was located at the Flinders University campus in Bedford Park, Adelaide.

With the passage of time, I transferred to the Bedford Park campus. Associate Professor Gillham continued to provide support in a number of ways, including the provision of ongoing feedback on my publications, and access to writing workshop intensives located in an inspirational location on the Fleurieu Peninsula. He also liaised with research consultant Dr. Carolyn Gregoric on my behalf. As a consequence, I thank Dr. Gregoric sincerely for her valuable contribution, and for enthusiastically co-authoring four of the five publications presented for this thesis.

Thank you to the graduate program coordinators of the health services included in this study, and most importantly, the graduate nurses who consented to be part of the studies to make this thesis possible.

Thank you also to Flinders University for providing me with the opportunity of being topic coordinator to develop a new Nursing Topic NURS3006 based primarily on my research, i.e., “Transition to Professional Practice 3”. It was very rewarding to translate my research into practice and to gain such positive feedback from the students. I also need to acknowledge the establishment grant provided by Flinders University to substantially facilitate my research.

Thank you to my principal supervisor, Dr. Anita Debellis for your ongoing encouragement. Your valuable advice, guidance, insights, and critical feedback have been very much appreciated. Thank you also to Dr. Amanda Muller for providing invaluable critique, advice, and encouragement in your role as second supervisor. Thank you both sincerely for always being present and available.

Finally, to my wife Eva, I say thank you for your ongoing patience and encouragement while I endeavoured to complete this thesis. Your support has been truly appreciated.

x
PREFACE

This thesis is focused on the phenomenon of transition and is the culmination of over 40 years of nursing experience as a practicing nurse and nurse teacher. To convey the nature of transition and my emergent understandings of transition, I considered a number of metaphors and analogies. The first analogy I explored was “The Little Prince” by Antoine De Saint-Exupéry. Poignant life lessons were featured by an insightful fox who taught the little prince how to tame him, exemplified as “one sees clearly only with the heart. What is essential is invisible to the eye.” Apart from “The Little Prince”, I explored a broad spectrum of fairy tales, and while many were analogous to the emotional journey of graduate nurses, none were more compelling than the fable of Cinderella.

As a beginning student nurse, I was subjected to severe harassment from a “ward sister” and a number of “ugly step sisters”. The abuse was continuous and unrelenting for the first couple of months. While it was distressing, as a rhetorical Cinderella, I persevered due to stubbornness, not wanting to fail, and the need to provide some financial relief for my family. At that time, I was 18 years of age, my father had abandoned us some 6 years prior, my distressed mother was unwell, and I had five younger siblings.

When I graduated as a registered nurse in 1975, I was struck by the gap which existed between the role of the student and that of the registered nurse. In particular, I noticed the hierarchy of the old order and did not want to be part of it. Instead of following in the footsteps of others and becoming a bully to the new students, I felt motivated to provide the support and encouragement that I had found to be lacking. I reconceptualised the roles and became a student advocate and nurse teacher. Being a male was unusual for the times, as there were so few of us. I have experienced periods of “protectionism” where active discouragement of males has occurred with regard to career progression, and also periods of encouragement. It has been very fickle.

I have also found that there are rewards in being willing to go where others are not prepared to. As such, I have found that relocation to rural areas at strategic times has been extremely beneficial. The rural experience provides a broad understanding of community need and a helicopter view of health and education services. I was able to experience many different roles, including that of supporting graduate nurses. It was during one such occasion 15 years ago, that the nature of adversity experienced by graduate nurses during transition resurfaced, prompting my foray into researching this phenomenon.

My research was motivated by concerns of patient safety in the first instance, as I believed that if I could provide evidence that harm was occurring due to lack of supervision, then change would occur. This was found to be a naïve expectation and, as a consequence, led me to focus my
research on those areas which can be changed, i.e., the empowerment of graduate nurses to mitigate the health care culture through self-support. While not all nurses are female, the analogy of Cinderella is one of empowerment, and is gender neutral and irresistible. As a consequence, the principles Cinderella used to overcome adversity will be carefully woven into the narrative of this thesis.
STRUCTURE OF THE THESIS

This thesis is submitted for the award of Doctor of Philosophy by Prior Publication. As such, the format of this work reflects the unique expectations for this higher degree. The thesis begins with a chapter that conveys the background, problem statement, aim, research question, and significance of the research. In parts, the content is analogised using the rhetorical fable of Cinderella. The significance of the findings is discussed in accordance with the classical transition models of Marlene Kramer (1974), Benner (1982), and Duchscher (2008). The research methodologies underpinning each of the selected publications are discussed in detail.

The second chapter provides a contextual statement which introduces the historical context of nurse education, commencing with the first Nightingale training school in 1860. From the year 1972 and beyond, historical events are portrayed in parallel with my professional career and research progression. Also revealed in some detail are echoes of the past that are still prevalent today. Such echoes include the unwillingness to provide necessary support for graduate nurses. An alternative ideation from my prior research is explored as a new paradigm, and the following research question is proffered, ‘How do nursing students successfully transition to graduate nurse?’

The third chapter emanated from a contemporary integrative review of the spectrum of factors and perceptions that have an impact on graduate nurses and their passage to becoming a competent professional nurse in Australia. A discerning synthesis of the literature is provided. There were four major categories which emerged, mental health, undergraduate education, authentic leadership, and preceptorship. The category of mental health most starkly revealed a generalised lack of support for graduate nurses provided by health organisations. The category of undergraduate education reinforced the premise that clinical skills are often redundant, while being able to communicate effectively was postulated as a key to transcending practical realities. The findings revealed a significant gap in relation to the purposive preparation of nursing students for self-support during their transition to professional practice.

The fourth chapter contains five peer reviewed publications that are pivotal to the aims of this study. These publications explored the spectrum of factors and perceptions that have an impact on graduate nurses and their passage to becoming a competent professional nurse. An individual authorship statement is provided which details the context and background of each publication, including the role of each contributor to the underpinning research and manuscript. All the publications explore the factors that have an impact on graduate nurses. The initial publication is a story of neglect of graduate nurses, and represents the first of my research studies incorporating grounded theory. The second publication is a critical review of transition programs which further reveals a story of neglect, highlighting the intricate web of illusions portrayed as support. The third
publication, a literature review, considers the graduate nurse to be more than merely a hand-maiden, highlighting the many strategies graduate nurses use to succeed. The fourth publication provides a vehicle for preparing the nursing student for transition to practice and employs the “ways of being” model to mitigate their zone of proximal development for the purpose of self-support, which is also referenced as the “fairy godmother effect”. The fifth publication adds richness to the fairy godmother effect and explores the spectrum of comfort.

The final chapter, a discussion and conclusion, brings together the overall findings. From the research and knowledge around the transition from nursing student to successful graduate nurse, emerges a self-support model. Pivotal to this is the creation of a virtual zone of proximal development to enable nursing students to transition effectively. Included in this chapter are the implications for individual and organisational practice; implications for educational preparation at both an individual level and for the nursing curriculum; and finally, the implications for research into transition and desirable graduate qualities. Central to this is the notion of graduate nurse preparedness to perform their expected functions.
CHAPTER 1. INTRODUCTION

Chapter overview
This chapter introduces the background, research problem, study aim, research question, and significance of the research to the field of graduate nurse transition. The significance of the study is discussed in accordance with the classical transition models of Marlene Kramer (1974), Benner (1982), and Duchscher (2008). Tables and figures are included for illustrative purposes and clarification. Each of the studies are explicated with regard to the rationale for the design and research methods/methodologies chosen for each of the selected publications. Overwhelmingly, targeted intervention at the undergraduate level is advocated, emphasising the uniqueness of this inquiry and contribution.

Background
Transition is a path of initiation in which a person is required to adapt to a change in environment or circumstance. Where a nursing student undertakes the transition to becoming a registered nurse, there is a change in both environment and circumstance, i.e., from being a nursing student at university in a controlled clinical learning environment to the reality of employment as a graduate nurse in a health care setting.

“The trials and tribulations Cinderella endures are symbolic of the path of initiation, where the seeker must learn to distinguish the essential from the transitory (separating lentils from ashes) and her three successive ball gowns represent stages of enlightenment along the path” (Petscheck 2017, p. 17): An interpretation attributed to Wilkinson (1993).

Graduate nurses working in acute hospital settings are subject to “trials and tribulations” in the form of “frustration and a sense of demoralisation as a direct result of the dissonance they experience between their perception of nursing and what they find nursing to ‘really’ be” (Ostini & Bonner, 2012, p. 243). The term “reality shock” was first used by Kramer (Graf, Jacob, Twigg & Nattabi 2020) to characterise the impact on graduate nurses from the gap between nursing student and the reality of practice as a beginning registered nurse. Kramer’s research methodology involved two experimental groups of students. One group was exposed to the harsh realities of practice (Anticipatory Socialization Program ASP) and were allowed to develop role strategies to address them, while the other group did not have the ASP. Graduate nurses who had the ASP were better able to operationalise their professional values and to experience some degree of job satisfaction than the control group (Sargis, 1975). This outcome has significant implications for the mental health and retention of nurses over the long term: “The way in which a new graduate elects to resolve reality shock will influence not only how she views her first experience as a nurse but also how she will view her entire career in nursing” (Sargis, 1975).
Problem Statement

Both undergraduate educators and the purveyors of individual transition to professional programs applaud the theories of reality shock and levels of skill acquisition; however, there is a possibility that the transition of graduate nurses may be ineffective and warrant further investigation.

Aim of the study

The purpose of this study is to generate further knowledge and understanding about graduate nurses in transition. The specific aim is to explore the spectrum of factors and perceptions that have an impact on graduate nurses and their passage to competent professional nurse in Australia, from the perspectives of graduates and the published research.

Research question

How do nursing students successfully transition to graduate nurse?

Research significance

This research is significant because it contributes to a deeper understanding and awareness of a persistent problem – the reality shock experienced by graduate nurses during their transition to professional practice. Theorists, Kramer (1974), Benner (1982), and Duchscher (2018) have contributed to understanding the reality of transition to practice (Table 1 provides a brief overview).

Table 1. Three recognised transition models (realities)

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<td>Theory</td>
<td>Reality shock</td>
<td>Skills acquisition</td>
<td>Transition shock</td>
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<td>Stages</td>
<td>Honeymoon phase</td>
<td>Novice</td>
<td>Doing</td>
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<td></td>
<td>Rejection phase</td>
<td>Advanced beginner</td>
<td>Being</td>
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<td></td>
<td>Recovery phase</td>
<td>Competent</td>
<td>Knowing</td>
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<td></td>
<td>Resolution phase</td>
<td>Proficient</td>
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<td>Intervention focus</td>
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Each of these theories is unique and supported by a strong evidence base, rich description, depth of inquiry, and relevance to nursing, and have expertly informed the nursing profession as to the nature of support required by graduate nurses (Graf et al. 2020). Such understandings are extremely valuable to the graduate nurse and provide comfort when feeling out of place in a new circumstance or environment. Insight is provided into not only the feelings and lived experiences (Kramer 1974; Duchscher & Windey 2018) that are likely to transpire, but also the skill development trajectory and potential dangers of transition, i.e., the graduate nurse must learn to
A synthesis of these realities illustrates the inherent complexity of the situation, and generates additional questions, e.g., how does being an “advanced beginner” influence what graduate nurses perceive nursing to “really be”? Is “reality shock” or “transition shock” exacerbated by the stress of abandonment apparent when the graduate nurse needs assistance to set care priorities (Benner 1982) and that help is not forthcoming? Graduate nurses require a knowledge of reality shock, transition shock, and skill acquisition to monitor and contextualise their own behavioural responses and of those around them. The perspective of being informed is empowering. While it is
acknowledged that experience cannot be artificially uploaded to the graduate nurse (Benner 1982), impactful strategies to navigate the health care culture as an advanced beginner could be advocated for. Hence the research question, ‘How do nursing students successfully transition to graduate nurse?’ In point of fact, hospital culture has consistently been found to be more of a challenge for graduate nurses than the acquisition of technical skills, both currently and over many years (Kramer 1966). Mellor and Greenhill (2014) found that preceptorship, workplace orientation, provision of timely feedback, and other key clinical support strategies were often overlooked, incomplete, or not prioritised. Preceptors were rarely prepared for their roles or did not fulfill their role, little feedback on performance was provided, and the graduate nurse often had to work alone (Lea & Cruickshank 2005; Mellor & Greenhill 2014). A graduate nurse may be concerned about their progress as a nurse and be unable to obtain formal feedback. This was a significant concern identified during my personal experience as a prior transition coordinator. I recollect arranging multiple appointments for a progress interview on behalf of a graduate nurse; however, the senior nurse would consistently cancel the appointments to avoid this task (Mellor, Gregoric & Gillham 2017). This is a common problem which is frequently encountered (Mellor 2009; Parker et al. 2014). How does the graduate nurse obtain feedback in this situation? How is a solution-focused response achieved? How does the graduate nurse prepare for a progress review? What alternatives are possible? Will a change of mindset be helpful?

Mellor, Gregoric, Atkinson, and Greenhill (2017) found that internationally, there is much diversity in what is considered important for inclusion in a transition program and little consensus with regard to content. Programs were often constructed with elements that were subjectively considered to be useful or as a personal preference inclusion. Overall, there was a high risk of bias due to the self-reporting of outcomes of transition programs and an urgent need for evaluations based on rigorous research (Mellor et al. 2017). Hence, the novice professional needs to become a part of, participate in, and appreciate the modes of discourse that are integral to their new workplace. Becoming part of a new profession involves an appreciation of one’s own possible relationship with others in the workplace (Reid et al 2011, p. 36). It should be noted that while examination of the theories of transition, and the ways in which they have an impact on graduate nurses, have been regularly revisited over the years (Graf et al. 2020), the potential for intervention at the undergraduate level has not been the subject of inquiry. Preparation of nursing students for the aggregate of potentially unhelpful responses from experienced registered nurses (and other health professionals), together with brief solutions to mitigate against them would be empowering. This self-support reconceptualisation in the form of ‘ways of being’ represents the uniqueness of my research and contribution.
Figure 1: Schema of concurrent transition realities with solution-focused intervention

**Concurrent Transition Realities - First Year of RN Practice**

**Solution Focused Intervention**
Preparation of undergraduate nursing students with "Ways of being" and "Spectrum of comfort" strategies to care and advocate for themselves during their first year of practice. Based on critical research undertaken with NCRN's and their brief solutions to the transition realities they encountered.

**Kramers reality shock phases**
- Honeymoon phase – idealism, excitement & optimism.
- Shock Phase – emotional withdrawal, rejection, hostility, fatigue, illness.
- Recovery Phase – reduced anxiety, increased coping ability.
- Resolution – success OR burnout (exits nursing).

**Benner’s skill acquisition (5 levels of proficiency)**
- Novice – no experience, no discretionary judgement.
- Advanced beginner (1-2 yrs.) – Marginally acceptable performance. Has coped with enough real situations to note the recurrent meaningful situational components, called aspects. Novices and advanced beginners take in little of the situation, it is too new, too strange. They concentrate on remembering the rules they have been taught. Need help in setting priorities since they operate on general guidelines and are only beginning to perceive recurrent meaningful patterns in their clinical practice.

**Duchscher’s transition shock phases**
- Doing (1-3 months) – Initial idealism overtaken by realistic confrontation & shock. Lack of predictability. Stressed about everything.
- Being (4-9 months) – adjustment to professional identity. Advancing their thinking, Self-protective behaviors. Challenged knowledge and status quo. Less energy required to cope. Developed strategies to handle complexity.
- Knowing (9-12 months) continued development from previous stage. Fear of leaving the learner role. Begin to consider themselves professionals. More expansive. Some are discontented with their status as a nurse (exit nursing).
Research methodology/methods: Emergence of enlightenment

The five publications presented for this PhD by prior publication emerged from the use of five different methodologies (see table 3). The first publication (Mellor & Greenhill 2014) reported on a study using grounded theory method (GMT) within the rural environment, and while not immediately apparent, the first glimpses of enlightenment appeared, i.e., the need for graduate nurses to be self-supporting. It was an exciting sojourn into the world of graduate nurses who were often abandoned and left to advocate and care for themselves as the only nurse on duty for their hospital.

This prompted the second study, a critical review of transition programs (Mellor, Gregoric, Atkinson & Greenhill 2017). The study identified that many programs were not assessed using accepted research methods/methodologies and bias was the norm. The study also revealed the variable nature of transition programs, inconsistent terminology, inconsistent content, and the need for formal research to determine best practice.

The third study, an extensive literature review by Mellor, Gregoric and Gillham (2017) focused on the strategies graduate nurses use to care and advocate for themselves, and provided a valuable background to framing the questions and the potential richness of data which could be achieved from the fourth study (Mellor & Gregoric 2016). All the data were collected from graduate nurses, who were members of a formal transition to practice program, targeting the ways in which graduate nurses were able to advocate and care for themselves. Individual interviews with graduates from both country and city locations revealed the ongoing challenges they faced. Their resourcefulness was edifying and provided a valuable trove of self-support strategies or ‘ways of being’ that could be used to enlighten nursing students when preparing them for their first year of practice as a registered nurse (See Table 2).

This valuable set of data was revisited in the final study by Mellor and Gregoric (2019) with a focus on graduate nurses and the spectrum of comfort. Further self-support strategies emerged to provide valuable insights for nursing students, so they can practice safely as graduate nurses within an injurious health care culture.

Throughout the following discussion, a brief review of the methodologies underpinning each of the below studies and associated publications will be provided. They will be listed by study and publication numbers. Please refer to Table 3 when reading the narrative, and in particular, note that there were two publications emanating from Study 4.
Table 3. Research studies overview

<table>
<thead>
<tr>
<th>Aims of research studies:</th>
<th>Methodology</th>
<th>Publications which emerged</th>
<th>Authorship</th>
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<tbody>
<tr>
<td>Study 1: To explore the nature of professional support given to new graduate registered nurses in rural areas</td>
<td>Focus groups with graduate nurses from 14 rural hospitals. Grounded theory method (GTM) Glaser &amp; Strauss – (Classical GTM)</td>
<td>1. A patient safety-focused registered nurse transition to practice program</td>
<td>Mellor &amp; Greenhill (2014)</td>
</tr>
<tr>
<td>Study 3: To identify the strategies that new graduate registered nurses require to care and advocate for themselves during their first year of practice</td>
<td>Literature review method, 2001-2016 Dialectical pluralism PRISMA search strategy (Moher et al. 2009)</td>
<td>3. Strategies new graduate registered nurses require to care and advocate for themselves: A literature review</td>
<td>Mellor, Gregoric &amp; Gillham (2017)</td>
</tr>
<tr>
<td>Study 4: To identify the strategies used by graduate nurses to thrive during their first year of practice (2 publications emerged)</td>
<td>Interview with nine new graduate nurses Grounded theory method (GTM) Straus &amp; Corbin; Charmaz (Constructivist GTM with symbolic interactionist influence)</td>
<td>4. Ways of being: Preparing nursing students for transition to professional practice 5. New graduate registered nurses and the spectrum of comfort in clinical practice</td>
<td>Mellor &amp; Gregoric (2016)</td>
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</tbody>
</table>

Study 1: Publication 1

The first study undertaken (Mellor & Greenhill 2014) was based on the classical model of grounded theory method (GTM) and focused on graduate nurses in rural areas. This method embraces inductive analysis and implicit inferential analysis (abductive) guided by prescribed GTM procedures for qualitative data collection and analysis (Glaser & Strauss 1967). Verification is not the aim of GTM, so there were no preconceived codes. Characteristic of the method is the simultaneous generation of data in concert with the analysis phase (Glaser & Strauss 1967). Such reciprocity is cyclical rather than linear, and is purported to facilitate theory development throughout the process of data collection. Glaser and Strauss (1967) detailed the methods of codifying qualitative data for the purpose of generating theory. A feature of Glaser’s approach, as predicated by Strauss and Corbin (1990), was the constant comparative method which has four stages: 1) Creation of categories, 2) Integration of categories as the data collection progresses
over time, 3) Reduction of multiple categories to principles which have more general application, with theoretical saturation stated to occur when no new aspects are emerging, and 4) Development of emergent major themes and grounded theory. In summary, two analytic procedures are stated as being basic to the coding process, i.e., the making of comparisons and the asking of questions. The process of research relevant to my first publication will now be discussed taking into consideration the following essential elements.

The data for this grounded theory study was collected using focus groups. The benefits of focus groups are related to the nature of interaction and how informants may be more at ease with revealing personal information in a cordial environment (Morgan 2019). Focus groups also provide instant corroboration of the data because of the moderation which occurs through the different viewpoints expressed by participants. Opportunities to contribute were enhanced by the facilitator who enabled all informants to communicate their perspectives. Those with well-considered suppositions or thoughts were able to express their concerns. Being in a focus group hinders embellishment, as may happen in an individual interview or a survey. In a focus group, the sharing of one individual acts as a trigger for the recollections of others and supports the contribution of additional narratives. Such interactions are considered to be both joint actions and social acts that strengthen interest when participants connect well (Morgan 2019).

Saturation of the data was evident after three focus groups were completed. Field notes were taken during, and following, the focus groups to complement the data (Montgomery & Bailey 2007). The notes were also used as a prompt to revisit earlier disclosures and to elucidate more detail where possible. A brief demographics questionnaire was administered prior to the focus groups to further inform the context of the participants. It also served as an ice-breaker.

Approval was gained from the Social and Behavioural Research Ethics Committee of Flinders University, Adelaide, South Australia. Consent was granted in accordance with the requirements of the National Statement on Ethical Conduct in Human Research (2007). Written approval was also gained from the Directors of Nursing of regional health units and their individual ethics committees, as required. Respect for persons dictates that researchers must work to protect research participants’ autonomy by ensuring full awareness of the factors surrounding the study, including the potential harms and benefits (Dickert 2009). In this study, the focus group participants were furnished with a letter of introduction confirming approval from the university and the ethics committee. Focus group questions and a confidentiality agreement to be signed were also included. The participants were given a minimum of 14 days to consult with others about their decision to be part of the study. They were informed that the onus was on each participant to maintain confidentiality, and that they could decline to answer any question/withdraw at any time. Consent was also given to record the focus group. Advice with regard to restricted disclosure of information to preserve the participants’ anonymity, inclusive of pseudonyms to protect their
identity, was also provided (Dickert 2009). The focus groups were conducted in a location away from their workplace and free of distraction. As a facilitator, I commenced the focus group with an activity to break the ice in order to introduce ourselves and the participants (Morgan 2019). A list of ground rules was proffered to encourage the participants to be respectful and effective group members (Morgan 2019). Over-disclosure may affect a group member emotionally; therefore, as a facilitator, I adjudicated the contributions of each participant and continuously monitored the stress levels of the group members (Morgan 2019). The overall goal was to avoid any harm, risk, or wrong being imposed on the persons being studied (Taylor et al. 2007). An offer of a debrief was provided on completion of each focus group.

As the principal researcher, the recorded focus group data were transcribed by myself from voice into text. This had the effect of providing a rich connection to the data and assisting with the subsequent analysis (Birks & Mills 2011). The transcribed data were printed following each focus group for the purpose of open coding. Coding was undertaken line-by-line to reduce preconceptions, and when combined with theoretical sensitivity, allowed the categories, or the properties of a category found to be explicit in each transcription, to open up (Walker & Myrick 2006). I had to take care that the labelling of a category accurately reflected the impact on the graduate nurse evident in their contributions (for example, the label “alone and abandoned” more accurately reflected the emotion expressed in the focus group, whereas “the only RN on the shift” was more stoic and less compelling). The outcomes were further processed using selective coding, with QSR NVivo software providing a vehicle for the attachment of transcribed text representing each code. This facility also made possible constant comparative analysis of each transcript and further development of categories and generation of concepts. By aligning concepts to each of the coded texts, the QSR NVivo software enabled the relationships to be visually displayed around core variables as a concept map. With theoretical coding, these building blocks enabled the development of meaning and the emergence of grounded theory around the nature of support given to graduate nurses in rural areas (Birks & Mills 2007). According to Glaser (1978, p. 3), there are four criteria which allow the application of theory to an observable event or phenomena, i.e., fit, understanding, generality, and control. My publication, “A patient safety focused registered nurse transition to practice program” emerged from the data (see Chapter 4), and represents the fit or reality of the graduate nurse during the first year of practice, as explicated from the diverse data sources (Mellor & Greenhill 2014). It represents the reality of practice and is understandable by both graduate nurses who were interviewed and others in the field. The theory developed is generalisable to nursing contexts internationally, with the conditions (control) in which it applies, clearly elucidated (see list of local and international citations in Appendix 4).

The rigour of qualitative research is routinely assessed in accordance with the trustworthiness criteria established by Guba and Lincoln (1989). These criteria are credibility, transferability, dependability, and confirmability. Credibility was achieved by having attentive facilitation with clear
ground rules designed to enhance the contribution of all group members. For example, focus group members were encouraged to respectfully disagree or challenge perceptions which they thought were inaccurate. Transferability was achieved through collecting and reporting data in sufficient depth, thus enabling others to assess the suitability of the recommendations for their particular context, i.e.,

These 21 participants therefore represented 14 rural hospitals over a radius of 200 km (125,000 km²). All hospitals offered acute inpatient services, had visiting specialists and provided outpatient and 24-hour emergency services. All of the hospitals represented were from rural towns with medical services provided on an “on-call” basis. Acute bed numbers ranged from 11 to 56 beds with a mode of 22 acute beds per hospital. The remoteness of the hospitals within regions was consistent with few exceptions. For some hospitals there was only one registered nurse on duty after hours, with staff “on-call” if needed (Mellor & Greenhill 2014, p. 53).

Dependability required the research methods to be described in detail, as has been provided earlier in this section. An audit trail was also provided via the QSR NVivo software for cross-checking of the coding, concepts, and categories essential to the development of this grounded theory. Confirmability was enhanced through the triangulation of the methods and sources, provided in the form of demographic quantitative data and triangulation with data sourced from three regional focus groups of graduate nurses representing 14 health services across rural South Australia.

Study 2: Publication 2

Study two was a critical review of transition to professional practice programs (Mellor, Gregoric, Atkinson & Greenhill 2017). The critical review was systematic in both conception and implementation, with a specific objective, a clear research question, and a description explicating the methods and procedures. The focus of the review was to demonstrate the usefulness of applying the Kirkpatrick Model of Evaluation (Kirkpatrick & Kirkpatrick 2006) to evaluate the effectiveness of transition to professional practice programs. A literature search of transition programs was undertaken using the PRISMA search strategy with the application of specified inclusion/exclusion criteria. Each article was rated independently for risk of bias by myself and a research associate in accordance with the instruments for assessment of risk of bias for qualitative (Law et al. 1998a) and quantitative (Law et al. 1998b) studies.

In assessing the risk of bias of studies, EPCs (Evidence-Based Practice Centres, AHRQ) should specify constructs and risks of bias specific to the content area, use at least two independent reviewers with a defined process for consensus and standards for transparency, and clearly document and justify all processes and decisions (Viswanathan, Ansari & Berkman, et al. 2012, p.19).

The same procedure (use of an independent reviewer) was followed when using the Kirkpatrick
Model of Evaluation criteria for measurement of transition program effectiveness. Where there was a difference in our individual ratings, we resolved the final score through consultation and consensus. The risk of bias and evaluation scores are provided in Chapter 4, Publication 2 (Table 3). The completed drafts were sent to all authors for moderation. Further detail of contributions and context is provided in Chapter 4, Publication 2 and the authorship statement/publication background section.

Study 3: Publication 3

Study three was a literature review (Mellor, Gregoric & Gillham 2017), and similar to study two, had a specific objective, a clear research question, and a clear description explicating the methods and procedures. The research question, ‘what are the strategies new graduate registered nurses require to care and advocate for themselves during the first year of practice?’ enabled the search to be clearly focused. An extensive survey was completed using the PRISMA search strategy (Moher et al. 2009), the results of which were entered into a detailed Excel spreadsheet for analysis. The literature revealed that such self-support strategies were present as an eclectic mix in 80 publications from 2001-2016. The use of multiple data sources represented a model of dialectical pluralism (Mellor, Gregoric & Gillham 2017, p. 5). The process of recording and categorising was extensive. For the benefit of the reader, the frequency of occurrence of each strategy was published to assist with individual interpretation and confirmability of the findings. Consequently, an overall argument was developed from the findings, together with the strengths and limitations of the literature review, and recommendations in support of further research. It has been asserted by some academics that the literature review is a methodology in itself, rather than merely a phase in a research study, as there is close alignment to scientific research (Onwuegbuzie, Leech et al. 2011).

Study 4: Publication 4

This grounded theory study was not only influenced by Strauss and Corbin, but also Charmaz, a previous student of Strauss (Birks, Hoare & Mills 2019). Charmaz (2006) asserted that researchers construct grounded theories from their own individual viewpoint or perspective, and are influenced by previous and/or current encounters with people in the field. As fortune would have it, my primary research methodology has been GTM, which according to Charmaz (2014), allows the researcher to construct a grounded theory that is more homogeneous and dependable than otherwise would be the case. While Glaser is adamant that coding should occur without preconceived concepts, Charmaz (2006) is more circumspect. She agrees that initial coding should be open-ended; however, she also appreciates that any individual participating in research will have prior conceptualisations and skills. It is also considered vitally important that the voices of the participants are preserved during synthesis of the data. This co-construction of theory forms the
integral role of the researcher, according to Charmaz (2014).

As both a researcher and practitioner, I have an extended history of working in the field of graduate nurse transition (Appendix 1). It was therefore important to acknowledge that my preconceptions could have had an impact on the filter applied to the raw data (Birks, Hoare & Mills 2019). These preconceptions could possibly have influenced the labelling of different categories and the resultant theory generation (Charmaz 2006). Coupled with this observation, I had also completed an extensive literature review, entitled ‘Strategies new graduate registered nurses require to care and advocate for themselves?’ In order to partially counter these potential confounding factors, line-by-line coding of the transcribed interviews was undertaken to limit any preconceptions.

In this second study, respect for persons and their autonomy was again attained by ensuring that the participants had full awareness of the factors surrounding the study, including the potential harms and benefits. The participants were provided with an introductory letter proving authority from the University and the Southern Adelaide Clinical Human Research Ethics Committee (SAC HREC EC00188) Project No. 337.13., the nature of the study, and a confidentiality agreement to be signed. Similar to the focus groups, the participants were provided with the opportunity to consult with others in relation to their decision to be included in the study. They also had a choice with regard to selecting a non-distracting location away from their usual place of work at a convenient time. There were nine interviews overall, with two interviews taking place by telephone and seven face-to-face. As reported in the article by Mellor and Gregoric (2016), the participants were advised that they had the right to decline to answer any questions or to stop the interview at any time. They were also made aware of the recording of the interview and how the recording would be secured. Preservation of anonymity both directly and indirectly was assured to facilitate full disclosure and to adhere to ethics requirements.

For the convenience of the participants, additional ethics approval was gained to engage an experienced research assistant. The first interview was a shared interview, with myself as the primary researcher and the research assistant, to establish the nature and tone of expectations. The research assistant was keen to hear the stories of the graduate nurses from a personal and professional perspective, as she was about to commence her own graduate nurse transition program. As a consequence, our relationship with the interviewees was fully present, contemporary, and energetic. The unique nature of our engagement valued the participants, their stories, their wellbeing, and the meanings they attributed to their experiences. Encouraging graduate nurses to reflect on the strategies they used to succeed was inspirational (Charmaz 2014).

Unlike the focus groups, the recorded data from the interviews were converted into text by a professional transcription service (with appropriate ethics approval). The transcribed data were
copied into QSR NVivo software following each focus group for the purpose of open coding. Coding was again undertaken line-by-line and when combined with theoretical sensitivity, allowed the building blocks of a grounded theory to open up. Labelling of each category had to be carefully undertaken to ensure accurate reflection of the graduate experience. Focused coding was then completed using QSR NVivo software (Charmaz 2006). After constant comparative analysis of each transcript, and further building of categories and generation of concepts/properties, the initial “ways of being” grounded theory model was constructed.

Once again, the trustworthiness criteria of credibility, transferability, dependability, and confirmability established by Guba and Lincoln (1989) was considered. Credibility was achieved by having open-ended questions to encourage sharing of the interviewees’ depth of experience (see Appendix 2 for a complete list of interview questions). Field notes and reflective memos were integral to the engagement and processing of the graduate experience (Charmaz 2014). Here is an example of a reflective memo following the interview with graduate nurse, Heather, on Thursday 26 March 2015:

Heather (Pseudonym) has a history of being a fighter and is one who has a real instinct for survival. Her take home message was that she had the capacity to see things through, however such a negative environment in the final part of her program required her to seek help. She sought this from friends and family and from the EAP (Employee Assistance Program). Essentially she had to provide her own support and needed to be able to be assertive and say what she wanted.

Transferability was achieved through collecting and reporting data in sufficient depth, thus enabling others to assess the suitability of the recommendations for their particular context, i.e., nine participants volunteered to participate from rural and metropolitan South Australia, five graduate nurses from two metropolitan hospitals, and four graduate nurses representing rural health services. All participants were in a transition program or had recently completed their program. A spreadsheet detailing the situated context of each participant is provided in Table 1 (Mellor & Gregoric 2016). Dependability was evidenced by providing detail of the research method, as has been provided earlier in this section. An audit trail was once again available via NVivo software for cross-checking of the coding, concepts, and categories essential to the development of this grounded theory. Confirmability was provided by triangulation of the demographic quantitative data with data sourced from two city health services and two rural health services across South Australia. The original aim was to interview twelve graduate nurses; however, after an extensive recruitment effort, only nine agreed to participate. Fortunately, they were sufficiently diverse, as per Table 1. After much reflection, consultation, and searching of the literature, with regard to concerns of sufficient participant numbers, it was discovered that major themes and variability reliably emerged after the sixth interview, and that after twelve interviews, saturation was almost assured (Guest, Bunce & Johnson 2006). As a consequence, it was felt that nine interviews were sufficient for the purpose of our research, as the data contained many recurring self-support strategies, and
major themes were developing which would later be called ‘ways of being’ (Mellor & Gregoric 2016).

**Study 4: Publication 5**

This publication emerged as a consequence of revisiting the data gathered for Study 2, and therefore, the detail that will be provided with regard to process will be minimal. There were a number of important reasons for revisiting the data. In the first instance, there were many challenges associated with collection of the data, so the resource was considered extremely valuable. Secondly, from a respect and integrity perspective, there was an obligation on behalf of the researchers to further advocate on behalf of graduate nurses who gave their valuable time to provide this important data. Finally, the richness and quality of the data encouraged a revisit of the interview transcripts, codes, categories, and concepts. Further scrutiny using GTM identified significant revelations in relation to graduate nurses and the spectrum of comfort in clinical practice. Early analysis revealed the concept of “comfort zone” to be considerably more complex than is ordinarily understood.

The trustworthiness criteria of credibility, transferability, dependability, and confirmability of Guba and Lincoln (1989) were addressed in the discussion of publication 4 (Mellor & Gregoric 2016); however, I will reiterate with the following observations. Firstly, rich description and the provision of detailed demographic data of participants provided transferability. Secondly, dependability was achieved by following the GTM process, as detailed previously for publication 4. In addition, an audit trail was provided via NVivo software for cross-checking of the coding, concepts, and categories essential to the development of this new grounded theory. Consequently, with a renewed theoretical sensitivity, an underpinning framework was constructed resulting in a unique conceptual model illustrative of the spectrum of comfort, as presented in publication 5.

Chapter Two provides a contextual statement to this thesis. In addition, a contextual model illustrating my background and professional involvement with regard to the transition of nursing students to graduate nurse, can be found in Appendix 1. The model is systematised chronologically and summarises my research engagement, publications, and translation of evidence into practice.
CHAPTER 2. CONTEXTUAL STATEMENT

Chapter overview

Chapter One introduced the research background, problem, study purpose, and significance of the research to the field of graduate nurse transition. Each of the studies submitted for this thesis were explicated with regard to the research method/methodologies adopted. This chapter provides a contextual statement and a brief history of nurse education, including the transfer of nurse education to the tertiary sector. The radical transformation of nursing is discussed in parallel with the researcher’s lived experience from the year 1972. Revealed is the overall context of this thesis, which includes concerns that support of graduate nurses during transition is ineffective. An alternative ideation is proposed, one which has the objective of self-support when preparing nursing students for the reality of transition to professional practice. This chapter is akin to the name Cinderella, which symbolises both fire and light, a name synonymous with radical transformation and the radiance of wisdom. The story of Cinderella aligns with the relatively recent development of nursing, from one of a handmaiden culture, to one developing maturity at least professionally for registered nurses.

Introduction and historical context: fire and light

In 1860, the first Nightingale training school opened at St Thomas Hospital, London and enrolled the initial cohort of student nurses. Student selection was based on their social status and character. Uniforms reflected the dress of Victorian servants and required them to live in a nurses home as a necessity of their contract (Nicholson 2000). Their accommodation was carefully managed to replicate that of their status within the hierarchical structure. To minimise social contact and regulate their private lives, students were subject to strict curfews and close supervision by the nurses’ home sister or matron. Visitors were also discouraged (Nicholson 2000). To further reduce the necessity for exposure to the outside world, the nurses’ home had a lecture theatre for educational purposes. Such socialisation also reinforced their obligation to submit to the authority of doctors and senior nurses. The apparent success of this strategy resulted in the concept of nurses’ homes being adopted more broadly within the United Kingdom and Australia. In the local context, the first nurses’ home in South Australia was constructed at the Royal Adelaide Hospital in 1882, and subsequently, others arose throughout the state. Such conditions for student nurses continued to flourish until the late 1960s (Nicholson 2000).

History and my beginning nursing career coalesced on 10 January 1972, when I enrolled in a hospital-based apprenticeship training program in the mid-north of South Australia. Surprisingly, I learnt that very little had changed throughout nursing education in Australia since the 1860s. Female nursing students were still selected on the basis of their social status, and were required to
live in a strictly supervised nurses’ home environment (Nicholson 2000). As a male, I was an outlier and permitted to reside in the community. In such a nursing education program, students were apprentices who undertook short blocks (4-6 weeks) of study distributed over a three year period. For the remainder of the time, student nurses were low-paid employees servicing the 24 hour needs of the hospital. This period of indentured servitude culminated in being privileged to sit a qualifying registration examination prepared by the Nurses Board of South Australia. Remuneration was far below the basic wage and student supervision was minimal, with only one registered nurse to vicariously oversee student nurses taking care of 18 to 20 patients. Care provision was dominated by the scientific management theory of Frederick Taylor (Spender & Kijne 1996, p. 139). Student nurses provided the majority of hands-on care and often supervised each other. As a consequence of their inexperience, there was highly prescriptive task assignment and little discretionary judgement permitted. Students were not to ask questions about any aspect of care, but to follow orders as per the military. The nurse was definitely not permitted to show any critical thought, but to follow the directions of those in authority, thereby depersonalising and marginalising their patients (Lagerwey 2010). Doctors were still considered to be gods, and matrons remained monastic. This experience was daunting for student nurses, including myself at the age of 16-17 years, not considered old enough to live independently outside of a nurses’ home, but considered mature enough to be nurses. For example, I recollect providing the hygiene needs for a stroke patient without any prior education of how to provide appropriate care. The person was dependent, disabled, and incontinent of bowels and bladder. He also exhibited paradoxical emotions. To the inexperienced novice, it was a confounding and traumatic experience.

While the apprenticeship model required many hours of hands-on care (learning on the job as an employee), there was still an appreciable gap between the day-to-day practice of student nurses and that of the qualified registered nurse. As a consequence, my initial interest in transition to practice stemmed originally from graduation as a nurse from the ‘apprenticeship’ model in 1975. I distinctly remember remarking to a fellow student, “we have been perfectly prepared to be a student, but not a registered nurse”. On reflection, this insight was an epiphany. I began to search for answers to questions such as “Was this experience unique to myself, or was it a phenomenon familiar to new nursing graduates as a whole?” At the time, I was unaware that Kramer (1974) had also identified the “chasm” between nurse education and the reality of practice. Simultaneously, the early 1970s found the education of nurses within the tertiary education sector to be an emerging force in Australia. Initially, there was limited community and government support for nurses to be educated in universities or advanced education; however, with fire and light, the movement continued and gradually expanded to acceptance throughout Australia.

Preparing nurses through a system in which they had full student status was deemed to have educational advantages not possible in the traditional ‘apprenticeship’ system. For example, students from early on in their education [Tertiary approach] may be involved in the total care of patients carefully selected so that their needs are able to be met at that level.
of experience, rather than [Hospital apprenticeship approach] meeting only certain needs for a large number of patients and thus becoming task rather than person-focused (Pickhaver et al. 1985, p. 1).

**Nurse Education and transition to practice: radical transformation**

In 1978, I was personally appointed to the role of nurse educator, and later in 1981, I undertook the role of Principal Nurse Educator at the Lower Northern School of Nursing (LNSN - Port Pirie). 1984 was an exciting year as in late August, I received a telegram from the Australian Nursing Federation confirming that all registered nurse education was going to be transferred nationally to the tertiary education sector by 1993 (Francis 1999, p. 87). I now had an enhanced impetus to explore transition theory and the critical interface between education and the reality of practice. My first task involved the development of a theoretical framework around the transition needs of nurses in the rural community.
The proposed transfer of nurse education to the tertiary sector became imminent in 1988, and the foreseeable implications of closing the local school of nursing encouraged me to transfer to the Modbury Hospital School of Nursing. Within the first few months of my new tenure, reports of university graduates struggling without a supported transition were being voiced throughout the nursing profession. It was at this juncture when my past informal research and curriculum development experience proved invaluable, for later that year, I assumed the newly created role of Staff Development Consultant (Graduate Nurse Programs).

Soon after my appointment, a forum was convened with the title ‘Delights and Dilemmas’ where
nurse graduates and nursing staff from Modbury and Lyell McEwin Hospitals gave personal accounts of their metropolitan transition experience. The dialogue was recorded for analysis, and the results provided further confidence in the Pickhaver, Young and Goldsworthy (1985) study, ‘They seem different somehow’. It soon became apparent that a positive organisational culture was fundamental to the successful transition of the newly graduated registered nurse (Mooney 2007). Accordingly, I developed a conceptual model known as ‘the circle of willingness’. The ‘circle of willingness’ is a cultural expectation of the organisational climate (Mellor 2009). It makes a request of all persons/sectors that interface with graduate nurses to welcome them to the organisation and contribute to their success. For example, the nurse manager must be willing to schedule preceptors to work with the novice together on the same shift (Figueroa, Bulos & Judkins-Cohn 2013). In a successful preceptorship relationship, there is a willing and shared responsibility for patient outcomes. In an unwilling environment, this scheduling and positive support does not occur. Overwhelmingly, it was identified that there were deficiencies in the organisational climate experienced by graduate nurses. Where “willingness” is absent with regard to staff support and prioritisation of resources, the outcomes for the graduate nurse is diminished (Kirkpatrick & Kirkpatrick 2006).

As a result of a positive evaluation of the Modbury Hospital Graduate Nurse Program, I was invited to present at a Nurses Board of South Australia (NBSA) open forum entitled, ‘The future of the novice graduate nurse in South Australia’. The presentation, based on “the circle of willingness” (Mellor 2009), was viewed very favourably and, as a result and on behalf of the NBSA, I invited all sections of the professional nursing community as a cooperative to develop a position statement on transition to professional practice programs, focusing on their structure and content. Two new committees of the Board were created and I was invited to be chairperson for both of them. The first committee was the Graduate Nurse Program Working Party (Cross Section), comprising representatives from all sections of the nursing community, including the university sector. The second committee was the Graduate Nurse Program (GNP) Coordinators Working Party. The first draft statement on the ‘Elements of a Graduate Nurse Transition Program’ and the ‘Position Statement on Preceptorship’ (Circular No: 26/93) were sent for comment to Directors of Nursing, educators, health units, and universities in 1993 by the NMBA CEO/Registrar (Ms. Elizabeth Percival). In the intervening period (1994-1995), further drafts were modified and developed for the profession. In response to the perceived needs, funding of $11,000 per graduate nurse was provided (South Australian Health Commission 1995) to assist with transition to professional practice in 1995. Disappointingly, the zest for support of graduate nurses has waned significantly since then, and the dollar amount of $11,000 per graduate, which is woefully inadequate, remains unchanged after 26 years (South Australian Department for Health and Wellbeing 2019, p. 7).
Transposition of thought and new research question: the radiance of wisdom

In 2001, I returned to rural nursing, and in 2003, assumed the role of student coordinator/facilitator for local SA universities, and for Johns Hopkins and Saskatchewan Universities. I also had the opportunity to observe the nature of the support provided by the local graduate nurse transition program. It was concerning that much of the promised clinical support did not occur.

In 2006, I was appointed Casual Lecturer (Nursing) at the Flinders University Rural Clinical School (FURCS), and concurrently enrolled in the Master of Clinical Education. Owing to my prior concerns with transition programs, I completed a formal research thesis focused on the nature of professional support given to graduate nurses in rural areas (Mellor 2009; Mellor & Greenhill 2014). Focus groups were undertaken in three locations of rural South Australia. Overwhelmingly, the responses from the focus groups indicated that the transition program was not conceived to be an integral part of everyday clinical practice. It was experienced by graduate nurses as a separate entity (an external program with study days) to the clinical environment (Mellor 2009). Preceptorship was rudimentary and, in many instances, did not occur. Graduate nurses stated that they received clinical support only if they were assertive and initiated the process. Self-support proved to be the beginnings of an evolving theme.

In 2008, I had the additional role of transition coordinator for the regional health service; however, my attempts to mobilise the required supports for graduate nurses were not very fruitful. I wrote a new curriculum and attempted to reduce the abandonment, but with limited success. I clearly remember one stand-off where a graduate nurse (with 2-3 months experience since graduating) was left in charge of the Accident & Emergency Department on an afternoon shift. The Director of Nursing was not willing to make any concessions; however, she stated that the graduate nurse could contact her at home if needed. It was apparent that employment of graduate nurses and the financial benefits of exploiting them with fixed contracts was the primary focus. History was repeating itself. It was disturbingly apparent that the organisational willingness to clinically support the graduate nurse was of a low priority. A utilitarian approach was again clearly evident.

In early 2013, I consulted with Professor Jennene Greenhill (Associate Dean and Director of Flinders University Rural Clinical School) and duly made an appointment with SA Health, naively proposing that an observational study along the lines of ‘Are graduate nurses safe?’ be undertaken to quantify the risk that unsupervised graduate nurses posed to patient safety. A mixed approach was to be proposed comprising a root cause analysis of patient safety incidents involving graduate nurses, triangulation of reported data with the Australian Health Practitioners Registering Authority, and interviews with graduate nurses. A meeting was arranged with Debra Pratt (Principal Nursing and Midwifery Adviser, SA Health) for Tuesday 16 April 2013 to discuss the possibility of setting up a plan, framework, and the appropriate ethical considerations. As might be expected, we were
informed that this research was not going to happen. I was advised that SA Health firmly believed the responsibility for ensuring graduate nurses attain a safe level of competence rested entirely with the university sector. The prevailing mindset was that graduate nurses are registered and therefore competent, and do not need support of any kind. Supporting and nurturing graduate nurses was not perceived to be a health sector responsibility, and we left the meeting feeling quite uncomfortable about the SA Health commitment to graduate nurses. This perspective lead me to the conclusion that efforts to persuade organisations to willingly provide an appropriate environment for graduate nurses was a fraught expectation. It was clearly evident that willingness to clinically support the graduate nurse within local health organisations and at the highest levels of government was a low priority (Masso et al. 2019). This prompted a response which embraced the challenge, and created an impetus for pursuing new and different understandings.

In order to cater to this new understanding, I undertook a critical review of transition programs worldwide (Mellor, Gregoric, Atkinson & Greenhill 2017), seeking a problem-based solution; however, the study only served to reinforce the SA Health perspective. Overall, a lack of development and resourcing of transition programs was revealed. For example, the reporting and evaluation of transition programs was rudimentary, and it was difficult to see any progress being made, or likely to be made, in the near future. In addition, most of the manuscripts reviewed were self-reported and little innovation was apparent. Elements such as preceptorship had not been fully tested for their sustainability. While it is possible to have successful instances of preceptorship, sustainability is problematic for a number of reasons, including burnout, the need for adequate preparation for the role, ongoing education, and willingness to fulfill the role. These findings converge with my overall experience, and articulate the need to embrace and explore a transposition of thought, an alternative ideation, one which has the objective of preparing nursing students for the reality of transition to professional practice. This alternative ideation emanating from my prior research was subsequently explored as a new paradigm, and the research question ‘How do nursing students successfully transition to graduate nurse?’ evolved. This question resulted in three publications, Mellor and Gregoric (2016); Mellor, Gregoric and Gillham (2017); and Mellor and Gregoric (2019). For a full version of the manuscripts presented, please refer to Chapter 4.
CHAPTER 3. LITERATURE REVIEW

Chapter overview
From a personal and professional perspective, Chapter Two provided a contextual statement for this study of graduate nurse transition to practice, and identified the concern that the transition of graduate nurses was ineffective and warranted further investigation. The research question, ‘How do nursing students successfully transition to graduate nurse?’ was contextualised. Chapter Three presents a contemporary integrative review of factors and perceptions that have an impact on graduate nurses and their passage to competent professional nurse. The aim was to review, critique, and synthesise manuscripts published between 2015 and 2020. It explicates the review methods used inclusive of the search strategy and the inclusion/exclusion criteria. Evaluation of each publication was undertaken using the McGill Mixed Methods Appraisal Tool. Much of the literature around the psychosocial factors associated with transition continue to focus on postgraduate experiences of transition to professional practice, rather than purposive psychosocial preparation of nursing students for self-support. This chapter reinforces the finding that health care organisations are primarily solipsistic, and the likelihood of providing consistent quality support, or any support at all, for graduate nurses is quite small. An alternative ideation is reiterated, with a focus on preparing nursing students for the reality of transition to professional practice. Proposals for change are advocated, which include further curriculum development in this important area. The discussion section further contextualises the publications presented for this thesis and the implications for undergraduate preparation.

Introduction
The integrative review of the literature for this thesis is guided by the synthesis of frameworks elucidated by Whittermore and Knafl (2005), Taraco (2016a), and Taraco (2016b). The integrative literature review includes a review, a critique, and a form of meta-synthesis of the literature targeted at a particular goal or purpose (Taraco 2016b). It is known as “integrative” because its function is to form the findings into a unified whole resulting in new frameworks or perspectives (Taraco 2016b).

The hierarchy of levels of evidence places meta-analyses and systematic reviews at the apex or highest form of evidence; however, integrative reviews are regarded as more comprehensive methodologically. Systematic review evidence is considered most reliable because it is empirically based with a focus on randomised controlled trials. Systematic reviews and meta-analyses are considered equivalent by the NHMRC (1999); however, some argue that meta-analyses are higher levels of evidence than systematic reviews due to the process of bringing together all of the results of the studies being examined into one collective statistical analysis (Ross 2012). Others do not
accept this premise and are hesitant to recommend the pooling of results due to the possibility of significant bias from the different criteria which denote quality for each research design (NHMRC 1999). The possibility of bias particularly applies to the integrative review method which is more complex due to the inclusion of diverse primary sources such as quantitative, qualitative, and mixed-methods research (Whittemore & Knafl 2005). As a consequence, it will be noted that a structured appraisal tool, the McGill Mixed Methods Appraisal Tool (MMAT 2018) was adopted to appraise all of the studies equally (NHMRC 1999). Consideration was also given to categorising the findings of the various studies into a rational framework. Proposed categories can include study design, classification, demographics, and/or chronology (Whittemore & Knafl 2005; Terraco 2016b). In this study, it was decided to categorise the studies conceptually, as the current conception of the topic was considered “problematic”. Such reconceptualisation of a topic is an appropriate aim of an integrative literature review (Terraco 2016a; Terraco 2016b). The aim of this integrative review will now be discussed, including pre-conceptualisations, the rationale, and the background.

**Aim of the integrative review**

The specific aim of this integrative review was to review, critique, and synthesise the existing literature, and to reaffirm the gap in nursing research with regard to the spectrum of factors and perceptions that have an impact on graduate nurses and their passage to becoming a competent professional nurse. How do nursing students successfully transition to graduate nurse? There is ongoing concern that undergraduate education does not acknowledge the reality of clinical practice, and portrays the health care system as perfect. As a consequence, graduate nurses upon practicing as a registered nurse for the first time are subject to a perverse reality which is far different from the perfection narrative being taught. It is therefore proposed to reconceptualise the transition phenomenon for graduate nurses from one of “reality shock”, as depicted by Kramer (1974) and Boychuk Duchscher (2008), to an experience characterised by preparedness, self-efficacy, and empowerment. This is critical because the reality for health units is ongoing austerity and a health care culture that often hinders graduate nurse transition. These impediments also have an impact on the nature of support provided by transition programs. As a consequence, all undergraduates need preparation for whatever health care environment awaits them. This includes a thorough background knowledge of the transition experience, the likely challenges, and the strategies that can be used to navigate their way through. Some graduate nurses will be fortunate to work in environments that embrace structural empowerment, while others will need to selectively rely on their psychological capital and resilience preparedness to thrive. I will now elaborate on the search parameters used to locate the relevant articles.
Methods

Search Strategy

The CINAHL, Psychinfo, Google Scholar, and Ovid Medline databases were searched in accordance with the inclusion/exclusion criteria in Table 1. Initially, the search terms were more complex and included the following, i.e., new graduate nurs* neophyte OR newly registered OR novice OR transition OR transition to practice OR TTP AND nurs* AND program OR Residency OR Mentorship OR preceptorship, OR graduate nurse program, self-care, self-advocate, transition to practice, novice, coping strategies, self-advocacy, self-efficacy, self-esteem, resilience, hardiness, self-management, and comfort zone. PRISMA, a recognised meta-analysis checklist, has been used for identification, screening, eligibility, and inclusions, as per Figure 1. During the identification process, it became clear that psychosocial terms relating to the empowerment of graduate nurses were infrequently used when discussing graduate nurses. As a consequence, a less complex search was undertaken with the terms 'new graduate nurs*' AND ‘transition’ OR ‘psychosocial factors’.

Table 1. Inclusion-exclusion criteria

<table>
<thead>
<tr>
<th>Inclusion criteria</th>
<th>Exclusion criteria</th>
</tr>
</thead>
<tbody>
<tr>
<td>Articles 2015-2020</td>
<td>Publication before 2015</td>
</tr>
<tr>
<td>English language publication – local and international</td>
<td>Non-English language publication</td>
</tr>
<tr>
<td>Academic journal</td>
<td>Non-academic journal or grey literature</td>
</tr>
<tr>
<td>Abstract</td>
<td>No abstract</td>
</tr>
<tr>
<td>Primary research, including systematic reviews</td>
<td>Non-primary research inclusive of literature reviews, unless a systematic review</td>
</tr>
<tr>
<td>Critical research informing the psychosocial factors relevant to the preparation of graduate nurses for transition to practice</td>
<td>Research informing the psychosocial factors relevant to the transition of experienced registered nurses to new areas of practice</td>
</tr>
<tr>
<td>Local and international acute care environments</td>
<td>Articles excluded if not in a local or international acute care environment</td>
</tr>
<tr>
<td>Studies have observed methodological rigour as per MMAT (2018)</td>
<td>Studies have not observed methodological rigour</td>
</tr>
</tbody>
</table>

The search resulted in a return of 1,294 articles from which duplicate articles (n=13) were removed. The records were subsequently screened in accordance with the inclusion/exclusion criteria. Screening was a process of removing non-primary research and other artefacts which were not relevant (n=954). The remaining full-text articles (n=327) were inspected closely for relevance and rigour (see over the page for relevance and quality criteria), with a final number of qualitative articles (n=21) and quantitative articles (n=14) eligible for inclusion in this integrative literature review.
Relevance criteria

The existing paradigms of “reality shock” and “transition to practice” have been reported in the literature for many years. Reality shock was described by Kramer (1974), who used the term to refer to shock-like reactions produced when new employees realise the discrepancy between their expectations and reality. Despite evidence and research extending over many decades, there are gaps with regard to implementing recommendations. It is apparent that there has been little response by the university sector to the findings of reality shock within the psychosocial paradigm.
Good psychosocial skills are purported to mitigate against the experience of reality shock; however, graduate nurses continue to be shocked by the health care culture, rather than being educated to cope. This integrative review, in concert with the inclusion/exclusion criteria (Table 1), focused on selecting articles that considered psychosocial elements within undergraduate preparation and during transition to professional practice.

**Quality Criteria**

This integrative review includes studies with a number of diverse research methods, i.e., qualitative and quantitative studies. In consequence of this diversity, it was recommended by the NHMRC (1999) that a structured appraisal tool be adopted to assess all the studies equally for rigour (NHMRC 1999). Evaluation of each article was undertaken using the McGill Mixed Methods Appraisal Tool (MMAT, version 2018) (Hong et al. 2018). This appraisal tool is particularly relevant to integrative reviews, as it allows assessment of qualitative, quantitative, and mixed-methods research articles, and is structured and deliberate. Initially, there are two screening questions for all methods:

**Question 1.** Are there clear research questions?

**Question 2.** Do the collected data allow to address the research questions?

(Hong et al. 2018, p. 2).

If the answer is “no” or “not clear” for either question, then further appraisal was to be aborted and the article rejected. Following these initial screening questions were questions with methodological quality criteria specific to qualitative, quantitative, and mixed-methods research. Articles were excluded from this integrative literature review if there was limited transparency with regard to the research processes used, or if essential components were missing. As all the articles were from peer-reviewed journals, there were few exclusions linked to a lack of methodological rigour. A score in the form of a percentage and commentary on each article has been included in the review table (Appendix 3) for reference. The results will now be revealed below.

**Results**

**Number and nature of studies identified**

The results revealed 35 studies (see Appendix 3) representing research from 15 different countries. Multiple manuscripts emerged from the United States of America (n=8), Australia (n=5), Canada (n=5), Korea (n=3), Sweden (n=2), and Taiwan (n=2), with single manuscripts from China, England, Finland, Hong Kong, Iran, Italy, the Netherlands, the Philippines, and Singapore. There was also one international collaboration between the USA, Scotland, and Puerto Rico. The methods and methodology are presented in the review table (Appendix 3), and included:

21 qualitative research studies, i.e., qualitative descriptive (n=8), phenomenology (n=6), narrative
enquiry, case study, exploratory research, focused ethnography, grounded theory, inductive qualitative content analysis, and qualitative longitudinal study.

14 quantitative research studies, i.e., quantitative cross-sectional studies (n=3), hierarchical multiple linear regression analysis (n=2), with single studies inclusive of longitudinal and correlational design, longitudinal confirmative factor analysis, descriptive statistics, randomised trial with control, prospective longitudinal study, longitudinal study, pre-test/post-test intervention, and survey enquiry.

There were also mixed-methods studies (n=2) which were included in the quantitative tally.

**Analysis of data**

**Identification and listing of psychosocial factors**
The final list of 35 articles were read entirely with the goal of selectively identifying the salient psychosocial factors that have an impact on graduate nurses in transition. Those articles that included psychosocial factors identical to those discussed in other articles were listed as one factor, and any replication is signified by the number of linked references. Where psychosocial factors were not identical, they were considered to be separate. Using this criteria, an extensive random list of psychosocial factors were compiled and inserted into a table for analysis and synthesis.

**Grouping of exemplars into subcategories**
Theoretical sensitivity was applied to the list of psychosocial factors. This required isolating the number of psychosocial factors that possessed a unique theme, and where they were compelling, they were grouped together. The groups were classified using socio-emotive and psychological constructs. Exemplars include: experience of self and emotions; feelings of fear; self-efficacy needs.

**Categorisation of each sub-category**
Further theoretical sensitivity was required to establish the overarching categories to effectively represent the sub-categories. The final categories were: mental health; undergraduate education; leadership; and preceptorship.

**Categories and sub-categories with explanation**
As related previously, there were four categories which emerged. The first of these was “Mental Health” with three sub-categories, i.e., experience of self and emotions; feelings of fear; and self-efficacy needs. Secondly, there was “Undergraduate Education” with three sub-categories, i.e., unprepared; self-support; and managing situations. Thirdly, there was “Authentic Leadership” with two sub-categories, i.e., need to feel supported; and need to feel safe. The final category was
“Preceptorship” with three sub-categories, i.e., education needs; negative effects; and positive effects. I will now explicate each of the categories and sub-categories in detail.

**Mental Health**

There were three sub-categories of mental health, i.e., experience of self and emotions, feelings of fear, and self-efficacy needs.

**Experience of self and emotions**

In their US survey of preceptors (n=42), Shaw, Abbott and King (2018) found that the strengths of graduate nurses was their caring, collaborative engagement and willingness to work diligently. This positive perspective was also present in the structured interviews with graduate nurses (n=15) undertaken in a rural area of the Philippines. Labrague et al. (2019) found that some Filipino graduates were enthusiastic and excited by the steep learning curve, and keen to provide the best possible care, regardless of the shock of transition.

Unfortunately, this level of optimism is not universal and the majority of studies continue to report challenging experiences of self and emotions on a global basis. These challenging experiences were observed to plague graduate nurses in studies undertaken in Western Australia (Murray, Sundin & Cope 2019), the cities of Uremia, Ardebil, and Tehran in Iran (n=14) (Zamanzadeh et al. 2015), Washington (n=34) (Oneal et al. 2019) and Texas (n=15) (Urban et al. 2020) in the United States, and lastly, the Philippines (n=15) (Labrague et al. 2019). While these were all small studies, as an international collection, they demonstrate that graduate nurses continue to have numerous misgivings, such as lack of self-assurance, poor professional efficiency, high anxiety, and feelings of being overwhelmed. In their focus group study, Tong and Epeneter (2018) made a similar comparison of the stressors in their study of graduate nurse cohorts from 2003 (n=21) and 2015 (n=22). They demonstrated little change in graduate nurse experiences over the period with regards to difficulty with communication, feelings of inadequacy, and their experience of ethical dilemmas. In addition to these findings, it was identified that graduate nurse’s knowledge of procedures, hospital protocols, and ward culture continued to be rudimentary, and this further exacerbated their feelings of hopelessness and their low levels of confidence (Oneal et al. 2019; Urban et al. 2020).

In Chang Gung Hospital, Taiwan, a study of graduate nurses (n=25) revealed that culturally, there is a “burden of expectations” often characterised by the constant vigilance of other staff who evaluate their every move and openly compare them with other graduates (Liang et al. 2018). Hostility to graduate nurses was also demonstrated in ten Hoeve et al’s (2018) study in the Netherlands, in which graduate nurses (n=18) completed written diaries during their first two years of practice, with over half (n=10) reporting that physicians communicated in a “demeaning or demanding manner”. Their dismissive behaviour allegedly engendered feelings of being
disparaged and, at other times, invalidated (ten Hoeve et al. 2018). However, as has been found in previous studies, both internationally and historically, senior nursing staff are inclined to excuse physicians’ behaviours, preferring not to apportion responsibility or confront their incivility. This indifference by their seniors further re-affirmed the low status of nursing and reinforced the graduate nurses’ truncated feelings of worth (ten Hoeve et al. 2018). In order to mitigate against these obstacles, graduate nurses sought to develop friendships with colleagues they worked with, and any staff who would be supportive or offer a ‘lifeline’. Unfortunately, a number of studies revealed that the majority of graduate nurses would find this goal elusive and, at a time when they were already feeling inadequate as nurses, often encountered an unsupportive and unfriendly ward culture that severely exacerbated their transition to practice (Zamanzadeh et al. 2015; Tong & Epeneter 2018; Hatzenbuhler & Klein 2019; Oneal et al. 2019). Attempts to debrief with partners, family members, or friends was often a fraught exercise as they discovered that most people do not understand the nature of nursing (Oneal et al. 2019). Camaraderie, communication, and collegiality among co-workers were cited as protective factors for mental health both inside and outside of the workplace, as “non-nurses don’t get it” (Oneal et al. 2019, p. 526).

The stress of transition was shown to exist for graduates not only within the professional domain, but also as an intrusion into their private lives. This intrusion served to increase their feelings of isolation and dislocation, as many graduate nurses could not separate their private and professional lives, carrying the frustration and loneliness home with them (Zamanzadeh et al. 2015; Oneal et al. 2019; Urban et al. 2020). Adding to their social isolation was the impact of shift work, which resulted in graduate nurses being absent from celebrations that are socially normative, such as national holidays, religious feasts, and the special milestones of friends and family (Oneal et al. 2019).

The effects of workplace incivility and horizontal violence from fellow nurses and supervisors was frequently reported as the most destructive obstacle, and predisposed graduate nurses to mental ill health. Two empirical Canadian studies investigated the factors influencing graduate nurses and their successful transition to professional practice in the acute hospital setting. The first study, undertaken by Laschinger et al. (2016), was a rigorous national two-wave survey of graduate nurses (n=3,906) undertaken via standard questionnaires with a one-year time interval. The focus of the two-wave surveys were on ‘situational’ factors, ‘personal’ factors, ‘intermediate outcomes’ and ‘job related outcomes’ such as career turnover intentions. Graduate nurses who responded to both surveys (n=406) had their responses matched, with the data revealing that both the work environment and personal characteristics influenced graduate nurses’ intentions to leave the profession of nursing. The work environment particularly concerned the research team, with reports by graduate nurses of incivility and cynicism increasing over the one-year period. These results were consistent with other studies, with 41.9% of graduate nurses experiencing incivility from physicians, 31% from colleagues, and 24% from their direct supervisors. This mirrored an
Australian mixed-methods study in which Gardiner and Sheen (2017) found that approximately 51% of graduate nurses (n=107) had stress symptoms resulting from incivility and insufficient support, while others progressed to symptoms of clinical depression. Mental health effects related to structural empowerment were examined in a second Canadian study by Wing et al. (2015) in Ontario. Based on Kanter’s (1977) theory of structural empowerment, a workplace incivility scale was employed to measure the level of incivility experienced by graduate nurses (n=394) in health care settings. Mediated regression analysis, using descriptive statistics tied to a predictive non-experimental design, revealed empowerment to be significantly negatively related to co-worker incivility. Conversely, mental health symptoms experienced by graduate nurses were positively related to incivility. A compelling example illustrating this finding is the graduate nurse who considered harming herself so she would not have to go to work. “I’m not saying that I ever have like suicidal ideations or anything, but I just remember thinking – I could turn my car into the barrier and then I wouldn’t have to go to work” (Oneal et al. 2019, p. 522). The need for counselling of graduate nurses by a psychologist, and increased emotional support from their nursing colleagues, and inter-professionally, was recommended (Liang et al. 2018).

Although NGNs encountered many distressing or uncertain situations, they found that when they could control their emotions well, they gained more confidence (Liang et al. 2018, p. 75).

Within the broader international community, it was not an uncommon finding that graduate nurses were severely exposed during their first year of practice, with mental health risks such as emotional fatigue and scepticism ever present (Laschinger et al. 2016). As a result, many graduate nurses re-assessed and reflected on their options which included changing themselves in some way, requesting allocation to a different ward, or leaving the profession entirely (Laschinger et al. 2016). In the next section, the recurring theme of “fear” as a significant phenomenon faced by graduate nurses throughout their transition year, will be discussed.

**Feelings of fear**

Fear appeared to be a constant element of transition. Graduate nurses found their new responsibilities daunting. The fear of taking on the comprehensive role of caring for patients and all the associated responsibilities was challenging to the graduate nurse; in particular, safe administration of medications and performance of unfamiliar procedures. There was apprehension about time management; fear of staff; fear of answering phone calls; fear of calling physicians and fear of not calling them; fear of not being seen as competent; fear of making mistakes; and fear of reporting any mistakes.

Graduate nurses’ initial fears of not “fitting in”, and the fear of not being seen as competent were reported in focus groups (n=29) and key informant interviews (n=5) conducted by Oneal et al. (2019) in Washington and Oregon, USA. This rigorous study revealed that perceived or real pressure from staff was a significant and constant fear (Oneal et al. 2019). Murray et al. (2019)
reaffirmed this perspective in their qualitative descriptive study in Perth, Western Australia. Semi-structured interviews with informants (n=11) exposed the real possibility that graduate nurses would compromise patient safety as a result of the pressures to complete their plan of care as scheduled (Murray et al. 2019). In both metropolitan Groningen in the Netherlands (ten Hoeve et al. 2018), and in rural communities in New South Wales (Lea & Cruickshank 2015), graduate nurses were reluctant to ask for help if they perceived that their colleagues were busy. Paradoxically, there was also the fear-related problem of graduate nurses not seeking support when they should: “… new graduates often do not ask for assistance or communicate with other staff if they are experiencing difficulties and they [Registered Nurses] become concerned when new graduates fail to come near them to seek support” (Lea & Cruickshank 2015, p. 2831). Unexpectedly, it was not the confident graduate nurses that failed to speak up when confronted with a situation beyond their competence and experience, but those who had the least confidence.

Wahab et al. (2017) assembled a purposive sample of graduate nurses from a residency program (n=9) in Singapore to explore graduate nurses’ accounts of resilience. With a descriptive design using photo voice, this unconventional study required informants to provide a photo representative of what resilience meant to them. Graduate nurses were invited to share their photo and elicit meaning within a focus group session. One graduate provided her personal graduation photo; the image was designed to evoke a conceptual representation of the general view held by senior nursing staff that graduate nurses with baccalaureate qualifications should be competent, and therefore require little transitional support. Another informant provided a photo of “fear” in the form of the ward telephone to illustrate the fear she had of answering phone calls, and the steps she took to avoid them. It was not of course the phone of which she was afraid, but the fears expressed of not feeling prepared or able to respond appropriately to the questions asked by physicians. Medical staff definitely posed a challenge overall (Liang et al. 2018; Murray et al. 2019; Oneal et al. 2019). Not knowing when and how to call physicians, interns, consultants, and specialists engendered significant anxiety (Murray et al. 2019). Ever present was the fear of the negative repercussions of calling physicians, “being yelled at, even if it is for good reason”, as reported by one graduate nurse (Oneal et al. 2019, p. 525), or the fear of not calling them for fear of the potential consequence of inflicting harm if their patient did not receive timely intervention (Oneal et al. 2019).

In addition to the fear of communication with physicians, there was the fear of interacting with other health professionals. There was fear and uncertainty of making mistakes and the associated tensions (Liang et al. 2018; Law & Chan 2015), including the fear of embarrassment and losing face with their colleagues or seniors if they made the wrong call (Liang et al. 2018). Such fear and anxiety was portrayed by Liang et al. (2018) as “walking on thin ice”. Instances of incivility only served to accentuate any fears and negatively influence the quality of care provided. Investigation of the risk to patient safety from horizontal violence was the focus of a qualitative
phenomenological study by Rosi et al. (2020). Graduate nurses (n=21) who had graduated from the University of Milan, Italy were interviewed. Informants selected for interview were not only acute care nurses, but those from any health care context in Milan, and while slightly outside of the brief of this review, the findings are still pertinent. It was found that where horizontal violence exists, feelings of fear were accentuated, and the associated stress and anxiety increased the likelihood of errors and risks to patient safety (Rosi et al. 2020). Further to this dilemma, graduate nurses were also fearful of reporting “any mistakes” in an environment where they did not feel supported. This fear further increased the risk to patient wellbeing, as corrective action would be delayed or the concern not addressed at all (Rosi et al. 2020).

Psychological capital and self-efficacy

Psychological capital was an important consideration advanced by previous studies (Boamah & Laschinger 2015; Kim & Yoo 2018; Laschinger et al. 2016). Psychological capital is a concept consisting of self-efficacy, hope, optimism, and resilience. These factors are known to influence attitudes towards work and levels of achievement (Kim & Yoo 2018). Self-efficacy (or confidence) is the conviction that the graduate nurse has the capacity to successfully mobilise the resources needed to achieve a specific outcome within a given set of circumstances (Boamah & Laschinger 2015; Kim & Yoo 2018). Hope refers to the graduate nurse’s levels of enthusiasm and commitment to achieving their goals. Hope involves being both persistent and strategic in the face of adversity (Boamah & Laschinger 2015; Kim & Yoo 2018). Optimism is about the attribution of success in the present and in the future. Positive events are attributed to individual, prevailing, or enduring phenomena and negative events as a consequence of extraneous, non-permanent, and problem-specific phenomena (Boamah & Laschinger 2015; Kim & Yoo 2018). Resilience is the ability of the graduate nurse to recover from hardship, adversity, or significant sources of stress (Boamah & Laschinger 2015; Kim & Yoo 2018). These personal resources were considered more important for graduate nurses than empowerment through adjustment of workplace structures (Boamah & Laschinger 2015; Wahab 2017). A product of psychological capital is work engagement. Work engagement refers to a high level of dedication, enthusiasm, and meaning in which the graduate nurse is completely absorbed. Graduate nurses with an activated work engagement focus on their patients rather than on concerns about the obstacles faced in order to provide that care (Kim & Yoo 2018). The obstacles just add to the intrigue and pose another challenge or puzzle which they are confident they will overcome (Boamah & Laschinger 2015; Kim & Yoo 2018).

Boamah and Laschinger (2015) revisited earlier survey data collected from graduate nurses (n=205) in a 2012 study. The aim of revisiting the research was to test the link between perceptions of workplace empowerment, psychological capital, and workplace engagement. The study was well constructed with quality measures used to validate the questionnaires. The informants were located by accessing the registry list of nurses in Ontario, Canada. It was discovered that both psychological capital and workplace empowerment were “significant
independent predictors of work engagement”. The researchers asserted that such an environment is realised when workplaces keep graduate nurses informed, and provide access to professional development opportunities and access to organisational resources, enabling them to have a positive work experience.

The effect of environment was reinforced by Charette et al. (2019) who undertook an ethnographic study of the factors influencing the practice of graduate nurses. A purposive cross-section of staff members, including graduate nurses (n=4), nurse preceptors (n=2), clinical nurse specialists (n=9), and nurse managers (n=4) were recruited for the study. The researchers discovered that the workplace environment has a significant influence on the competency, preparedness, and self-efficacy of graduate nurses.

Self-efficacy was also found to be present in graduate nurses who were strategic in their approach as an undergraduate nursing student, with some proactively seeking the experiences required in order to succeed in their transition year. A reflection of this choice might be researching further information about a procedure, or requesting a change of venue for their clinical placements in order to hone specific clinical skills, i.e., the opportunity to debrief and process the dying experience (Charette et al. 2019; Cadavero et al. 2020). Unfortunately, it was discovered that many nursing students lacked self-efficacy traits and did not take advantage of their clinical placement opportunities, i.e., they were passive in their approach to learning. As a result, they were unprepared, and at a distinct disadvantage, compared to those who were more self-directed. It was asserted by Charette et al. (2019) that Nurse Managers valued such resourcefulness, including well-developed collaborative skills and overall leadership qualities. Confidence and the ability to speak easily with all members of the inter-professional team was highly valued, despite graduate nurses’ experience being minimal and their clinical skills rudimentary (Charette et al. 2019; Feltrin et al. 2019). Being transparent and able to speak up and ask for help was considered vital for patient wellbeing and the safety of colleagues (Law & Chan 2015; Wahab et al. 2017; Feltrin et al. 2019). Transparency was considered to be important to foster trust, instead of adopting a pretence likely to be perceived as inauthentic. This act of being open with colleagues and seniors was considered by some graduate nurses to be an essential element of fostering the respect and engagement essential to “fit in” to the ward culture (Feltrin et al. 2019). Not interpreting the actions of others as a personal affront was also considered important, for a display of frustration by a co-worker may be related to something else happening in their lives rather than to the graduate nurse (Feltrin et al. 2019).

Overall, there was much complexity to fitting in, and graduate nurses adopted a number of diverse survival strategies. One strategy was to ensure there was a healthy separation between their work and home life, which enabled the graduate nurse to project a positive and professional image when interacting in the ward culture (Feltrin et al. 2019). Many decided to adapt to the ward culture by
changing themselves and their personal style to align with that of their colleagues by adopting hybrid procedures and practices to gain approval. Unfortunately, some of those practices were not evidence-based (Feltrin et al. 2019).

The participants said that nurses including graduate nurses who stand out, by trying to have or keep a more scientific approach to care and to base their practice on evidence, can sometimes be left out by colleagues. This can limit the deployment of competencies of graduate nurses, because to be accepted by their colleagues, some graduate nurses will do anything to blend into the group. Others challenged themselves to go beyond the expectations of their colleagues in order to be regarded as self-sacrificing and a good nurse (Charette et al. 2019, p. 3626).

However, for some graduate nurses, the perceived necessity of fitting in and proving themselves, meant there was also potential for self-neglect and exploitation. While proving themselves “worthy” as a nurse had the likely benefit of an offer of a position as a permanent staff member, it made them especially vulnerable. This vulnerability was exploited by predatory nurse managers, and the graduate nurse was an easy target, i.e., expectation they will agree to more overtime and be constantly available for extra shifts. As a consequence, the negative impact on self-care with regard to their relationships, the risks to their own health, and ultimately, to patient safety was quite adverse (Oneal et al. 2019). Optimism, as previously defined, is associated with having a positive view of the future based on attributes which are realistic and achievable in the longer term (Boamah & Laschinger 2015; Kim & Yoo 2018). There were definitely skills to be learned by the act of persisting through hardship, and some graduate nurses positively reinterpreted the situated context of their transition experience in order to succeed (Wahab et al. 2017; Boamah & Laschinger 2015). In one example, a graduate nurse compared the gravity of her situation with the horror of victims who suffered atrocities in war. This perspective gave her resilience to persevere, i.e., Mr. Jones being late for his shower didn’t seem too much of a disaster. Furthermore, Wahab et al. (2017) described four major themes emerging from their study, with each having a focus on the development of resilience through the ability to recover from hardship or adversity or significant sources of stress (Boamah & Laschinger 2015; Kim & Yoo 2018). The first of these attributes was to persevere and overcome obstacles through not accepting failure as an option, i.e., perseverance and efforts to succeed were enhanced by internalising the professional nursing role, embracing their spirituality, and through firm adherence to moral obligation. The remaining themes were to accept one’s responsibilities as an ordained nurse and fulfil the contract implied by their calling; be adaptable to unfamiliar situations; and finally, to take control of one’s own learning (Wahab et al. 2017). In the final analysis, one graduate nurse made the following observation: “You can't be on orientation forever. And you can't be a student forever. I think you have to learn to ask questions and learn to grow” (Hatzenbuhler & Klein 2019, p. 95).
Undergraduate Education

There were three sub-categories of the theme of undergraduate education, i.e., unprepared, self-care, and managing situations. Being unprepared means that graduate nurses do not have the psychological capital to navigate the complexity of transition. Communication has been identified as one pivotal trait that provides the self-support tools for success, and this has application in any context (Lee et al. 2019). Skills inclusive of adaptability and emotional intelligence are easily transferable to manage a myriad of situations. Clinical skills, which are often soon redundant, are not as compelling as there will always be new developments and innovative ways of doing things. Being able to communicate enables the graduate nurse to rise above the practical realities to transcend them. The adjustment elements of transition shock need to be addressed and objectified through the conduit of effective communication to minimise the impact (Lee et al. 2019).

Unprepared

Poor practical skills were identified as an ongoing concern (Lee et al. 2019; Labrague et al. 2019; Urban et al. 2020); however, knowledge of horizontal violence and how to mitigate the impact was an educational need (Rosie et al. 2020; Oneal et al. 2019). Teaching of communication skills that enable relatedness and building of relationships was also deemed important (Zamanzadeh et al. 2015; Lee et al. 2019; Oneal et al. 2019; Kaihlanen et al. 2020). Being unprepared due to the gap between theory and practice is characteristic of the transition experience of most graduate nurses. It was therefore an unrealistic expectation of the graduate nurse to already have the requisite practical skills and knowledge (Labrague et al. 2019; Lee et al. 2019; Zamanzadeh et al. 2015). It is not uncommon for many graduate nurses to struggle with a full complement of patients very early in their first placement, inclusive of complex patients, for which they were not ready (Labrague et al. 2019). In many cases, graduate nurses do not have the support expected from managers, colleagues, or preceptors (Labrague et al. 2019). Graduate nurses need to be prepared for this reality shock by educators (Lee et al. 2019). At the forefront is effective communication which is considered an important area for further development in undergraduate education (Lee et al. 2019; Oneal et al. 2019; Zamanzadeh et al. 2015).

… the key point is to build great relationships with the doctors or related departments. This closely relates to how long nurses will survive and stay in a clinical setting (Lee et al. 2019, p. 169).

There were many difficult conversations and communication situations identified in which undergraduate education may benefit the graduate nurse. In this example of a partially successful educational intervention in Sweden, Frögéli et al. (2020) undertook a parallel randomised controlled trial with a focus on improving adaptation to stress and social acceptance. Graduate nurses (n=239) were exposed to an education program of three sessions of three hours each (nine hours in total), in groups of approximately ten participants. The intervention included the following topics, i.e., the graduate nurse transition experience, the nature of stress, stress-related ill-health, and the socialisation process. Data were collected using self-report questionnaires using a digital
survey tool. The results indicated that there was little difference between the two groups with regard to their stressors and fears. It was however found that adherence to the intervention was positively associated with adaptation to stress and social acceptance by graduate nurses (Frögéli et al. 2020). Confounding factors cited were the use of self-reports and possible leakage between the intervention and the control group.

The following are primarily communication-focused topics identified from the literature and advocated for inclusion in undergraduate nursing curricula for the purpose of facilitating transition to practice:

The first of these is the requirement of full expression of the registered nurse role which is thought to improve confidence and competence with communication skills, and relatedness to their colleagues, seniors, and members of the inter-professional team (Kaihlanen et al. 2020). The “manner of integration” as previously mentioned was enhanced by what was termed “systematicness” by Kaihlanen et al. (2020), i.e., the student had specific learning needs; there was a plan with time sufficient to demonstrate that those needs had been met; the student’s performance demonstrated that those needs had been met (Kaihlanen et al. 2020). Associated with performance is the teaching of time management and prioritisation. Poor prioritisation has been consistently reported, allegedly due to lack of knowledge, on the part of the graduate nurse. For example, basic knowledge of the normative values of vital signs and the patient safety implications of any differential was advocated (Hatzenbuhler & Klein 2019; Lee et al. 2019; Oneal et al. 2019; Shaw et al. 2018). Enhancement of critical thinking to foster problem-solving in unexpected situations is also a valuable contributor to time management and prioritisation, i.e., abrupt or sudden complaints from patients or other challenging scenarios (Lee et al. 2019). To further complement the development of efficacy and organisational skills, more attention needs to be paid to the final practicum immediately prior to completion of the undergraduate program.

Essential and defining characteristics of an effective final practicum was the manner in which the final year nursing student was integrated into the functional ward unit as an accepted and valued part of the team (Kaihlanen et al. 2020). It was especially important for the graduate nurse to experience full expression of the nursing role, as this was not the usual experience. Hatzenbuhler and Klein (2019) interviewed ten graduate nurses and all of them identified differences in nursing students’ responsibilities and that of the registered nurse when providing patient care.

Improvement of communication skills was also advocated. In particular, patient “handover” or “handoff”, i.e., guided practice for providing a comprehensive report to the next shift or relevant caregiver, was found to be extremely effective with regard to transfer of accurate information (Lee et al. 2019). Telecommunication skills were also reported as being “very difficult” for graduate nurses, and some were initially fearful and avoided the telephone altogether (Lee et al. 2019). Contributing to these fears were the practical difficulties of hearing a telephone conversation, and
the frequent use of abbreviations and parochial terminology used in the medical arena which was
difficult for outsiders to understand (Lee et al. 2019). As such, further education is recommended to
prepare graduate nurses so they are comfortable using the telephone (Lee et al. 2019).
Communication is also an essential facilitator of relatedness, and relationship building was
considered critical as was the development of rapport with not only the myriad of health
professionals, but also with maintenance staff, food services, patient transport services, and
pharmacy services, all considered integral to providing comprehensive patient care (Lee et al.
2019). Finally, communicating with distressed relatives and the management of the process of
patient death inclusive of the dying process, was elicited as a critical competency. Without clear
guidance, feelings of inadequacy can cause distress and adverse psychological trauma to the
graduate nurses, reducing their self-efficacy (Cadavero et al. 2020; Lee et al. 2019).

**Self-support**
Self-care and work-life balance is reported as being given a low priority in some undergraduate
nursing programs, and a higher profile is advocated when considering strategies to ameliorate
transition shock (Oneal et al. 2019; Docherty-Skippen et al. 2019). Personal self-support
incorporates all of the self-care elements that contribute to the wellbeing of the nurse as an
individual, i.e., spiritual self-care, relationship self-care, emotional self-care, psychological self-
care, the capacity to navigate self-care resources, physical self-care, self-evaluation of personal
health and wellbeing, and resilience (Docherty-Skippen et al. 2019, p. 111). The Nursing and
Midwifery Board of Australia emphasises the need for nurses to “maintain the capability” for
practice, but does not specifically include self-support competence in the ‘Registered nurse
standards for practice’ (NMBA 2016). Further research is required to determine the undergraduate
experience across the spectrum of universities in this regard. While it is asserted by Docherty-
Skippen et al. (2019) that most research in the past has focused on the negative outcomes of
attempting to fulfil the professional nursing role, little has been written about teaching of self-
support competencies to nursing students. As a consequence, positive approaches to teaching
nursing students about how to “self-care” were advocated for by Docherty-Skippen et al. (2019).
Research targeting self-care activities and an educational approach to teaching self-care was
undertaken in Ontario, Canada (Docherty-Skippen et al. 2019). Their findings indicated that
personal self-care was overwhelmingly valued by the educators who responded to the survey;
however, it was enacted within all curricula to a greater or lesser extent. Predominantly, it was not
perceived as valuable when compared to professional self-care. There were numerous reasons
cited by Docherty-Skippen et al. (2019): individual curricula were primarily consumed with task-
related patient-centred care models and neglected the impact that an individual nurse’s capacity to
self-support might have on the process; the capacity to evaluate achievement of self-support
strategies was found to be a challenge; and as previously mentioned, some considered self-
support to be a more individualistic need and believed it should be relegated to counselling on an
individual needs basis, i.e., when nursing students presented with problems or issues around coping. Others believed there was already too much content in their curriculum and were concerned about including extra information (Docherty-Skippen et al. 2019).

Managing situations
Violent patients, patient complaints, and abusive physicians are difficult situations to deal with, and need to be addressed educationally before graduation (Oneal et al. 2019; Lee et al. 2019).

Violent patients and abusive physicians
Bullying behaviour is quite pervasive and may play a central role in the transition to practice for graduate nurses (Rosi et al. 2020). The prevention of horizontal violence is important as it has a negative impact on graduate nurses, both professionally and personally (Rosi et al. 2020). Patients are also put at risk if there is reluctance to speak up. It is not uncommon for graduate nurses to endure bullying, as they are not cognisant of this phenomenon, what it is, how it occurs, and what can be done to address it (Rosi et al. 2020). Interventions in the form of education are important to provide the necessary skills to identify and contextualise bullying behaviour. Thompson (2016) undertook a pre/post survey of graduate nurses following the completion of four bullying modules (the intervention). Her evidence demonstrated that integration of content about bullying into the curriculum of undergraduate nursing programs increases self-efficacy, and has a protective effect on graduate nurses (Thompson 2016). Modules included the importance of recognising both overt and covert bullying behaviours; developing assertiveness as a core communication skill; avoidance of being a target of bullying; and actions available to address bullying (Thompson 2016).

Patient complaints
The professional management of patient complaints was seen as important by both undergraduate nurses and nurse educators (Lee et al. 2019; Law & Chan 2019). Not having the skills to address patient complaints effectively was stressful for graduate nurses, and can result in escalation and violence. Simulated practice was suggested as a solution (Lee et al. 2019). The opportunity to practice the management of distressed patients should be provided, including how to de-escalate a crisis situation and restore harmony (Lee et al. 2019).

Structural Empowerment
There were two sub-categories of structural empowerment important to graduate nurses, i.e., the need to feel supported; and the need to feel safe.

Need to feel supported
Structural empowerment was deemed to be an important theme overall (Mansour & Mattukoyya 2018). Empowerment of graduate nurses is attainable through access to opportunity, information, support, resources, and to formal and informal power (Mansour & Mattukoyya 2018; Frögli et al.
Tong et al. (2018) found that graduate nurses (n=22) from a baccalaureate program based in the Pacific North West of the USA were not subject to burnout or feeling out of control generally. The more recently graduated nurses from 2015 felt that the patient load and ward culture were fair and equitable, whereas the graduate nurses from 2003 (n=21) felt less supported. The 2015 group felt that the workload was distributed equitably and fairly among the nursing staff, and that the organisation valued them as new nurses. There were however possible explanations for this change in perspective. The informants in the 2003 study were self-selected, whereas the 2015 group were purposely selected. On commencement as a graduate nurse, access to opportunities for growth within the organisation is facilitated by providing the graduate nurses with choices about the nature of their orientation to the ward or unit (Wing et al. 2019; Kim & Yeo 2019), choices that aligned with the graduate nurse’s perceived needs and which engendered feelings of agency, e.g., a longer or shorter orientation; a developmental choice targeted at the development of specific skills, such as participation as an active member of the inter-professional team, or if specific to their chosen placement, arrangement of an introductory session on “Point of Care” Troponin measurement with the cardiac nurse (Wing et al. 2019). Interventions which aid socialisation, support from team members, and individualisation of their experience enhance the perception of a supportive environment (ten Hoeve et al. 2018; Oneal et al. 2019).

When graduate nurses feel validated by their leadership, they are gifted with formal and informal power as individuals. Validation promotes acceptance by members of the team and their preparedness to assist. Leadership interventions which aid socialisation, provide support from team members, and individualise the graduate nurse experience, lifts graduate nurses’ confidence, and their feelings about the transition experience (ten Hoeve et al. 2018; Oneal et al. 2019). Such a work environment also provides graduate nurses with the confidence that will embolden them, not only to speak up, but also to interact effectively with patients, colleagues, and the inter-professional team (ten Hoeve et al. 2018; Mansour & Mattukoyya 2018). Graduate nurses will also connect with their values and engage in advocacy with moral courage (Mansour & Mattukoyya 2018). Wing et al. (2015) found that empowering workplaces fostered a culture with fewer acts of incivility at all levels of the hierarchical structure. Staff were more likely to work harmoniously, be more accepting of others, and less competitive. “Civil work relationships are dependent on an organisational culture that resists negative, disruptive behaviours and promotes collegial relationships” (Wing et al. 2015, p. 640). In an empowered workplace, graduate nurses express their role more effectively, as they have a choice of who to approach for support or advice, instead of who they should avoid (ten Hoeve et al. 2018). There is no need to become invisible. The graduate nurse can be creative and engage in critical thinking and not “second guess” themselves, as would happen if they were subject to incivility. As a result, there is less likelihood that they will make mistakes (Rosi et al. 2020). Structural empowerment benefits the resilience of graduate nurses, whereas an uncivil workplace culture adversely affects their mental health (Wing et al.
Need to feel safe

There were a number of recommendations for graduate nurses to feel safe. When graduates felt vulnerable and unsafe (Law & Chan 2015), advocating or “speaking up” for themselves or their patients was adversely affected. Feeling safe at work required the provision of appropriate allocations of staff to reduce graduate nurses’ insecurities, and to promote an environment free of risk (Lea & Cruickshank 2015; Laschinger et al. 2016; Oneal et al. 2019). This included the need to address horizontal violence and encourage positive relationships (Gardiner & Sheen 2017; Wing et al. 2015). Constructive feedback about progress can assist with feeling safe and reducing uncertainty about performance (Gardiner & Sheen 2017). Casler et al. (2017) advocated the use of an online intervention alleged to mitigate against feelings of vulnerability. This study by Casler et al. (2017) and the above considerations will now be discussed in more detail.

In Austin, Texas, U.S.A., Casler et al. (2020) undertook a quantitative study in which a convenience sample of graduate nurse informants (n=25) were recruited from the residency program of a large medical centre in a pre-test post-test survey. The purpose of the study was to evaluate an online support intervention designed to improve graduate nurse job satisfaction and competency. The intervention was active participation in a closed, private Facebook group which provided the opportunity for graduate nurses to express their fears about transition. “Content was semi-structured (discussion posts, photos, polls, articles, video) with weekly topics as well as an open forum for graduate nurses to seek advice or support”. Topics for the weekly discussion posts were based on Boychuk Duchscher’s transition shock model (Duchscher 2012). Graduate nurses were able to share reflective observations, challenges, and emotions with other graduate nurses and designated mentors. The Casey-Fink Graduate Nurse Experience Survey (Casey et al. 2004) was completed before commencing their transition program. Graduate nurses then participated in the Facebook group for a 4 month period, after which they were re-tested, and measurement of any changes in psychological and professional capital was undertaken (Casler et al. 2020). The post-test survey demonstrated that graduate nurses now felt safer, i.e., when interacting with physicians, with their discomfort levels reducing from 20.8% to 4.5%. In another example, graduate nurse confidence in managing deteriorating patients improved from 21% pre-test to 42% post-intervention. While these examples are compelling, there may have been confounding factors associated with the duration of the intervention. There is a likely improvement in confidence without any intervention over a four month period, as previous studies (Lea & Cruickshank 2015) demonstrate that graduate nurse communication and competence improves over time. A randomised controlled trial would verify the alleged benefit of the intervention, with one group being exposed and the other completing the standard residency.

In their meticulous Hong Kong study, Law and Chan (2015) undertook a narrative inquiry to
examine the process of learning to speak up among graduate nurses. Graduate nurses (n=18) were subject to a process of inquiry inclusive of multiple unstructured interviews (12 months, 18 months, and 24 months post-graduation) and voluntary ongoing email conversations. The results were schematically represented as three distinct threads asserting that learning to speak up was a process that requires intense tuition: 1) The study questioned the effectiveness of superficial safety tools such as ISBAR, particularly when the low status of graduate nurses spoke louder than their assertions. Consequently, more comprehensive education was advocated for all health care professionals to facilitate cultural change so that graduate nurses will be heard. 2) Mentoring from others and self-mentoring was deemed essential to aid the “learning to speak up” process. It requires courage to speak up in an environment that values conformity, face-saving, and amicable work relationships. 3) Positive cultural change was advocated to create a safe space for graduate nurses to speak up on behalf of their patients (Law & Chan 2015). Reluctance to speak up in a different context was discovered by Lea and Cruickshank (2015), who conducted in-depth interviews with experienced registered nurses (n=16) in rural New South Wales. The registered nurses expressed concern that when graduate nurses were feeling apprehensive and anxious about fulfilling their role, they failed to speak up, i.e., “participants felt that new graduates in general actually needed support to seek support” (Lea & Cruickshank 2015, p. 2831). Seeking support was also deemed important in the “photo voice” study of resilience by Wahab et al. (2017). Taking control of emotions, self-motivation, and taking the initiative to seek help was reported as a strategy used by resilient graduate nurses in order to feel safe and not overwhelmed (Wahab et al. 2017; Cadavero et al. 2020). Intra-personal resilience in the form of psychological capital and personal job-fit were also positively correlated with career satisfaction in the large national Canadian survey by Laschinger et al. (2016).

Another significant contribution to the graduate nurse feeling safe and free of anxiety was the provision of copious amounts of formal feedback on performance. Unfortunately, Gardiner and Sheen (2017) discovered that it was not unusual for graduate nurses to receive minimal or inappropriate feedback throughout their graduate year. For some, this reflected a ward culture of bullying, “The feedback I received reflected the lack of support and bitchy nature of the ward” (Gardiner & Sheen 2017, p. 12), while others received little feedback at all. In their online survey of graduate nurses (n=107), Gardiner and Sheen (2017) found, when using a bivariate regression, a negative relationship between feedback and anxiety. A one-way analysis of variance showed that the degree of distress experienced by graduate nurses was directly related to the frequency and quality of feedback provided, i.e., graduate nurses provided with frequent and quality feedback were less anxious. Avoidance of graduate distress was deemed to require quality feedback which is planned, respectful, and appropriate with regard to time and place. For such feedback to be effective, it also needs to be labelled as feedback, and be objective, fair, based on evidence, and clearly provided by an assessor who has actually observed the graduate nurse in a supervisory
capacity (Gardiner & Sheen 2017).

Work place incivility was another challenge to feeling safe. Laschinger et al. (2016) found that graduate nurses in Canada felt safer than those in most other jurisdictions with regard to workplace incivility. However, uncivil behaviours from medical staff, senior nurses, and fellow workers remained a factor that significantly influenced outcomes for graduate nurses, i.e., burnout and emotional exhaustion. To mitigate against this phenomenon, the authors speculated that planned reduction in both incivility and disrespectful behaviours between staff at all levels would translate into a less hostile and more harmonious workplace culture (Laschinger et al. 2016). This need for mitigation against uncivil behaviours was reinforced by Wing et al. (2015) in another Canadian study which focused specifically on the state of Ontario, entitled ‘Violence prevention needs to target the attitude of experienced nurses towards young nurses, who should be respected and valued as important members of the health care team’ (Wing et al. 2015, p. 641).

The demands of nursing work environments are omnipresent for graduate nurses worldwide and in different forms. In the Philippines, Labrague et al. (2019) reported on the challenges of rural graduate nurses and the lack of support mechanisms and pressure of caring for a high caseload of patients. Staff were reluctant to provide assistance and expected them to hit the ground running. Lea and Cruickshank (2015) also discovered from interviews with experienced registered nurses (n=16) in New South Wales (n=14 health units), that skill mix and the demands of the rural environment precluded the graduate nurse from gaining effective support. The reasons cited were a lack of resources, lack of willingness to provide support, and lack of knowledge of the needs of graduates. Furthermore, the registered nurses from New South Wales informed the interviewers that the graduate nurse was at times left particularly vulnerable as the only registered nurse rostered “on” for the entire hospital, and therefore, “in charge” of an early shift or night shift accompanied only by enrolled/practical nurses. Laschinger et al. (2016) also asserted that a major contribution to incivility to graduate nurses in Canada was the tension and work life-imbalance arising from short-staffing and higher levels of patient acuity. Apart from the inherent psychological risks to safety, there were also many associated physical risks. In this first example, Oneal et al. (2019) discovered that every participant in their focus group study of graduate nurses (n=34) was challenged by their lack of experience with managing aggressive patients, and angry relatives and their friends. They were challenged by the associated threats which included lack of security and feeling vulnerable, such as when going to the car park at night, or by falling asleep while driving home after a night shift. Ever-present were the ergonomic risks from lifting patients, needle stick injuries, or manual handling of aggressive patients.

Preceptorship
There were three categories of significance for preceptorship synthesised from the research: firstly, the recommendation of adequate education for preceptors; recognition that preceptorship can be a
negative experience; and acknowledgement that preceptorship, where implemented effectively, can be an extremely effective support for the graduate nurse. The overarching revelation is that a health service with a preceptor program provides no guarantee of support for graduate nurses unless it is adequately resourced and fully supported by the nursing department.

**Education needs**

Education needs for preceptors were advocated for in a number of sources. In studies by Charrette et al. (2019) and Ziebert et al. (2016), there were similar findings of under-resourcing and a need for improved managerial support. Firstly, Charrette et al. (2019) completed focus groups in the French-Canadian city of Montreal with (n=19) informants. This 360° study was comprised of graduate nurses (n=4), nurse preceptors (n=2), clinical nurse specialists (n=9), and nurse managers (n=4). Overall, the group reported the need for a longer orientation that would cater to the needs of individual preceptors. In addition, some felt inadequately prepared and that further preparation would make them more effective. There were similar experiences in Milwaukee, Wisconsin, USA as reported by Ziebert et al. (2016), in which graduate nurses (n=118) were debriefed on three occasions in a 12 month longitudinal study. Informants were divided into groups (n=8-10) for debriefings on each occasion. The findings advocated for improved preparation for the role of preceptors and an emphasis on the allocation of additional time for preceptors to fulfil their educational role. Feedback on preceptor performance was lacking, and graduate nurse informants indicated that the opportunity to appraise preceptor performance would be helpful (Charette et al. 2019; Ziebert et al. 2016). A major concern for the studies of Charette et al. (2019), Wahab et al. (2017), and Ziebert et al. (2016) was the frequency with which individual graduate nurses were allocated multiple or absent preceptors on a shift-by-shift basis. Ziebert et al. (2016) asserted that without a dedicated preceptor, graduate nurses felt a lack of certainty with their educational development, causing severe compromise to the important relationship between support and learning.

**Negative effects**

In Tainan, Taiwan, Ke and Stocker (2019) conducted in-depth interviews with graduate nurses (n=20). The interview data were richly described, reporting the preceptors’ experiences of graduate nurses in-depth. It was clear in their study that preceptors can have a negative influence on graduate nurse self-esteem, particularly where graduate nurses have to prove themselves to gain acceptance or face being shunned (Ke & Stocker 2019). A not uncommon example illustrating the negative influence of a poor preceptorship relationship is the rich description provided by one graduate nurse, “I was mentored by a real jerk of a preceptor. She would ask me lots of questions and roll her eyes when I was unable to answer her” (Ke & Stocker 2019, p. 4325). Other preceptors would make the graduate nurse feel worthless and create “deep seated memories of bitter suffering” (Ke & Stocker 2019, p. 4325). Shaw et al. (2018) argued that such tension occurs in the preceptorship relationship when preceptors are forced into the role, causing graduate nurses
to intuitively feel the disharmony, whether there is overt hostility or not. Consequently, patient safety can be compromised; if the preceptor is particularly harsh in the event that a graduate nurse reports an error, it increases the likelihood that on future occasions, the graduate nurses will keep quiet to avoid reprimand (Ke & Stocker 2019). Paradoxically, it was reported that graduate nurses who advocate evidence-based practice or have better skills, can make the preceptor feel threatened, adversely affecting their relationship with the preceptor and their social acceptance on the unit (Charette et al. 2019). Striking the right social balance to not stand out is a difficult challenge for the graduate nurse. If there is an error of judgement by the graduate nurse, intimidation by preceptors is an unfortunate reality (Charette et al. 2019).

**Positive Effects**

Good preceptor relationships are a possible outcome for graduate nurses; however, preceptors require education, willingness, and available time to fulfil their role. They also need a leadership team that will schedule their shifts appropriately and support them. Some preceptors believe that it is often the personality of the graduate nurse that determines the outcomes with regard to the preceptor relationship (Shaw et al. 2018). However, where preceptors were invested in supporting graduate nurses, the relationship worked well (Ke & Stocker 2019; Charette et al. 2019).

Having a consistent and proper supervision is important. I am always attached to my preceptor…my main preceptor always seems to know my progress. Also my preceptor did debriefing and I think it was very good (Wahab et al. 2017, p. 47).

As a consequence, this investment usually resulted in overall positive outcomes for the graduate nurse, including improved social acceptance and relatedness on the unit (Ziebert et al. 2016; Wahab et al. 2017). Furthermore, in a large Canadian study of 400 informants, Laschinger et al. (2016) reinforced previous findings that most graduate nurses (90%) found preceptorship to be a significant factor contributing to their success.

**Discussion and recommendations**

Much of the international literature around the psychosocial factors associated with transition has focused on postgraduate experiences of transition to professional practice, rather than on purposive psychosocial preparation of nursing students for transition to practice. Are graduate nurses to be bystanders dependent on health units for provision of a supportive framework for success, or are they to be enthusiastic engaged actors who self-initiate and self-mentor? How do nursing students successfully transition to graduate nurse?
Figure 1. Relationship between categories and sub-categories

Figure 2. Psychosocial factors – graduate nurse “Wheel of fortune”?
This review has reaffirmed the current dependence of graduate nurses on health units when making the transition from student to professional registered nurse. This dependence contributes to the many associated feelings of fear on behalf of the graduate nurse. Fear of not “fitting in” or fear of threats to self when graduate nurses seek the assistance of staff was reaffirmed (Feng & Tsai 2012; Hamilton 2005). Failing to speak up due to lack of confidence, avoidance of shame from not knowing, or the anxiety of reporting an error were recurring themes (Malouf & West 2011; Pfaff et al. 2014). The repercussions of contravening any of the cultural norms on the ward or unit were also reconfirmed as a constant fear. Such fear was previously asserted by Feng and Tsai (2012, p. 2068), ‘Learning how to solve the gap between knowing and practising was easier than learning how to behave appropriately and to deal with people in the workplace’. International publications in this review provide further evidence that graduate nurses continue to struggle with self-esteem and feelings of inadequacy, i.e., graduate nurses were frequently overwhelmed by the many demands of their role and shift work, and the resultant social isolation during their initial transition phase (Ashton 2015; McCalla-Graham & De Gagne 2015; Pennbrant, Nilsson, Öhlén & Rudman 2013). To be accepted by senior staff was regarded as an important achievement, and understanding the social intelligence required to be effective during this stage was critical (Walker & Campbell 2013).

Consistent with the previous literature, this review found that the capacity of organisations to provide structural empowerment is quite variable and, as such, cannot be relied upon for graduate nurse transition experiences to be positive and orderly. More generally, there is a degree of chaos with some venues positing distorted and perverse cultural environments of bullying and harassment, and acceptance and non-acceptance (Deppoliti 2008; Duchscher 2012). Some organisations adopt structural empowerment as the leadership model; however, the principles of structural empowerment were not evident in the majority of the literature evaluated in this review. This review found that the settings involved in the various studies had cultural environments which subjected graduate nurses to emotional trauma, evidenced in part by poor communication with physicians, supervisors, patients, and their families (Duchscher & Myrick 2008; Pfaff et al. 2014). Rural transition for graduate nurses continues to be a topic of concern, as it was not uncommon for novices to be allocated responsibilities far beyond their experience capability. This reinforced ongoing patient safety concerns (Mellor & Greenhill 2014).

Positive cultural change is advocated for within health care organisations in this review; however, history strongly suggests that there is not likely to be a revolution or a miraculous transformation in the near future. The issues confronting graduate nurses appear to be predominantly ingrained in the unfortunate foibles of human nature, as the publications in this review consistently revealed that many graduate nurses attempting to find an avenue of support would encounter a ward culture that was unresponsive and hostile (Duchscher 2008; Deppoliti 2008; Berry et al. 2012). Workplace incivility and horizontal violence continue to be reported as a challenge for graduate nurses, often leading to burnout and exhaustion (Mellor & Gregoric 2016). Violence prevention was once again
Education of staff with regard to the needs of graduate nurses and preceptorship was frequently inadequate or non-existent and, as a result, transition programs did not provide a guarantee of effective clinical support (Mellor et al. 2017). Preceptors received little educational or administrative support to fulfill their role, with the consequence that role tensions between preceptors and graduate nurses continued to proliferate (Deppoliti 2008; Berry et al. 2012; Parker et al. 2014). While many preceptorship experiences were positive, it was not uncommon for health units to implement hybrid interpretations to minimise disruption to their routine administrative processes (Mellor et al. 2017). Some allocated multiple preceptors to individual graduate nurses, with the resultant effect of negating or diluting the principle of preceptorship as a learning partnership (Spector 2015; Cadmus et al. 2016; Figueroa et al. 2013). In another example, health units allocated graduate nurses a preceptor; however, due to limited resources or other organisational complexity, the preceptor and preceptee did not have the opportunity to work together (Mellor & Greenhill 2014; Mellor et al. 2017). As a consequence of not being observed or mentored by any one person, many graduate nurses were often anxious, as they received little guidance or feedback on their progress and performance (Parker et al. 2014; Mellor, Gregoric & Gillham 2017).

This integrative review has synthesised knowledge around the psychosocial factors that influence the graduate nurse experience of transition. A major finding is that graduate nurses have been prepared for dependency, and are not ready for the psychosocial trauma of employment in health care environments. While there were a small number of studies which considered the psychosocial dimension, the majority of articles focused on the need to acquire competency in clinical skills, time management, and prioritisation before graduation. Perhaps the most significant antecedent which has been overlooked in the context of transition to practice is the university narrative of preparing graduate nurses for the psychosocial realities of practice (Shinners et al. 2016; Theisen & Sandau 2016). There is an obligation to include the psychosocial perspective in the university curriculum (Mooney 2007; Berendonk et al. 2013; Mellor & Gregoric 2016). In summary, it is evident that many health care organisations do not provide consistent support, or any support at all, for graduate nurses. It is therefore contingent upon universities to comprehensively prepare graduate nurses for the transition experience in advance (Mellor & Gregoric 2016).

From an educational perspective, particular attention needs to be made with regard to the development of psychological capital in order to confront the challenges presented, reduce transition shock, and enhance confidence (Feng & Tsai 2012; Malouf & West 2011). The literature in this review reconfirmed that learning to overcome adversity and become resilient is an important self-support competency for graduate nurses (Thomas & Revell 2015). This includes learning how to adopt a stance of optimism and to reinterpret any obstacles or challenges with a positive mindset (Caldwell & Grobble 2013). Scaffolding elements supportive of psychological capital and
resilience were also reaffirmed, i.e., individual spirituality, a sense of moral obligation, and mindful professional responsibility (Lazar 2010; Mellor & Gregoric 2016). These scaffolding elements contribute to work engagement which is the state in which graduate nurses focus on their patients rather than on the challenges they face (Clendon & Walker 2012). By learning to manage this situated context, and not accepting failure as an option, graduate nurses can and have succeeded (Shinners, Africa & Hawkes 2016).

Consistent with the previous literature, it is important to advocate that full expression of the registered nurse role is essential when preparing nursing students for the realities of practice. When nurse education was based within hospitals, the author of this thesis personally recollects stating on the occasion of his graduation (1975) as a registered nurse, “we have been perfectly prepared to be students, but not registered nurses”. It appears that little has changed, as currently there is a significant differential known to exist between the nursing student role and the registered nurse role, when on clinical placement. A number of health care venues in this review unwittingly contributed to graduate nurses being unprepared by not allowing them to fulfil the complete registered nurse role as nursing students. This is not a new phenomenon, as also asserted by Winfred, Melo and Myrick (2009, p. 12), who stated that ‘a more accurate academic acknowledgement of the clinical world of nursing may decrease graduate nurses’ sense of anxiety inherent within the professional nursing role’ (Winfred, Melo & Myrick 2009, p. 12). Full expression of the registered nurse role includes relationship building within the inter-professional team and acquiring the important skills of relatedness (Ethridge 2007). Integration into the ward as part of the team, building rapport, effective handover skills, communicating via telephone, and managing the process of death and dying are some of the standards required. Building such relatedness is critical (Taylor 2012).

In summary, it is evident that health organisations are primarily solipsistic and not likely to provide consistent quality support, or any support at all, for graduate nurses. It is therefore contingent upon universities to comprehensively prepare graduate nurses for the transition experience in advance. Is it possible that research and knowledge around the transition from nursing student to successful graduate nurse could be encompassed in a self-support model? At the moment, the university sector and nursing students have the expectation that the health care system will provide effective and supportive transition programs. Does this expectation negatively influence the rigour of competency attainment at the undergraduate level? Have nurse teachers been seduced by the much politicised institutional marketing rhetoric of transition programs, and correspondingly adjusted the performance expectations of nursing students to a lesser standard? What effect does this paradigm have on both educational preparation from the perspective of the university and the mindset of nursing students during practicum? Are students less inclined to be proactive with seeking out clinical experiences to ensure they are competent because of the perceived transition to professional practice program safety net? While most nursing students were less inclined to be
proactive there were outliers. This review discovered that there was a minority of nursing students for whom self-efficacy and planfulness was a natural phenomenon. These students proactively sought out high quality experiences, or strategically altered their placements in order to achieve the required standards to succeed in their transition year.

From this and previous evidence it is therefore recommended that the research and knowledge around the transition to being a graduate nurse be encompassed in a self-support model.

It is therefore imperative that further research is undertaken to comprehensively revisit all of the essential standards nursing students should attain prior to registration. Apart from interviews with graduate nurses and staff, research should include a careful observational study in a number of settings to ensure that the nursing standards are a true reflection of the contemporary role of the graduate nurse.

In this review, a number of additional non skill-based competencies were identified as being essential, most of them psychosocial in nature. However, there are recognised challenges with non skill-based attributes which possibly contribute to the current curriculum deficiencies in this area. In contrast to skill-based competencies which ordinarily detail criteria that are easily recognised and easily assessed, non skill-based attributes, such as self-support or self-advocacy, are more complex to quantify. This is a recognised disadvantage of competency-based education.

... the psychometric approach is considered to be too reductionist for the assessment of higher order competencies, such as the ability to work in a team, professional behaviour, and self-reflection, which are increasingly deemed to be essential for medical professionals but cannot be meaningfully assessed detached from the authentic context (Berendonk et al. 2013, p. 560).

Research undertaken by Mellor and Gregoric (2017) identified knowledge around the transition to being a graduate nurse which could be encompassed in a self-support model. There was a number of strategies graduate nurses use to care and advocate for themselves located in the literature. As a consequence, a beginning “ways of being” model (Mellor & Gregoric 2016) denoting the socio-emotional competence required when deeming graduate nurses fit for transition to professional practice has been developed. Further research is recommended to identify the entire spectrum of attributes required in order to fulfil the expectations of registered nurse practice. The attributes that have already been identified include a focus on psychological capital and associated self-efficacy, self-advocacy, and relationship building through social intelligence, and emotional intelligence and hardiness. Such strategies to mitigate the emotional trauma and feelings of fear are important for the wellbeing and retention of graduate nurses, and are not only a gateway to success in the profession, but also lead to favourable patient outcomes (Mellor 2019).
CHAPTER 4. PUBLICATIONS

Chapter overview

Chapter Three provided a contemporary integrative review of the literature reaffirming that healthcare organisations are primarily self-serving, and the likelihood they will provide support for graduate nurses is minimal. An alternative ideation is proposed, with a focus on preparing nursing students for the reality of transition to professional practice. Proposals for change are advocated for which include further curriculum development in this important area. Chapter Four contains all the publications which emanated from investigation into the spectrum of factors and perceptions that have an impact on graduate nurses and their passage to competent professional nurse. Collectively, they address the following question, ‘How do nursing students successfully transition to graduate nurse?’ The findings of my research have revealed that graduate nurses are succeeding, not as previously assumed from the transition programs provided, but from other factors which are filling the gaps. It has been identified that the focus on transition programs has been misguided, as graduate nurses have initiated their own self-support, engaged in self-care, and actioned self-advocacy strategies. These strategies have been assembled conceptually and theoretically with recommendations made for change. An author statement and publication background explaining each co-author participation is provided as an introduction to each publication. Direct links to the publishers are provided together with the Digital Object Identifier number for each manuscript. Appendix 4 lists the minimum number of citations my publications have acquired. Appendix 5 contains the formal co-authorship approvals and confirmation of my contribution to each publication as attested by signature. The final chapter, Chapter Five, synthesises the publications as an aggregate; addresses the strengths and limitations of the underpinning research; discusses implications for practice; suggests further research; and finally, provides an overall conclusion to the thesis.

(Please see citation list of selected publications and original publications on the following pages).
List of selected publications


Publication 1. A patient safety focused registered nurse transition to practice program

Publication 1 emerged from my first study. It highlighted the inconsistent support for graduate nurses, the deficits identified, and the safety implications. Emerging is the beginning concept of the graduate nurse need to self-initiate and facilitate their own transition. My contribution to publication 1 as corresponding author is detailed below. (An authorship declaration is provided in Appendix 5).

Citation

Journal Impact factor: 1.3  Citations: 50  (See Appendix 4 for details)

Authorship statement and publication background
My first publication represents the not uncommon scenario that exists in which graduates are offered a transition program of support by an organisation. The graduate nurse accepts this offer of support, but soon becomes aware that a huge chasm exists between support (educational) and support (clinical). The results of study 1 (Mellor 2009), ‘The nature of professional support given to new graduate registered nurses in rural areas’, demonstrated that the nature of clinical support for graduate nurses was marginal. There were serious implications for patient safety and I was keen to have the results published. I therefore approached Professor Jennene Greenhill who was happy to assist as adviser, contributor, and co-author. The uniqueness of the approach was to frame the results, implications, and recommendations in the context of patient safety. It was felt that framing the results in this context would provide leverage with regard to improving the clinical support provided to graduate nurses.

Table 1. Three core elements of a transition program (Mellor & Greenhill 2014)

<table>
<thead>
<tr>
<th>Safety concerns of graduate nurses</th>
<th>Three core elements of a safe graduate program</th>
<th>Proposed graduate nurse support outcomes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Underprepared for practice</td>
<td>Clinical supervision</td>
<td>Oversight of practice</td>
</tr>
<tr>
<td>Overwhelmed and abandoned</td>
<td>Leadership support</td>
<td>Allocation of resources to facilitate clinical supervision and inter-professional support, e.g., Preceptors mirror, and rostered to work with, the graduate nurse</td>
</tr>
<tr>
<td>Need for clinical supervision</td>
<td>Inter-professional support networks</td>
<td>Preceptor and inter-professional relationships cater to the graduate nurse</td>
</tr>
</tbody>
</table>

Research design: The research design had an overarching grounded theory method (i.e., Glaser
1967; Glaser 1992) decided in consultation with Professor Jennene Greenhill. We traveled to conduct three focus groups throughout the rural areas of South Australia. Our aim was to elicit the nature of support given to graduate nurses in rural areas. Comprehensive detail of the research design has been provided in Chapter 1.

Data collection and analysis: After some consideration, it was proposed that a solution-focused approach be adopted to the safety concerns identified. I revisited the data and developed a patient safety narrative around three major categories from my research, –‘under-prepared for practice’, ‘overwhelmed and abandoned’, and ‘need for clinical supervision’. In response to the three categories and through further discussion with Jennene Greenhill, three core elements for an effective (i.e., safe) transition to practice program were developed.

Writing and editing: I wrote the first manuscript draft for publication with the title, “A patient safety focused transition to professional practice program”. In addition to the dialogue, I also designed all the figures (1, 2, & 3). I also approached the “Contemporary Nurse” who accepted my publication with the provision that I continue dialogue with the publisher and make the following adjustments:

- rewrite and update of the literature review
- adjustment to grammar and layout
- a greater emphasis on the international context/audience
- revisions of the discussion, methods, and ethics sections

As corresponding author, I was responsible for completion of the revision of each draft and making adjustments to the manuscript in response to the reviewers. At all stages of preparing this manuscript, I consulted and received helpful contributions and agreement from first co-author Professor Jennene Greenhill. A complete version of this publication is included on the following pages.
A patient safety focused registered nurse transition to practice program

Abstract
New graduate registered nurses (NGRN’s) have an expectation of clinical support as they make the transition from novice to advanced beginner. In this 2008-2009 study of three rural transition to practice programs we found that clinical support did not eventuate. Consequently, NGRN’s reported feeling underprepared for practice, overwhelmed by responsibility and often abandoned. Against this background, many were concerned that their inexperience had implications for safe patient care. Graduate nurse transition programs need to have the physical and human resources necessary to deliver the clinical support as promised in their prospectus, to ensure patient safety. This grounded theory study identified three essential core elements - leadership support, clinical supervision, and effective inter-professional relationships. Recommendation is made to address these deficits by mandating their inclusion in all transition to professional practice programs.

Key words: graduate nurse, transition, transition to practice, registered nurse, professional support, preceptorship, failure-to-rescue, patient safety, scope of practice.

Introduction and Background
Formal transition to practice programs for new graduate registered nurses (NGRN’s) have been provided for more than 70 years internationally in both metropolitan and rural areas (Spector & Echternacht, 2010a). The effectiveness of these programs is now being questioned and research is being undertaken regarding the nature of support actually provided.

Defining transition to practice as a period of adjustment
The focus of transition to professional practice programs in the past has been to assist the NGRN through a period of adjustment while they become a productive member of the health care team.

Transition to professional practice refers to the process of becoming a professional. It is a period of adjustment where the new graduate is required to bring together their theoretical and professional knowledge. (Department of Human Services – Nursing, 2004, p. 6)

While this is an Australian perspective, the focus on transition as a “period of adjustment” during which there is progression “from education to practice across all settings” is universal (Spector & Echternacht, 2010a).

Transition to professional practice programs— the reality of support
In my own practice as a registered nurse I have noticed that the reality of the transition to practice program for NGRN’s was often very stressful, with little clinical guidance provided and all too often patients are put at risk. Concerns about patient safety provided the stimulus to undertake research into the effectiveness of transition to practice programs for NGRN’s. Similar concerns are also evident in United States studies which propose that a national standardized transition program be
implemented by regulation to ensure a focus on patient safety. Regulation is seen as necessary because of the variable nature of support provided by existing transition to practice programs (Spector & Echternacht, 2010a; Spector & Suling, 2007).

Research question and methodology

The research question ‘What is the nature of professional support given to new graduate registered nurses in rural areas’, was undertaken as a substantive grounded theory study (Mellor, 2009) and is the source of data discussed. The underpinning belief was that a grounded theory study would enable the nature of support to emerge from the data (Glaser, 1967, 1992).

Literature Review

Transition from nursing student to registered nurse brings significant responsibility. The clinical environment is unpredictable which is different to that of being a nursing student. As a consequence, NGRN’s can experience high levels of stress as they attempt to provide safe care (Mills, Birks, & Hegney, 2010; Wu, Fox, Stokes, & Adam, 2012). Studies also reveal that new graduates, whether in rural or metropolitan settings, do not work with guidance and supervision from experienced registered nurses (Duchscher, 2008; Etheridge, 2007). Within transition to practice programs, Lea and Cruickshank (2005) discovered a significant difference between the nature of support promised and the nature of support actually provided by northern New South Wales rural health units.

The provision of a supportive environment with a focus on safe patient care is seldom stated as a goal in transition to practice program curricula. This may influence the low priority given to preceptorship within graduate programs (El Haddad, Moxham, & Broadbent, 2013).

In Australia, the National Competency Standards for the Registered Nurse were adopted by the Nursing and Midwifery Board of Australia (NMBA, 2008a) and like other registering authorities (NCSBN, 2007; Nursing & Midwifery Council, 2008; Nursing Council of Hong Kong, 2010) require that nurses only be registered when considered safe. For example, the National competency standards for the registered nurse (NMBA, 2008a, p.6) state that a registered nurse: “Provides comprehensive, safe and effective evidence-based nursing care to achieve identified individual/group health outcomes”. The Code of Professional Conduct for Nurses (NMBA, 2008b, p. 2) states: “Nurses are personally accountable for the provision of safe and competent nursing care. It is the responsibility of each nurse to maintain the competence necessary for current practice” and “Nurses are aware that undertaking activities not within their scopes of practice may compromise the safety of persons in their care.”

The assumption “they are registered so therefore they are safe” results in transition to practice programs that are not fully functional (El Haddad, Moxham & Broadbent, 2013). Consequently there is considerable variability in the level of clinical supervision of NGRN’s (Etheridge 2007; Lea &
In accordance with these leadership concerns, it is also well recognized that the scope of practice of the registered nurse in the rural context is extended, variable and more complex than that of their peers in urban areas (Francis & Mills, 2011; Mills, Birks, & Hegney, 2010; Ostini & Bonner, 2012). There are unique skills required in rural practice such as having to manage serious high speed motor vehicle accidents and farm injuries (Mills, et al., 2010). In addition, many rural hospitals do not have resident medical staff and NGRN’s in rural areas are often asked to work beyond their scope of practice (Lea & Cruickshank, 2007). Nursing duties of the NGRN often include undertaking a management role or being required to triage and initiate treatment for patients with life-threatening conditions in the emergency department, without support (Commonwealth Department of Education Science and Training, 2002; Lea & Cruickshank, 2007).

Benner has consistently emphasized the need for new graduate registered nurses to work with attending experienced staff (Benner, 2004; Benner, Tanner, & Chesla, 1996). Supportive inter-professional relationships, consistent feedback and a preceptor working closely with NGRN’s in the practice setting were identified as being essential (Boychuk Duchscher, 2009; Cubit & Ryan, 2010; NCSBN, 2012).

In fact, the most frequently reported reason for new graduates leaving their first position is related to stress associated with acuity of clients, unacceptable patient/nurse ratios, and feeling their patient care was unsafe (Hoffart, et al., 2011). New graduates are concerned about making mistakes and identify patient safety as an issue that needs to be addressed (Clare & Vanloon, 2003). Further research and advocacy for NGRN’s is needed to design and deliver transition programs based on evidence, leadership, supervision and support in the clinical environment (Levett-Jones & Fitzgerald 2005; Morrow 2009).

**Methods**

**Study Aim**

To identify the nature of support provided within transition to practice programs to NGRN’s in rural areas and identify the implications for rural health units, the community as consumers, the nurse education sector and nurse registration authorities.

**Setting**

This 2008-2009 study was conducted in health services in three different regions of South Australia. In Region 1 there were five NGRN’s originating from four rural hospitals, in Region 2 there were eight NGRN’s originating from five rural hospitals and in Region 3, eight NGRN’s originating from five rural hospitals. These 21 participants therefore represented 14 rural hospitals over a radius of 200 km (125,000 km²). All hospitals offered acute inpatient services, had visiting
specialists and provided outpatient and 24-hour emergency services. All of the hospitals represented were from rural towns with medical services provided on an “on-call” basis. Acute bed numbers ranged from 11 to 56 beds with a mode of 22 acute beds per hospital. The remoteness of the hospitals within regions was consistent with few exceptions. For some hospitals there was only one registered nurse on duty after hours, with staff “on-call” if needed.

Sample/Participants

Participants were NGRN’s, a purposive sample, located through consultation with the transition to practice program coordinators in the three designated rural regions. All participants had almost completed their 1-year transition to practice program. In order to maximize participation and minimize disruption to the participants it was negotiated that focus groups would be held on the final study day of each of the three transition to practice programs. All of the NGRN’s consented to participate. In group 1 there were five participants, in group 2 there were eight participants and in group 3, eight participants. The commitment of time was approximately 1 hour per focus group.

Study Tools

The focus group method was chosen as it is particularly suited to groups such as nursing and has been used successfully to explore the experiences of NGRN’s (Newton & McKenna, 2007). In this study the participants were NGRN’s from three different regions of rural South Australia. There were two experienced facilitators for each focus group thus enabling recursive enrichment of the data and writing of field notes (Kidd & Marshall, 2000).

Data Collection

Focus groups were conducted using recommended strategies to minimize possible facilitator influence on the data collected (Fern, 2001; Taylor, Kermode, & Roberts, 2007). Preservation of independent responses was critical to ensure validity of the data. As facilitators we also ensured that each group member participated and that reluctant participants were encouraged (Taylor, et al., 2007). The focus group questions were open ended and encouraged dialogue.
How have your experiences been as a new graduate registered nurse?

Remember a time when you felt assisted and supported as a new graduate registered nurse and felt good about it. Can you tell us of your experience?

Remember a time when you were concerned or anxious when working with a client and felt unsupported. Discuss your concerns.

What was different in the two situations? Where were you working? Who were you working with? Did you have a preceptor to assist you?

Suppose a miracle happened overnight and you found yourself in the ideal graduate nurse transition program. What would it be like? What are the most important ways that new graduates can be helped?

Figure. 1 Focus group questions

Further credibility was provided by focus group members drawing upon authentic recent experiences. Inaccuracies or exaggerations were moderated by the group to ensure trustworthiness of the information provided. Each focus group was facilitated in a room free of distraction; quiet, uninterrupted and away from the workplaces of all participants. The rooms were comfortable, including the seating, lighting and temperature. All groups had refreshments available. Focus group 1 was held in the lecture room of a community centre, focus group 2 was held in the function room of a small convention centre, and focus group 3 was held in the lecture room of a participating health service.

Data analysis

To ensure confirmability, the transcribed data from the focus groups was processed using QSR Nvivo 7 software which enabled an audit trail. It also provided dependability as a vehicle for grounded theory analysis. The facility for making memos made possible constant comparative analysis and the transparent development of categories or concepts. The concepts were linked to each of the coded texts and the QSR Nvivo 7 software enabled the relationships to be made between variables to create a concept map. Themes also were cross-checked with the co-facilitator to ensure dependability. Please see the example of thematic analysis provided below.
Ethical considerations

Approval to conduct this research was sought from the Social and Behavioural Research Ethics Committee of Flinders University, Adelaide, South Australia before any approach to participants was made. Approval was obtained in accordance with the requirements of the National Statement on Ethical Conduct in Human Research. Written approval was also sought from the Directors of Nursing of regional health units and their individual ethics committees as required. Transition to practice program coordinators were consulted for assistance with the practical aspects of conducting the focus groups. Focus group participants were then provided with an introductory letter providing authority from the university and ethics committee. They were also supplied with the focus group questions and a confidentiality agreement to be signed. Participants were given adequate time to consult with others, as appropriate, about their decision to be part of the study.

Confidentiality was important so that participants would provide the richness of data desired, namely their true feelings, beliefs and points of view (White & Thomson, 1995). Participants were advised that it was each person’s responsibility to maintain confidentiality; they could withdraw from the focus group at any time, and decline to answer any questions. They were also advised of the recording of the focus group and how the recording would be secured. Pseudonyms were assigned to protect the identity of participants following transcription (Newton & McKenna, 2007).

In focus groups, participants reveal information to other participants and not only to the facilitator(s), which means there are not only privacy concerns but also stresses due to the group dynamics of interaction. As such, facilitators discussed the need for confidentiality and continuously monitored the stress level of each group. A debrief opportunity was provided at the end of each session. The overall goal was avoidance of any harm, risk or wrong being imposed on
participants (Smith, 1995).

Findings
This paper reports on three major themes that emerged from this study - “under prepared for practice”, “overwhelmed & abandoned” and “need for clinical supervision”. These findings were interpreted within a risk management framework (Benner, 1984; Johnstone & Kanitsaki, 2006; TeamSTEPPS Instructor Guide, 2006) and had patient safety implications. The participant’s comments illustrate their concerns.

Underprepared for practice
This theme was present throughout the focus group discussions illustrated by the NGRN’s struggle with transferring theory into practice (Ostini & Bonner, 2012). The following challenges were identified with regard to preparation as an undergraduate:

- Expectations of the role of student were much different to that of registered nurse.
- Prioritization of care was difficult to practice.
- Participants reported that on clinical practicum they were able to focus on individual tasks and with an ideal number of patients/clients. Opportunity to provide total patient care to a larger number of clients, and all of the other aspects of the registered nurse role was not provided.

Other aspects of the role includes multitasking, for example, answering the telephone, addressing security incidents, managing patient safety incidents, attending accident & emergency all at the same time and meanwhile being responsible for prioritizing the care for a group of patients on the ward.

When you trained in a city hospital a third year student has to take four patients…I've had fifteen…with an EN, dealing with outpatients and the phone and everything. (JA)

Participants reported that as students on clinical practicum they rarely had the opportunity to practice the role of team leader, yet this was a frequently reported expectation, very early in the first year of practice. They also found that organization of the interdisciplinary team was part of the new graduate role. As a consequence, new graduates reported the need to develop skills to have a whole of health service perspective in unpredictable environments:

That's the same …I've had a shift …well…many a shift where I've been Team Leader…one classic example was…we always have an RN on…she got called to the labour ward….we had a girl in labour….then we had a woman come in who had to be sectioned…so I had to organize a team to come in to do the section…so it was just the EN and I…for a ward full of twelve or thirteen patients. (AL)

The above is an example of how a new graduate was required to prioritize patient care and contact the 'on call' team for the operating room so that a caesarian section could be performed. The skill
of adaptability, leadership, situational awareness and the ability to work independently was required (Ostini & Bonner, 2012). Situational awareness requires timely and expert clinical skills to assess the relative acuity of each patient and adjust priorities in accordance with the human and material resources available. These skills are essential to ensure patient safety. Where support with development of situational awareness is lacking the NGRN’s would feel overwhelmed and abandoned.

Overwhelmed and abandoned

In the focus groups NGRN’s reported that they were expected to work on their own or ‘step it up’ at a very early stage in their practice, which could be as early as two months after registration as a nurse. It was also reported that promises such as preceptorship, workplace orientation, feedback and other support strategies did not eventuate (Lea & Cruickshank, 2005). The leadership support issues were identified and include the following:

- Orientation to the health unit did not occur
- The new graduate registered nurse often had to work alone.
- There were systems failures such as having an unreliable “on-call” procedure.
- Preceptors were not prepared for their role or did not fulfill their role.
- Little feedback on performance was provided.
- Systems were not in place to facilitate the preceptor role. For example, the NGRN and preceptor were not allocated shifts where they could work together or debrief.
- There was abandonment reported in an inter-professional context.

The following three scenarios provide evidence of the leadership support issues:

Scenario 1

The NGRN is not only working alone, but also finds that nurses designated to be “on call” were not accessible when contact was attempted. In this instance the network of support has diminished.

"There needs to be an “on-call”… a name and a number for weekend “on-call” at all times, I have rung that number, fortunately not for an emergency… and “sorry didn’t get your phone call, when did you ring me?” Two hours ago! Glad I didn’t need you in a hurry because I haven’t got any other RN in the building with me. I’d like to be more confident that firstly, I had an “on-call,” and second the “on-call” was available at all times." (FR)

Scenario 2

The NGRN is not able to work with the preceptor as the staff allocation processes are not in place for this to occur. Here it is also evident that novices are working together instead of with more experienced nurses, hence errors or omissions may be overlooked which limit safe patient care.
I have had very little if any, in fact zero contact with my preceptor, because she’s too busy doing what she’s doing in her role. And just short staffed…and so I’m not criticizing the person….she’s a world of knowledge but just physically hasn’t had the time to come and see, in passing she’d ask if I was going Ok. But I think you need to be put on shifts with that person and that person needs to have some experience not just a graduate. (TA)

Scenario 3

The following scenario illustrates that effective interprofessional relationships are essential to ensure patient safety. This experience was reported as traumatic and the new graduate reported problems coping with these memories when later confronted with patients who presented with similar circumstances surrounding their admission.

And there happened to be another doctor walking in the ward at that time and I said “could you come and see this patient for me I need help! …and he did not realize the significance of it at the time and he said “ No I can’t”….because of the system and how it is… you need to get the duty doctor and it wasn’t his patient and well the man was arresting…the doctor actually looked in and said this man is arresting…the whole experience afterwards … I felt like the whole world was on my shoulders and I cried… because I tried to get someone [a doctor] who I thought would help me but then NO that didn’t happen… (JN)

Need for Clinical Supervision

New graduates expressed the need to learn about quality and safety in clinical practice (Johnstone, Kanitsaki, & Smith, 2004; Johnstone & Kanitsaki, 2006; Spector, 2011) from the beginning of their careers:

• They were keen to adopt evidence-based practice and have guidance while they developed as a professional nurse.

I’d rather be told I’m doing something wrong and know that that’s not the way to do it…this is how you should do it, rather than keep on doing something the wrong way …and then someone just goes off at you one day because you’ve been doing something wrong for six months. (LE)

• Others expressed concern, that they were placed in situations that required skills beyond their level of education and experience. The NGRN in this scenario, when stating “not having really any clue what I was doing”, is also working outside of her scope of practice and has no apparent voice to alter the situation.

I’d be looking after high dependency patients and [a lot of emotion here] just not having really any clue what I was doing and like just managing to get through without killing people… that’s what I kept thinking at the end of the shift. “I didn’t kill anyone today…it’s been a good day let’s get through it. (MA)

• NGRN’s stated that they do not possess the skills or experience to practice without supervision at such an early stage of their nursing career. There is a high level of anxiety about making serious errors in clinical practice. The NGRN’s were keen to have experienced registered nurses work alongside them and were frustrated that this did not happen as promised.
How can they support you and give valuable feedback if they don’t work with you, you could go through the whole year and develop bad practices and just flounder your way through, but if you have got a good preceptor they can actually point out…this is something you might need to work on…and they are not going to get that from sitting in their office. (JE)

Discussion

NGRN’s reported that they were underprepared for the realities of clinical practice. Workload demands and decision-making requirements changed dramatically after registration and NGRN’s did not consider themselves to be workplace ready, confident and competent. It was an expectation of managers that NGRN’s would be left in charge of a ward or department and in some instances the entire hospital with just an “on call” number to ring. Leadership support is required for the NGRN’s during transition to professional practice. Hence, the first core element identified is the need for purposeful leadership that entails the provision of a network of support (Lea & Cruickshank, 2007; Spector, 2011) to both scaffold the new graduate and ensure safe patient care.

Abandonment of the NGRN was apparent with little evidence of support networks. Coping without a preceptor, and little feedback on practice, is fraught with danger because the NGRN that is unsupervised adopts “trial and error” as a means to cope (Spector, 2011). There is evidence that NGRN’s have continued to practice unsafely for long periods (Orsolini-Hain & Malone, 2007; Spector, 2011) because there was no guidance provided. In a previous study (Bjørk & Kirkevold, 1999), four nurses were followed for up to 14 months as they performed dressing changes on new post-operative surgical patients. The nurses reported that they had improved their skills and were now more confident and competent. However, analysis of their practice showed no difference in outcomes for the patient throughout the study period. For example, wounds were still being contaminated and wound drains unsafely removed.

Patient’s lives may be lost unnecessarily because the NGRN is unable to identify pre-arrest or failure-to-rescue scenarios (Ashcraft, 2004). According to Kolb (1984) when adopting a new role the novice (new graduate registered nurse) has the challenge of relating theory to practice through active experimentation. This involves processing previous learning through reflection, adding new knowledge from experience, integrating this into pre-existing concepts and make sense of the experience (Kolb, 1984). The intensive process of interpreting and contextualizing knowledge makes the NGRN vulnerable. Oversight of the NGRN during the early stages of practice development by an expert nurse, one who has the capacity to anticipate and act in the event of possible complications, reduces the likelihood of adverse outcomes for patients (Ashcraft, 2004; Thompson & Yang, 2009).

Supervision of the novice nurse by an experienced nurse is therefore critical to ensure safe effective care. Internationally, there is evidence that, when formally implemented, preceptorship programs, are successful in facilitating the transition of new graduate nurses (Dracup & Bryan-
The potential to “fail to intervene” is significant when the new person is unsupported, stressed and uncertain. Stress and anxiety alone can compromise the NGRN's decision-making (Benner, 2004b; Lea & Cruickshank, 2007; Spector, 2011; Spivak, Smith, & Logsdon, 2011). It is customarily believed that the novice/advanced beginner will know when to get assistance when a patient deteriorates however this is not supported by the evidence (Ashcraft, 2004). In this study, the findings also provided evidence that there was uncertainty, apprehension and misunderstanding with regard to role relationships. Relationships with medical staff were not clearly defined and there was a need to facilitate an inter-professional culture of support (Schoesler & Waldo, 2006)

Developing inter-professional support networks is essential to building capacity in the new graduate. Relationship development will also facilitate situational awareness, patient advocacy and comprehensive care planning in a collaborative context (Dougherty & Larson, 2005; Spivak, et al., 2011; Weller, Barrow, & Gasquoine, 2011)

Nurse-physician collaboration is a key factor in nurse job satisfaction, retention, and job valuation. Decreased risk-adjusted mortality and length of stay, fewer negative patient outcomes, and enhanced patient satisfaction have also been associated with better nurse-physician collaboration. (Dougherty & Larson, 2005, p. 244)

**Three core elements for an effective transition to practice program**

Three core elements of a transition to practice program that ensure patient safety and develop situational awareness are 1) leadership support, 2) need for clinical supervision, and 3) development of interprofessional relationships. These three core elements need to be implemented for a transition program to be effective.
Implementing the recommended three core elements of the transition to practice program will assist novice registered nurses to work within their scope of practice. When NGRN’s report feeling overwhelmed or feel an activity is beyond their capacity they should be able to voice these concerns and also have them acted upon.

Nurses are accountable for making professional judgments about when an activity is beyond their own capacity or scope of practice and for initiating consultation with, or referral to, other members of the health care team. (NMBA, 2008a, p.6)

Issues of empowerment were evident as new graduates in this study did not appear to have a voice with regard to their scope of practice concerns. These concerns have implications for nurse registration authorities with regard to public safety and need to be addressed (El Haddad, et al., 2013; Wu et al., 2012).

**Limitations and recommendations for further study**

This study was undertaken in South Australia and represents the transition experience of new graduate registered nurses from three clusters of rural hospitals. Each of the rural hospitals had unique characteristics that defined them and this may have implications with regard to transferability of the findings. Other limitations include the lack of opportunity for focus group participants to verify our interpretations and thematic analysis.

Two recommendations have been determined for further study. The first is to undertake further study of new graduate transition and the implications for patient safety; the second is to investigate the reasons why the three core elements, so essential to transition to practice programs, are not routinely implemented.

**Implications for nursing**

In an international context there needs to be a major shift in policy when providing transition to practice programs to NGRN’s in rural areas. It is imperative that rural health services that intend to offer places to NGRN’s have the resources available to deliver the essential three core elements of a transition to practice program - the need to mandate clinical supervision; the need for leadership support and the need for development of interprofessional support. It is also recommended that nurse registering authorities reflect on these three core elements and make a commitment to public safety by mandating that NGRN’s have appropriate support and work within their scope of practice. This will ensure patient safety and an effective, sustainable rural health workforce (El Haddad et al., 2013).

**Conclusion**

The historical focus on graduate nurse transition as a “period of adjustment” understates the implications for patient safety. This study ‘the nature of professional support given to new graduate registered nurses’ emphasized the need for transition programs to have a focus on patient safety.
Participants reported there was often a significant difference between the support promised in formal transition to professional practice programs and that actually provided. Secondly, NGRN’s found they were disempowered or did not have a voice to address their scope of practice concerns. There were few places for them to turn to have these concerns addressed when they felt out of their depth, contrary to the expectations of nurse registration authorities. An effective transition to practice program is an attainable goal if the three core elements identified in this study are implemented: leadership support, clinical supervision, and effective inter-professional relationships. Further research by nurse registration authorities toward developing a regulatory model for transition to practice within an international framework is recommended. Regulating the three core elements of a registered nurse transition to practice program may be essential.

References


This publication emerged from study 2: A Critical Review of Transition-to-Professional-Practice Programs: Applying a Standard Model of Evaluation. The critical review findings revealed that the components of transition programs are under-resourced, variable, and unreliable in their expression. My contribution to publication 2 as corresponding author is detailed below. (An authorship declaration is provided in Appendix 5).

Citation

Journal impact factor: 0.7 Citations: 3 (See Appendix 4 for details)

Authorship statement and publication background
I was project champion for this study which began at the Flinders University Rural Clinical School (Riverland SA) in consultation with Professor Jennene Greenhill. Lucy Atkinson was also engaged as the first research assistant. In the initial stage, a starting catalogue of transition programs and their components was compiled, together with Lucy Atkinson’s reflections on the findings. However, due to changes occurring in 2013-2014 for myself and Lucy Atkinson, the project was left in abeyance. In the subsequent phase of development, there was a marked change in direction; however, portions of Lucy Atkinson’s reflections were used in the final publication and acknowledged by her designation as second co-author.

As a consequence of my change to the Flinders University (Adelaide campus), I revisited this project in 2016 with a renewed sense of purpose. After further consultation with Professor Jennene Greenhill, it was decided to complete an evidence-based critical review through enacting the Kirkpatrick Model of Evaluation: a standard model of evaluation used for appraisal of education and training programs. This evidence-based model had previously been used for evaluation of medical programs and was an appropriate method for this review. This valuable contribution to the research design designated Professor Jennene Greenhill to be third co-author. As a consequence of this new context, I undertook a further review and reassessed the inclusion criteria, excluding articles published prior to 2010. Dr. Carolyn Gregoric also reviewed the publication drafts as detailed below, and this collaboration designated her as second author.

Research design: I was primarily responsible for writing up the three research design elements: the literature search criteria/results (Figure 1), and the risk of bias criteria and description of the contextualised Kirkpatrick Model of Evaluation (Table 2). Further detail of the overall process is
provided in Chapter 1.

Data collection and analysis: I designed the literature review inclusion/exclusion criteria for Table 1. Secondly, I drafted the results (Table 3) and analysis sections in accordance with the Kirkpatrick Model of Evaluation review criteria. The limitations and conclusions sections were also drafted by myself. Dr. Carolyn Gregoric also provided valuable feedback and perspective with regard to the analysis, table designs, and inclusions.

Writing and editing: I wrote the initial draft, figures, tables, and subsequent drafts as corresponding author of the article, and was responsible for attending to the adjustments as requested by the Journal of Nursing Regulation. Editing and adjustments were primarily undertaken in consultation with Dr. Carolyn Gregoric in her capacity as research assistant and close collaborator. The manuscript was also provided to the other co-authors for contributions and suggestions with regard to editing at each stage of review and revision. Each had their part to play in providing a comprehensive document that reflected rigorous research. A complete version of this publication is included on the following pages.
A Critical Review of Transition-to-Professional-Practice Programs: Applying a Standard Model of Evaluation

Abstract

Introduction: Although transition-to-professional-practice programs (TPPPs) for newly graduated registered nurses are considered beneficial, no consensus exists about their ideal components. Thus, evaluating the effectiveness of TPPPs and identifying the components that strongly influence outcomes is important. Aim: The aim of this critical review was to demonstrate the usefulness of applying the Kirkpatrick model to evaluate the effectiveness of TPPPs. Methods: A review of the literature between 2010 and 2016 was conducted, and TPPPs were assessed using the Kirkpatrick model for evaluating educational outcomes. Additionally, all selected studies were analyzed for risk of bias in reporting results or inferences claimed as a consequence of new registered nurse participation in a TPPP. Risk of bias was designated as high, medium, or low. Results: The database search identified 86 studies, and 26 met the inclusion criteria for critical review. Based on their analysis, the authors found that TPPPs are often evaluated by their respective organizations, not by an independent body. Therefore, most study findings reported that TPPPs achieve their aims, but the analysis revealed a high risk of bias in those findings. Conclusion: The Kirkpatrick model revealed a high risk of bias in the reporting of TPPP outcomes, indicating a need for evaluations based on rigorous research.

Despite the significant need for new graduate registered nurses (RNs) (World Health Organization, 2017; RCN Labour Market Review, 2016), the advanced beginner status of new graduates raises concerns about patient safety (Clarke & Donaldson, 2008). Employers may perceive new graduate RNs as unprepared to provide safe, effective patient care (Spector & Li, 2007). Furthermore, the clinical environment is unpredictable, and new RNs can experience reality shock as well as a high level of anxiety about making errors in clinical practice (Mellor & Greenhill 2014; Kramer 1974). Stress and anxiety alone can contribute to poor decision making (Benner, 2004; Lea & Cruickshank, 2007; Spector, 2011; Spivak, Smith & Logsdon, 2011).

Transition-to-professional-practice programs (TPPPs) can help new RNs and the organizations they serve. However, no consensus regarding the ideal components or interventions of TPPPs exists (National Council of State Boards of Nursing [NCSBN], 2013; Rush, Adamack, Lilly, & Janke, 2013; Strauss, Ovnat, Gonen, Lev-Ari, & Mizrahi, 2016; Tuckett, Eley & Ng, 2017). Some TPPPs provide educational activities and no other supports (Kaddoura, 2010). Others are intricately designed with elaborate networks of tangible and intangible supports for new nurses (Kawolski & Cross, 2010; Kramer, Lindgren, High, Ocon, & Sanchez, 2012). Therefore, evaluating the effectiveness of TPPPs and identifying the interventions that have a stronger influence on outcomes is critical.
In 2011, the NCSBN responded to documented concerns about patient safety and lobbied for completion of a TPPP as a requirement of re-licensure after the first year of practice (Bratt & Felzer, 2011). NCSBN (2013) collaborated with 35 organisations to develop a transition-to-practice (TTP) model. Then, a multisite, randomized comparison of existing TPPPs with the NCSBN TTP model was undertaken. Although the results were insufficient to promote the NCSBN requirement, they provided evidence that high-quality, evidence-based TPPPs have a beneficial effect on new RN safety outcomes (NCSBN, 2013).

Critical Review of Programs
For many years, TPPPs were used without routine impartial evaluation (Rush, Adamack, Lilly, & Janke, 2013; Parker et al., 2014; Edwards, Hawker, Carrier, & Rees, 2015). Today, with resources declining internationally, ensuring learning effectiveness is essential (Morgan & Astolfi, 2015). Thus, the aim of this critical review was to demonstrate the effectiveness of using a standard model of evaluation, the Kirkpatrick model, to evaluate TPPP interventions and program outcomes.

Literature Search
An initial search was conducted using the term “graduate nurse program.” Additional keywords plus subject headings were identified from the titles and abstracts of the retrieved articles. Next, a formal search of the academic literature was conducted using all permutations of the identified synonyms for “graduate,” “nurs*,” and “program.”

CINAHL, Science Direct, Google Scholar, Medline, Science Citation index, Social Science index, Informit, and Proquest were searched for articles published between 2001 to 2016. Keywords were as follows: graduate OR neophyte OR "newly registered" OR novice OR transition OR "transition to practice" OR TTP AND nurs* AND [program OR residency OR mentorship OR preceptorship]. The search yielded 43 full-text articles, which were assessed for eligibility (n = 43); however, the authors decided to provide a more contemporary view by excluding articles from before 2010 (N = 26). See Figure 1.
Studies were included if the participants were new graduate RNs. Articles were reviewed using the title only and retrieved if they were descriptive accounts or evaluative accounts or if they reported the lived experience of graduates in any aspect of a program. These articles were considered most likely to yield sufficient detail about the elements of the graduate program to contribute to the review. Articles were included if they were primary research reports of programs aiming to assist transition from undergraduate nursing education to professional nursing practice (See Table 1).
Table 1. Inclusion-Exclusion Criteria for Literature Search

<table>
<thead>
<tr>
<th>Included articles</th>
<th>Excluded articles</th>
</tr>
</thead>
<tbody>
<tr>
<td>Published in or after 2010</td>
<td>Published prior to 2010</td>
</tr>
<tr>
<td>Published in the English language</td>
<td>Published in a language other than English</td>
</tr>
<tr>
<td>Academic Journals</td>
<td>Non – academic journals</td>
</tr>
<tr>
<td>Abstract available</td>
<td>Abstract not provided</td>
</tr>
<tr>
<td>Described programs that aimed to facilitate the transition from nursing student to registered nurse.</td>
<td>Described programs that aimed to facilitate transition of experienced nurses to new areas of practice.</td>
</tr>
<tr>
<td>Programs implemented following graduation</td>
<td>Programs aimed at improving transition to RN, however participants are students and not registered nurses</td>
</tr>
<tr>
<td>Formal transition programs implemented within an organisation</td>
<td>Programs implemented only for the purpose and duration of a research study</td>
</tr>
</tbody>
</table>

**Critical Review of Programs**

For many years, TPPPs were used without routine impartial evaluation (Rush, Adamack, Lilly, & Janke, 2013; Parker et al., 2014; Edwards, Hawker, Carrier, & Rees, 2015). Today, with resources declining internationally, ensuring learning effectiveness is essential (Morgan & Astolfi, 2015). Thus, the aim of this critical review was to use a standard model of evaluation, the Kirkpatrick model, to evaluate TPPP interventions and program outcomes.

**Evaluation of Programs**

Program characteristics, including the location of the TPPP, duration, follow-up, and educational strategies, were recorded to provide context. In accordance with the aims of this review, analyses for both educational outcomes and risk of bias were undertaken to determine the rigor of the individual studies and the reliability of the evaluations.

**Educational Outcomes**

For more than 40 years, the internationally recognized Kirkpatrick Model of Evaluation (Kirkpatrick & Kirkpatrick, 2006) has been used to evaluate educational and training programs (Galloway, 2005). The model allowed for reported outcomes of each TPPP to be aggregated and analyzed according to four progressive levels of evaluation. Regarded as an appropriate model for transition programs, the Kirkpatrick model was recently used in the construction and implementation of a comprehensive evaluation plan for the Wisconsin Nurse Residency Program (Meyer Bratt, 2013)

The four levels of evaluation are as follows (Table 2):

1. Reaction: Studies measure new graduate RNs’ views of the learning experience,
organization, presentation, content, teaching methods, and quality of instruction.

2. Learning: Studies consider the extent of learning. Level 2A refers to learning measured with regard to changes in the new graduate RN’s attitude, and level 2B refers to learning measured with regard to the new graduate RN’s knowledge and skills.

3. Behavior: Studies report changes in the new graduate RN’s behavior resulting from the TPPP.

4. Results: Results are reported as changes in organizational climate (level 4A) or improvement in the new graduate RN’s performance (level 4B).

Some consider the four-level model too simplistic (Bates, 2004). Also, concern exists regarding the subjective nature of levels 1 and 2 as well as claims that the model does not include contextual influences when assessing the transfer of behavior or skills to the workplace, such as the learning culture of the organization (Bates, 2004; Galloway, 2005). However, the revised Kirkpatrick model (2006, p. 24) that was released after these critiques describes five different types of organizational climate or contextual influences on learning outcomes: preventing, discouraging, neutral, encouraging, and requiring. After careful consideration of the evidence and commentary available, the authors believed that the revised Kirkpatrick model is an appropriate contemporary tool for analysis.

**Risk of Bias**

Because of the high level of self-reporting by TPPP providers, potential bias in evaluations must be considered. *Risk of bias* in this article refers to any systematic error in the results or inferences claimed as a result of new RN participation in a TPPP (Higgins & Green, 2011). The assessment of risk of bias has been designated as high, medium, or low (Table 3). A high-bias study typically presented self-reported results with minimal evidence of objective inquiry or had another aspect that affected the rigor or results. Conversely, a low-bias study showed more evidence of rigor, and the reported findings were considered more accurate. These distinctions are important if future TPPPs are to be developed based on the best available evidence.

Consequently, each study was assessed for risk of bias to determine the quality of the research against recognized criteria for both qualitative and quantitative studies. The risk of bias in qualitative studies was assessed using Law et al.’s critical review form for qualitative studies (1998a). Criteria included study purpose, literature relevance, study design, theoretical perspective, methods used, sampling, data collection integrity, procedural rigor, data analysis, auditability, theoretical connections, overall rigor, conclusions, and implications. Quantitative studies were analyzed using Law et al.’s critical review form, for quantitative studies (1998b). Criteria included study purpose, literature, design, sample, outcomes, analysis and results, conclusions, and implications. For both the Kirkpatrick evaluation and the assessment of bias, the
authors undertook initial analysis independently; when differences arose, the authors resolved them through consultation and consensus.

**Results**

A total of 86 studies were identified from the database search, and 26 articles met the inclusion criteria. Studies were primarily conducted in the United States (n = 18). Two were conducted in Australia, and two in the United Kingdom. One study was conducted in each of the following: Brazil, Canada, Saudi Arabia, and United Arab Emirates. Extensive variation was noted regarding the specialties in which TPPPs occurred. The majority were in acute care environments, such as surgical, medical, emergency, and critical care, the operating room, and the recovery room (Beyea, Slattery & von Reyn, 2010). The TPPPs were in large metropolitan hospitals or small rural hospitals (Bratt & Felzer, 2011).

Of the 26 studies, 8 evaluated their TPPPs on all levels of Kirkpatrick's model, and 23 reported changes in new RNs' behavior (level 3). The results of training (level 4) are also frequently reported, with 23 studies analyzing change in the organizational climate (4A) and 23 studies considering new RN outcomes (4B). Attitude and level of confidence (level 2A) was assessed by 15 studies, and knowledge and skill acquisition (level 2B) was assessed by 21 studies. This acquisition included elements of professional knowledge development, clinical competence, and critical thinking. The reaction of participants to the training (level 1) was considered by 17 studies. Three studies had a control group.

Change of behavior was reported in 23 studies and related to observed professional socialization, professional competency, confidence with nursing skills, socialization, and willingness as part of the team. Of the evaluated studies, 21 (83%) reported a positive result from their educational interventions, and 5 (14%) achieved mixed or variable results in achieving desired goals. In 12 studies (43%), follow-up did not occur. In studies with follow-up, the time varied from 6 months to 5 years. In 4 studies (15%), follow-up was 6 months to 9 months; in 6 studies (23%), follow-up was 1 year. Individual programs had follow-up at 18 weeks, 4 months, 2 years, and 5 years. Most follow-up focused on retention in the workforce and factors affecting attrition.

Study design provided context to the evaluations. High risk of bias was found in 10 studies; medium risk of bias was found in 6 studies; and low risk of bias was found in 10 studies. Those studies with a high risk of bias reported outcomes of their programs as being very successful, were non research based, and were more closely aligned with continuous improvement. Conversely, in studies with a lower risk of bias, a research method reflecting a higher level of confidence had been adopted, and follow-up was more likely. Thus, the outcomes that were reported in the low bias studies were considered more rigorous and higher quality.
Discussion

The Kirkpatrick model enabled an effective and rigorous comparison of research on TPPPs. During the analysis, the authors saw that TPPPs were diverse and that developing one program to fit all situations was unlikely. Examined through the broad lens of the Kirkpatrick model, nurse educators in the professional clinical environment can use this evaluation of TPPP studies to inform program development.

<table>
<thead>
<tr>
<th>Kirkpatrick level</th>
<th>Evaluation Outcome</th>
<th>Explanatory notes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Level 1</td>
<td>Reaction</td>
<td>Identifies NGRN views of the learning experience, organisation, presentation, content, teaching methods, and quality of instruction.</td>
</tr>
<tr>
<td>Level 2A</td>
<td>Learning – change in attitudes</td>
<td>Assesses changes in attitudes or perceptions among NGRN groups towards their transition experience. Preferably uses a control group and/or pre and post-test.</td>
</tr>
<tr>
<td>Level 2B</td>
<td>Learning – modification of knowledge and skills</td>
<td>Knowledge – identifies knowledge that was learned. Skills – identifies skills that were developed or improved. Preferably uses a control group and/or pre and post-test.</td>
</tr>
<tr>
<td>Level 3</td>
<td>Behaviour – change in behaviours</td>
<td>Allows time for behaviour change to take place: records the transfer of knowledge to the workplace or willingness of participants to apply new knowledge and skills. Surveys others who observe the behaviour. Considers organizational climate/contextual influences as a factor. Preferably uses a control group.</td>
</tr>
<tr>
<td>Level 4 A</td>
<td>Results- change in the system or organisation of practice</td>
<td>Refers to changes in the organisation attributable to the transition program. Includes the organisational climate/contextual influences. Preferably uses a control group.</td>
</tr>
<tr>
<td>Level 4 B</td>
<td>Results – performance of participants</td>
<td>Refers to positive change with regard to NGRN performance as a direct result of the transition program. Preferably uses a control group.</td>
</tr>
</tbody>
</table>

Table 2. Kirkpatrick Model of Evaluation

The objectives of a TPPP should determine to what extent learning should occur and include performance expectations, skills development, and attitude change (Kirkpatrick & Kirkpatrick, 2006). Evaluations in accordance with the Kirkpatrick model indicate that reduced attrition and improved retention of nurses are important for many organizations (Laschinger, 2012; Chappell, Richards & Scott, 2014, p. 659). Attrition was a particular concern in the U.S. studies (American
Association of Colleges of Nursing, 2015). Measuring behavior change is essential for determining if new RNs apply what they learned. If change has not occurred, the reasons need to be investigated (Kirkpatrick & Kirkpatrick, 2006).

Program Design

Some studies were focused on employment and retention of new RNs as an impetus for recruitment (Meyer-Bratt, 2013). Although inadequate staffing levels risk patient safety, the risks of employing an advanced beginner RN need to be acknowledged when goal setting. Ebright (2010) posed the following question about the employment of the new graduate RN: “What distribution of care delivery or alternative assignment of RNs would assure that all new graduate nurses would receive mentoring for their assigned patient care and work management responsibilities from an experienced RN every shift?” For an organization that makes patient safety a goal for a TPPP, such questions would be measured as an outcome.

After TPPP goals are established, each element of the evaluation process must be monitored, and a measurable evidence-based approach must be applied. This approach determines whether a program is succeeding and provides evidence on which interventions are not working. For example, leadership from the American Nurses Credentialing Center (2016), which offers the Practice Transition Accreditation Program, and the Versant New Graduate RN Residency™ program have made progress toward evidence-based practice for transitioning nurses. Although both have used control groups when evaluating their programs, no research has focused on individual interventions and the relationship between patient outcomes and participation in a nursing residency program (Letourneau, & Fater, 2015. In 1999, the Versant New Graduate RN Residency program was piloted in a pediatric hospital while subjected to systematic evaluation using a control group (Ulrich et al., 2010). When compared with the control group, the intervention group demonstrated better outcomes (Ulrich et al., 2010). The program has since been extended to other pediatric and adult acute care facilities and is now offered to other healthcare facilities in the United States (Ulrich et al., 2010).

Although the Versant model was reported as successful, elements of it could be further investigated, particularly from the perspective that the residency program is offered as a package of interventions, making it difficult to discern which interventions contribute most to the program outcomes (Rush et al., 2013). For example, Figueroa, Bulos, Forges, & Judkins-Cohn (2013) in the background to their research asserted that the effect of the Married State Preceptorship Model on the perceptions of new RNs and preceptors had not fully been addressed in the academic literature. Furthermore, Spector (2015, p. 1) in the NSCBN Transition-to-Practice Study found that new RN competency improved over the course of a TPPP whether or not the new RNs had additional didactic content. These observations emphasize the need for consideration of both program design and systematic evaluation of interventions rather than design alone.
The Kirkpatrick model (Kirkpatrick & Kirkpatrick, 2006) provides such a measure of outcome. Based on Kirkpatrick's evaluation model, the authors' study found a diverse scope and extent of TPPP evaluations. Broadly, the studies reviewed suggest that, at least in the short term, TPPPs generate new RN satisfaction, extend learning, positively change behaviour, and result in improved new RN performance and improved organizational climate (Ulrich et al., 2010; Spector & Echternacht, 2010). However, a tendency toward bias exists in many of these results. Overall, further rigorous, detailed evaluation of the impact and effectiveness of TPPPs and their adopted interventions are needed (Rush et al., 2013; Tuckett, Eley & Ng, 2017).

Table 3. Outline of studies 2010 - 2016

<table>
<thead>
<tr>
<th>Author</th>
<th>Year</th>
<th>Research Paradigm</th>
<th>Risk of bias</th>
<th>Kirkpatrick level achieved**</th>
<th>Findings</th>
<th>Follow up (duration)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Kaddoura</td>
<td>2010</td>
<td>Qualitative</td>
<td>High</td>
<td>✓</td>
<td>Positive</td>
<td>6 months</td>
</tr>
<tr>
<td>Kowalski &amp; Cross</td>
<td>2010</td>
<td>Qualitative</td>
<td>High</td>
<td>✓ ✓ ✓ ✓ ✓ ✓</td>
<td>Variable</td>
<td>1 year</td>
</tr>
<tr>
<td>Vittrup</td>
<td>2010</td>
<td>Qualitative</td>
<td>High</td>
<td>✓ ✓ ✓ ✓ ✓ ✓</td>
<td>Positive</td>
<td>Unclear</td>
</tr>
<tr>
<td>Young</td>
<td>2010</td>
<td>Qualitative</td>
<td>High</td>
<td>✓ ✓ ✓ ✓ ✓ ✓</td>
<td>Positive</td>
<td>Unclear</td>
</tr>
<tr>
<td>Nematozahi &amp; Isaac</td>
<td>2011</td>
<td>Qualitative</td>
<td>High</td>
<td>✓ ✓ ✓ ✓ ✓ ✓</td>
<td>Positive</td>
<td>Unclear</td>
</tr>
<tr>
<td>Fielden</td>
<td>2012</td>
<td>Qualitative</td>
<td>High</td>
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<td>2014</td>
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<tr>
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<td>2016</td>
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<td>3. 9 &amp;12 months</td>
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<td>Quantitative</td>
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<td>Positive</td>
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<td>Mixed</td>
<td>Low</td>
<td>✓ ✓ ✓ ✓ ✓ ✓</td>
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<tr>
<td>Rush et al.</td>
<td>2015</td>
<td>Quantitative</td>
<td>Low</td>
<td>✓ ✓ ✓ ✓ ✓ ✓</td>
<td>Positive</td>
<td>Unclear</td>
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Percentage achieved (26 studies) 65% 53% 80% 86% 86% 86%

** Modified Kirkpatrick levels as described by Hill et al., (2009)and adapted for nurse transition (Table 2)

Table 3. Outline of studies 2010 - 2016

Implementation and Delivery

TPPPs are often implemented in response to perceived staff shortages or financial benefits. Thus, tension often exists between the needs of the new RN and the goals of the organization (Cadmus, Salmond, Hassler, Black, & Bohnarczyk, 2016). An evaluation of TPPPs can provide hindsight for nurse educators by revealing retrospective information about learning, experiences, behavior changes, and results. Such analysis allows organizations to use limited resources where they are most effective and to avoid diluting components of programs without realizing their significance, such as adopting a low-support preceptorship model where the preceptor is available for questions
but does not share the workload with the new RN (Spector, 2015; Cadmus et al., 2016; Figueroa et al., 2013).

**Monitoring, Evaluating, and Reporting**

Nurse educators are not required to report evaluations of TPPPs in the academic literature. Yet without doing so, future TPPPs are compromised by the lack of rigorous information that informs their development.

In the early development phase, TPPPs are often evaluated by their organizations, rather than by an independent body, and accounts are rarely published. Health services are therefore encouraged to collaborate with universities to establish and maintain a research focus so critical evaluation of all TPPP interventions can take place. Although findings were mostly recorded as positive in this study, the risk of bias is often high and the follow-up is variable. Organizations indicate that their TPPPs are effective in achieving a successful transition; however, many confounding factors can influence the evaluation. The recruitment process may be rigorous to ensure the best possible RN candidates and hence safeguard the program’s success. As Patterson et al. wrote:

Criteria for application included a cumulative grade point average of 3.0 or higher; positive recommendations from a nurse manager and two nursing faculty members; an interview with a . . . clinical educator, nurse manager, and emergency staff nurse; a 200-word essay describing the applicant’s reasons for choosing emergency nursing; evidence of nursing leadership activities in school; and previous related health care work experience. (2010, p. 204)

Other potential built-in safeguards may include the requirement that participants sign employment contracts for periods of up to 2 years, which ensure a high level of success when evaluation is based on retention. For example, in one study, “All nurses participating in the residency program were required to sign a 2-year employment contract, which included the 12-month program” (Holland & Modderman, 2012, p.332).

Moreover, more TPPPs must use control groups. If control groups are not used for comparison, determining if time and experience alone are responsible for new RN improvement is difficult. Attributes such as competency, skills, attitude, and self-confidence can all show improved results over time without any intervention. Thus, to best assess the value of TPPPs and strengthen the evidence, educators must compare new RNs that participated in a TPPP (experimental group) with those that did not (control group).

Several models have used control groups. As noted, NCSBN completed a controlled study comparing their TTP with existing TPPPs. Also, the Versant New Graduate RN Residency program has been evaluated using a control group (Ulrich et al., 2010). The initial pilot study had an
intervention group that demonstrated better outcomes than a comparison group (Ulrich et al., 2010), and the program was reported to be successful in other pediatric and adult acute care facilities. Because of these controlled studies, the NSCBN TTP model and Versant program are offered nationally in the United States.

Use of the Kirkpatrick Model

Further rigorous evaluation is the key to improving TPPP research. Kirkpatrick’s model (Kirkpatrick & Kirkpatrick, 2006) provides a tool that can be applied across an assortment of programs. Thus, the authors advocate its use as an ongoing evaluation program.

To evaluate various programs in a range of settings requires further information about the reaction (level 1) of participants to the learning experience (favorable or unfavorable). The lack of this information in the reviewed literature compromised the authors’ ability to assign “level achieved” scores. According to Kirkpatrick & Kirkpatrick (2006, p. 27), participants need to react favorably “otherwise they will not be motivated to learn.” In some studies, determining changes in attitude was difficult. Attitude and level of confidence (level 2A) and knowledge and skill acquisition (level 2B) were evaluated (Ostini & Bonner, 2012). Some studies stated that new RNs were assessed, but the studies did not provide outcomes (Fielden, 2012). Other studies were unclear or anecdotally reported outcomes without supporting data (Silva, Cordeiro, Fernandes, da Silva, & Teixeira, 2014). Changes in new RN’s behavior (level 3), change in the organizational climate (level 4A), and improvement in the new graduate RN’s performance (level 4B) were more consistently reported, although clarity was occasionally lacking (Silva et al., 2014; Banks et al., 2011; Holland & Modderman, 2012).

Based on the Kirkpatrick evaluation model, this study found a diverse scope and extent of TPPP evaluations. Broadly, the studies reviewed suggest that, at least in the short term, TPPPs generate new RN satisfaction, extend learning, positively change behavior, and result in improved new RN performance and improved organizational climate. However, the tendency toward bias in the reviewed studies suggests the need for thorough consideration of rigor when interpreting results.

Limitations

Identifying all TPPP evaluations during the period from 2010 to 2016 was challenging because many are not reported in the academic literature. Some TTTPs were designed uniquely for organizations, and titles were not transparent. Examples of this diversity include “The Bridge Program,” “Nurses Nurturing Nurse’s Mentorship program,” “Married State Preceptorship model,” and “Flying Start NHS.”

Researchers had to rely on the written word for the content, intent, evaluation, and risk of bias in each reviewed program. Evaluating effectiveness requires that articles have quality descriptions of
the interventions because “without a complete published description of the intervention, other researchers cannot replicate or build on research findings” (Hoffman et al., 2014). However, the authors were flexible, and a degree of latitude was applied when evaluating the various programs. The results may be influenced by the authors’ interpretation.

Conclusion
The diversity and variable structure of TPPPs requires a standardized means of evaluation, in the form of the Kirkpatrick model, to make learning more widespread and applicable. Successful evaluation of the four levels requires advanced research expertise and partnerships among health services and the tertiary sector. This approach determines whether a program is succeeding and provides evidence on which interventions are not working. Effective reporting of the design, implementation, and outcomes of individual TPPPs in the literature will significantly enhance accountability, scholarship, transferability, and confident execution in other applicable contexts.

References


Publication 3: Strategies new graduate registered nurses require to care and advocate for themselves: A literature review

This publication which emerged from study 3, further illuminates the nature of inconsistent support of graduate nurses, in particular, the many incidents/issues requiring self-belief, initiative, and resilience. Considered more than a hand-maiden, the graduate nurse has many self-support strategies they can adopt to succeed. My contribution to publication 3 as corresponding author is detailed below. (An authorship declaration is included in Appendix 5).

Citation

Journal Impact factor: 1.3 Citations: 21 (See Appendix 4 for details)

Authorship statement and publication background
I was project champion for this study which began at the Flinders University Rural Clinical School (Riverland SA) with a detailed initial search undertaken by myself. This integrative review was undertaken initially to underpin an application for a university establishment grant to study the extent to which graduate nurses self-initiate their own support. I later sought to have the results of the critical review published, and consulted with two co-authors at different stages of an extended process (due to various circumstances) of approximately 3-4 years. In the first stage, Associate Professor David Gillham contributed to the manuscript primarily acting as a consultant and agreeing to be designated second co-author. By completion of the second stage, the manuscript had undergone significant changes. Dr Carolyn Gregoric reviewed the publication drafts and, as a result of her more detailed involvement, it was agreed that she be designated as first co-author.

Research design: The PRISMA reporting of search strategy was used to record the publications identified for this integrative review. The designation of key words and the search was undertaken primarily by myself with a focus on the narrative related to strategies that graduate nurses use to advocate and care for themselves. Further detail on the process has been provided in Chapter 1.

Data collection and analysis: I designed the literature review inclusion/exclusion criteria. Key words were often insufficient to identify relevant articles, and reading of the text of each article to identify the strategies used by graduate nurses was required. I used a pen to highlight the issues estratégias identified in each article, placing them initially into two major categories, i.e., ‘graduate nurse issues’ and ‘graduate nurse resilience factors’. There was a large number of articles requiring scrutiny and it took a number of days to complete the analysis. Frequently, the title of the article did not provide any indication that a potential resilience strategy may be
contained within. The results were detailed on a spreadsheet in two groups. The first grouping contained a list of strategies that graduate nurses have used successfully during transition. The second grouping highlighted issues relevant to graduate nurses. Overall, there were issues and resilience factors identified in 80 relevant articles. This data was synthesised by myself to create a detailed theoretical framework and conceptual model of the results (see Figure 2). Dr. Carolyn Gregoric provided feedback with regard to the figure designs and inclusions.

**Writing and editing:** I wrote the initial draft, designed the figures, and wrote the subsequent drafts. As corresponding author of the article, I was responsible for attending to the adjustments as requested by the publisher of *Contemporary Nurse*. As the manuscript neared completion, editing and adjustment was primarily undertaken in consultation with Dr. Carolyn Gregoric. The manuscript was also provided to Associate Professor David Gillham for contributions and suggestions with regard to editing at each stage of review and revision. A complete version of this publication is included on the following pages.
Strategies new graduate registered nurses require to care and advocate for themselves: A literature review

Abstract

Background

New graduate registered nurses are confronted with a complex, demanding and resource constrained environment where gaining acceptance into the workplace culture may be difficult. Existing evidence suggests that preparing undergraduate nursing students for this reality can assist with adjustment.

Objectives

To identify the strategies that new graduate registered nurses require to care and advocate for themselves during their first year of practice.

Methods

A search of the literature published between 2001 and 2016 was undertaken. Individual articles were synthesized narratively and the results entered to a summary table.

Results

A total of 274 articles were considered relevant to this narrative review. This paper synthesized the narrative of 80 articles. Synthesis revealed 22 resilience factors and 33 issues. Eight strategies with potential to assist new graduate registered nurses to care and advocate for themselves were identified. All of them socioemotional in nature.

Conclusions

This review of the literature provides a valuable resource that can be used to prepare nursing students for the workplace culture during their first year as a registered nurse. Scenarios can be developed for educational activities such as simulation, role play, discussion and self-reflection. Further development through research is recommended.

Keywords: new graduate nurse; self-care; self-advocacy; transition to practice; novice; coping strategies; self-efficacy; resilience; hardiness.

Introduction

In Australia and many other western countries internationally, new graduate registered nurses (NGRNs) are not considered to be work ready by employers and transition to professional practice programs (TPPPs) are provided as a panacea. In contrast, Zamanzadeh (2014) noted that some
non-western countries focus on the resilience of the NGRN and any formal transition support may extend to as little as 14 days. This observation creates the following causality dilemma: Has the rise of TPPPs influenced the preparation of undergraduate nursing students by lowering performance expectations of graduates or is it the lack of preparation that has influenced the rise of TPPPs? Unfortunately the western paradigm relies on the latter i.e. transition programs of health organizations address gaps in practice not serviced by the university sector. This paradigm has the effect of making universities impasse in their preparation of students for nursing practice. For example, one of the first challenges that NGRNs have to encounter is shift work. How do universities explicitly prepare them for this phenomenon? How do they prepare students for inter-professional practice and the practice conflicts, politics and inevitable horizontal violence that occurs? These questions are not often answered in curricula and nursing students are unaware that the reality of the health care environment is one of limited support, extreme challenge and unpredictability (Boychuk Duchscher, 2012).

Limited support for NGRNs remains likely into the foreseeable future as overstretched health care institutions struggle financially. Even though there were pre-existing (i.e. prior to 2007) concerns (Delaney 2003), the global financial crisis has contributed even further to the decline of transition support. This has been reported throughout the OECD and world-wide (Morgan & Astolfi, 2014). As a result, the likelihood that promises, such as preceptorships, not being realized are more likely (Healy & Howe, 2012). The following quote provided by Wangensteen, Johansson and Nordstrom (2008) illustrates the European Union experience.

| We were supposed to have a supervisor – we were supposed to have guidance in groups – it all looked so fine. But we haven’t had any of that (....) It was very disappointing. |
| Wangensteen et al., 2008, p.1880 |

Many resilience strategies are advocated in the current literature (Benner, 1984; Duchscher, 2009; McAllister & Lowe, 2011; Schoessler & Waldo, 2006), however further research is required to identify the explicit resilience strategies NGRNs might adopt to thrive throughout their graduate year. McAllister and Lowe (2011, p.6) define resilience as ‘a process of adapting to adversity that can be developed and learned’.

Being prepared for the reality of diminished support is critical to the NGRNs success and preparation is essential in the form of practical strategies that enhance their foreknowledge and skill to manage potential dilemmas. The aim of this review was to identify the strategies from previous research that are most likely to assist NGRNs to advocate and care for themselves.

**Background**

Despite many reports and recommendations to the contrary, the likelihood that NGRNs will find themselves in a chaotic, dysfunctional or unsupportive work environment remains quite high.
(Adlam, Dotchin & Hayward, 2009; Dyess & Sherman, 2009; Kelly & Ahern, 2009; Romyn et al., 2009; Clark & Springer, 2012; Chandler, 2012; Berry et al., 2012; Feng & Tsai, 2012; Hart, Brennan & de Chesnay, 2012; Laschinger & Grau, 2012; Thomas, Bertram, & Allen, 2012). The NGRN often experiences both physical and emotional exhaustion and is also likely to experience anxiety, low self-esteem, despair and a sense of hopelessness when trying to 'fit in' to the new health unit environment. Due to this stress, many leave nursing as a career (Greenwood, 2000; Cubit, 2011; Halfer & Graf, 2006; Figueroa et al., 2013; Wu 2012). The most often reported reasons for NGRNs leaving their first position as a registered nurse relate to:

- Stress associated with acuity of clients, unacceptable patient/nurse ratios, feeling patient care was unsafe (Bowles & Candela, 2005)
- role stress and oppression (Duchscher, 2008; Duchscher & Myrick, 2008; Douglas, 2014; Kovner et al., 2007)
- lack of management support and too much responsibility (Morrow, 2009)
- shift work, overtime and night shift interference with family life (Morrow, 2009)
- senior staff not perceiving that support is needed (Parker, Plank, & Hegney, 2003)
- promises such as preceptorship not eventuating, preceptorship being inadequate or the preceptor unwilling or unprepared to be supportive (Clark & Springer, 2012; Delaney, 2003; Harrison- White & Simons, 2013; Parker et al., 2014).

The contribution of the health care environment to the transition of NGRNs has received a great deal of attention as illustrated above. However, discussion with regard to the contribution of the academic environment and best practice with regard to addressing reality shock and self-care needs have been minimal. It is anticipated that by identifying the self-care strategies adopted by successful NGRNs and exploring the issues which impact on the capacity to successfully navigate their transition year, curricula can be developed to provide the appropriate education and resources.

**Method**

A literature search was undertaken and key terms were used in an attempt to identify reported self-care strategies or issues relevant to the NGRN. However, use of key terms alone was unsuccessful and searching within the articles by reading of the text and identifying the strategies and issues discussed was required. For example, in the study by Mooney (2007a) the text supported the need for strategies to address reconciliation of mistakes, however the title of the article ‘Professional socialization: the key to survival as a newly qualified nurse’ did not reflect this
content. As such, forensic searching of the text within the articles was necessary to identify the potential resilience strategies important NGRNs.

The inclusion/exclusion criteria was designed to maximise the possibility of locating the self-care strategies required by NGRNs during professional socialization.

**Inclusion criteria**

Inclusion criteria focused on critical research that informs the challenges, self-care strategies and issues of relevance to the NGRN during their transition year. International and local articles that were written in English and reveal the experience of NGRNs in the acute care environment were included. This broad criteria was adopted so that the key elements and self-care strategies which contribute to empowerment of the NGRN could be identified.

**Exclusion criteria**

Acuity of clients and feeling that patient care is unsafe has been reported as a significant role stress (Bowles, 2005; Duchscher, 2008). As such articles were excluded if the targeted population of NGRNs undergoing transition was not in an acute care environment. Also excluded were instances where experience and further training was an organizational requirement required before the NGRN was eligible to commence the training program being researched.

**Search strategy**

An online literature search was completed between 2001 and 2016, in CINAHL, Ovid Medline, Informit, Google Scholar, and Web of Knowledge using the search terms: new graduate nurse, self-care, self-advocate, transition to practice, novice, coping strategies, self-advocacy, self-efficacy, self-esteem, resilience, hardiness, and self-management.

Many combinations of search terms were used to ascertain possible relevance to NGRNs. Articles were read and assessed with regard to strategies or issues relevant to NGRNs. After forensic examination, many were found to contain strategies that had been adopted or issues that needed to be addressed by the NGRN to care and advocate for themselves. Findings were recorded on a Microsoft Excel spreadsheet for analysis and categorization.
As illustrated in figure 1 a total of 445 articles resulted from the initial search that met the inclusion criteria of possible relevance to NGRNs. Once duplicates were removed 274 articles were screened in accordance with the inclusion criteria. Of these, 139 full text manuscripts were selected for further screening. Of these 80 articles were found to contain self-care strategies that had been adopted or issues that needed to be addressed by the NGRN. Findings were recorded on a spreadsheet for analysis and categorization. This process continued until no further new strategies or issues were found.

Each article was read in order to answer the question, ‘What self-care strategies or issues within this manuscript are relevant to the NGRN?’ When self-care exemplars were identified they were allocated to a purpose designed Microsoft Excel summary table. A conceptual model of results is provided in Figure 2.

In developing the strategies, the researcher was sensitive to the elements of reality shock that presented. Strategies were categorized with a focus on the resilience factors and also the issues identified as being significant for NGRNs. For example, it is acknowledged that horizontal violence is an issue of socialization however it is considered to need special attention because of prevalence and the negative effect it can have on performance. It is also acknowledged that the nature of social and emotional skills and the manner in which they are allocated is dependent significantly on the situated context and judgement of the researcher (Blyth, Olson, & Walker, 2015; Braun & Clark, 2006).
Results

Research that specifically targets the preparation of nursing students for the realities of practice with a focus on resilience was relatively small (Zamanzadeh, 2014). The title of articles did not always reflect the content and reading of the text was required in order to identify the self-care strategies.

Identified strategies included the need to: explore personal self-support, reflection and interpretive style, address social intelligence and the need of the NGRN to fit into the organizational culture; understand the nature of transition; minimize horizontal violence, recognize and regulate emotions; manage moral distress and foster moral courage; self-assess progress and performance. Details of these findings will now be discussed:

**Strategies of Interpretive style, Reflection and Personal self-support**

Sixty-five articles out of 80 related the importance of interpretive style, reflection and personal self-support. Stress is reported to negatively impact the quality of care provided by new graduate registered nurses (Thiesen & Sandau, 2013). Management of stress is more effective where NGRNs have good psychological capital. Psychological capital is described by Boamah and Laschinger (2015, p.267) as a "positive psychological state of development that comprises..."
confidence, optimism, hope and resilience."

Psychological capital in the form of interpretive style is a significant factor in determining personal self-support for the new graduate registered nurse. Interpretive style is how a nurse imagines their own ability to perform. This occurs positively through seeing oneself as being effective with regard to professional skills and not imagining failure (Simoni et al., 2004). ‘Interpretive style can empower, reduce job stress and contribute to job satisfaction for that same RN’ (Simoni et al., 2004, p.223) with the outcomes being increased self-efficacy and confidence.

Nursing students can learn to manage stress by reflecting on scenarios in which they have the opportunity to choose from a number of interpretations, including both effective and ineffective cognitions. These activities may enable them as NGRNs to reflect on their habitual ways of perceiving stressful situations and provide empowerment (Simoni et al., 2004; Caldwell & Grobbel, 2013). In addition to reflection, guided imagery has been advocated as a model for refining the transition process with benefits such as empowerment, achieving positive outcomes and practice proficiency (Boehm & Tse, 2013).

Spirituality can also provide meaning and help with gaining a positive perspective and source of renewal (McAllister & Lowe, 2011). Lazar (2010) undertook a study among female Israeli nurses and found job satisfaction was linked strongly to the sacredness of life, altruism and idealism aspects of spirituality. Deliberately redirecting the locus of concern from the self to a focus on ‘connection’ with patients and families has the reported benefit of providing positive rewards (Clendon & Walker, 2012, p.558). Overall satisfaction in the spiritual domain was found to spill over positively into the work domain.

The demands of shift work often results in the NGRN feeling fatigued, overwhelmed and dislocated from friends, family and societal norms. Students need to explore the ministration of these concerns more explicitly prior to taking on the role of registered nurse (Ashton, 2015; McCalla-Graham & De Gagne, 2015; Pennbrandt et al., 2013). Similarly, students need to learn the difficult task of prioritizing and managing their patient allocation, a portion of which, may involve death, grief or trauma (Ratta, 2016; Zeng Lee & Bloomer, 2015; Brisely & Wood, 2004; Thiesen & Sandau, 2013).

Ultimately it is important that NGRNs recognise when help is required and take control. An effective way to ameliorate the impact of critical incidents involving the above is to offer or request a “debrief” if that service is provided (Shinners, 2016; Brisley & Wood, 2004; Mellor & Greenhill, 2014). In absence of a debrief, then being aware of and accessing the resources available such as the employee assistance program is vital (Shinners, Africa & Hawkes, 2016).
Strategies of Social intelligence and fitting in

There were 49 articles of the 80 articles that included social intelligence and fitting in as a concern for NGRNs. Walker and Campbell (2013) identify social intelligence as a critical work readiness factor. In fact, Feng and Tsai (2012) assert that NGRNs found ‘learning how to solve the gap between knowing and practising was easier than learning how to behave appropriately and to deal with people in the workplace’ (p.2068).

Social intelligence is the ability to inspire, influence, empathize and care for others (Johns Hopkins University, School of Nursing ND) or as Karl Albrecht (2004, p. 1) put quite simply 'social intelligence is the ability to get along well with others, and to get them to cooperate with you.'

The relationships and networks which an individual has developed within an organization are significant (Taylor, 2012). Those who have strong connections and support within an organization are likely to have more success than those who do not (Taylor, 2012). There is also the vital need that NGRNs have to ‘fit in’ to the clinical situation to which they are allocated and the importance of being accepted by senior staff (Feng and Tsai, 2012; Malouf & West, 2011). Minor indiscretions such as not observing meal break times, being late for work or being disrespectful can present as major obstacles to the acceptance of a new nurse on the ward.

There are also other significant concerns based around the perceived shame of not knowing, which challenge the NGRNs sense of self and patient safety (Feng & Tsai, 2012; Hamilton, 2005). NGRNs reported that ‘not wanting to be regarded as stupid’ had a significant influence on their help seeking behaviour or reporting of mistakes (Crigger & Meek, 2007; Malouf & West, 2011; Pennbrandt et al., 2013). The potential for the NGRN to jeopardize patient safety by avoidance of shame was found to be significant, particularly at the beginning of a new placement (Malouf & West, 2011). As a result, high risk patients are particularly stressful to the NGRN owing to the possible consequences for the patient and fear of retribution (Ratta, 2016; Crigger & Meek, 2007).

Findings of graduates’ fear of other staff members and their reprimands along with limited assessment capacity could potentially lead to delay in early medical intervention for the deteriorating patient. (Purling & King, 2012 p. 3461)

Development of trust in others to assist is important for the NGRN and a recommended mindset for NGRN’s is to feel comfortable with not knowing everything (Cooper, Taft & Thelen, 2005). This requires access to a network of support in the form of a skilled person or mentor and knowledge of other supportive resources (Ethridge, 2007; Hodges et al., 2008; McKenna & Newton, 2008; Nugent, 2008). Consequently, it is important to adopt a proactive approach when going to a new clinical area, one which comprises the asking of questions by the NGRN about salient aspects of the routine and the staff who will be supportive (Feng & Tsai, 2012; Malouf & West, 2011). Another strategy considered helpful for fostering engagement and enlarging the network of support is to...
become actively involved in the health service through committees or projects (Bowles & Candela, 2005).

The strategy of understanding the nature of transition

There were 17 articles of the 80 that focused on the nature of transition and the need for NGRNs to be aware of the enormity of this change (Malouf & West, 2011). The experience of transition shock is well documented (Duchscher, 2009; Boychuk Duchsher 2012) and NGRNs need to understand the nature of this shock so that they can prepare emotionally, physically, developmentally and intellectually (Duchscher, 2009; Malouf & West, 2011; Romyn et al., 2009; Ashton 2015). This includes role conflict between long-established hierarchical nursing traditions and what was learnt as an undergraduate (Kelly & Ahern, 2009). Learning about the nature of transition within the syllabus as an undergraduate nursing student may empower the NGRN. ‘Transition’ in the context of ‘transition to practice’ encompasses giving up being a student and taking on the whole new world of being an employee and a registered nurse with all that it entails (Benner, 1984; Boychuk Duchsher, 2012; Duchser, 2008; Schoessler & Waldo, 2006). Each transition model has distinct developmental phases which highlight that the NGRN is a work in progress and not a finished product. NGRNs are reported to benefit from understanding this continuum so that they can contextualize the difficulties they may have when comparing themselves with expert or more experienced nurses (Burger et al., 2010; Hartigan et al., 2010).

Strategies to minimize horizontal violence

15 articles of the 80 articles dealt explicitly with horizontal violence and the NGRN. However, fear of retribution, avoidance behaviors, poor relationships with preceptors and complaints of unsupportive staff featured in many other articles.

Horizontal violence and harassment in its many forms are often experienced by the NGRN (Kovner et al., 2007; Kramer et al., 2012; Laschinger & Grau, 2012; Morrow, 2008). In fact, Laschinger and Grau (2012) found that one third of NGRNs experienced workplace bullying, with those under the age of 30 years experiencing bullying for a longer period than their older counterparts (Clendon & Walker, 2012). Sexual harassment was also reported as more common among younger NGRNs of both genders (McKenna et al., 2003). Surprisingly, Berry et al. (2012) related that often ‘the experienced nurses expected to mentor and provide support to NNs [Novice Nurses] are the primary perpetrators of WPB [Work place bullying]’. Other perpetrators were staff nurses (44%) and nurses in leadership positions (19%) with physicians accounting for only 6% of reported bullying (Berry et al., 2012). Feng and Tsai (2012) also found physicians were much less problematic regarding bullying behaviour than were senior nurses. This is significant as NGRNs often feared talking to physicians because of reported stories of abuse (Hodges et al., 2008; Thomas et al., 2012). Effective communication between clinicians, other staff and students was
identified as a strategy to decrease horizontal violence (Curtis, Bowen & Reid, 2007). ISBAR (Finnigan, 2010) - a well-recognised formalised handover communication tool incorporating Identification, Situation, Background, Assessment and Recommendations - was found empowering to the NGRN in the context of providing a predictable means of communication between health professionals (Goodwin-Esola, Deeley & Powell, 2009).

Berry et al. (2012, p.84) found significant correlation between work place bullying and negative work productivity of novice nurses. Development of psychological capital is considered both a personal resource and protective factor against adverse outcomes for patients (Laschinger & Grau, 2012):

Psychological capital, a personal resource, influenced new graduates’ sense of fit between their job expectations and their actual working conditions, which in turn influenced the extent to which they reported experiencing bullying in the work place (p.289).

Providing nursing students with skills to address the issue of bullying in the workplace may help them see their experiences more objectively and reduce the likelihood that bullying is perpetuated by successive generations of NGRNs (Berry et al., 2012; Curtis et al., 2007; Laschinger & Grau, 2012; Pines et al., 2012).

**Strategies of recognizing and regulating of emotions**

There were 12 articles of the 80 articles that included recognizing and regulating of emotions as a concern for NGRNs. Essentially, emotional intelligence is about self-regulation and mastery of emotions (Zito, 2012). In particular, Freshwater and Stickley (2004) assert that emotional intelligence should be integrated throughout the nursing curriculum to facilitate the essential leadership skills in learning to care for one-self and others. Emotional intelligence competency requires self-awareness. This includes knowing one’s own strengths and limitations, being mindful of feelings in the moment, and knowing how feelings can affect decision-making and other people (Yale Centre for Emotional Intelligence, 2013; Rochester et al., 2005). Emotional intelligence is defined as:

A type of social intelligence that involves the ability to monitor one’s own and others’ emotions, to discriminate among them, and to use the information to guide one’s thinking and actions. (Mayer & Salovey, 1993, as cited in Johns Hopkins University, School of Nursing. n.d., p.1)

To illustrate the potential value of emotional intelligence, a study was undertaken by Rochester et al. (2005) with regard to the capabilities of 17 NGRNs rated by their supervisors as successful. It was noted that during stressful situations the successful graduates demonstrated more highly developed emotional intelligence and clarity of thinking (Rochester et al., 2005).

A number of other articles also considered emotional intelligence essential for effective leadership and nursing performance (Beauvais, Brady, O’Shea & Griffin, 2011; Freshwater & Stickley, 2004;
Kooker et al., 2007). This includes providing students with the skills to relate inter-professionally at all levels so they have equitable influence on patient care planning and advocacy (Bulmer-Smith, Profetto-McGrath, & Cummings, 2009; Shanta & Connelly, 2013; Pfaff et al., 2014). These skills for dealing with emotional information need to be developed in nursing students through education and support (Bennett & Sawatsky, 2013; Rochester et al., 2005; Towell, Nel & Muller, 2015).

**Strategies to manage moral distress and foster moral courage**

There were 10 articles of the 80 articles which focused on moral distress and moral courage as a concern for NGRNs. McAllister and Lowe (2011) highlighted the importance of learning to manage moral distress, particularly where there is conflict between insufficient time for care and being true to one’s own values and those learned. This can result in stress, conflict of conscience and an impoverished sense of self:

> They were extremely hard on themselves when they felt they had failed to identify or appropriately intervene in a changing clinical situation. Despite the fact that many of the situations in which they were placed were beyond their intellectual or physical capability, their behaviour was consistently self-deprecating. (Duchscher, 2008, p.445)

In addition, the self-expectations of NGRNs are often distorted by their beliefs about their ability to handle moral distress issues in practice (Juthberg et al., 2007). Schluter et al. (2008, p.306) describes moral distress as:

> An emotion that is expressed when the moral complexity of a situation is not leading to a resolution, thereby having the potential to cause harm to the individual nurse [...] painful feelings and associated mental anguish as a result of being conscious of a morally appropriate action, which, despite every effort, cannot be performed owing to organizational or other constraints.

Cooper et al. (2005) discuss how third-year students had forethought and anxiety about the roles they would perform in their graduate year. ‘Several students discovered errors either made by others or themselves during their clinical experience. This raised significant fears about their responsibilities as an RN’ (Cooper et al., 2005, p.296). This level of responsibility and accountability cannot easily be tested as an undergraduate (Hickey, 2009; Zheng, Lee & Bloomer, 2015). However, it is possible for students to be given the opportunity to explore the relationship between moral distress and moral courage in the context of future practice. In actuality, moral courage in practice is considered an effective response to moral distress (LaSala & Bjarnason, 2010).

**Strategies to assess progress and performance**

7 out of 80 articles provided information with regard to the reluctance of staff to assess and provide formal feedback on NGRN’s progress and performance. Developmental and positive feedback has been reported as helpful for providing a feeling of developing competence over the course of the
graduate year (Hamilton, 2005; Parker et al., 2014; Wangensteen et al., 2008). NGRNs preparing for their first year in practice and in the early stages are eager to receive feedback on their progress (Mellor & Greenhill, 2014; Wangensteen et al., 2008). Yet articles from Europe and Australia have demonstrated that more experienced nurses are reluctant to provide effective feedback (Wangensteen et al., 2008; Parker et al 2014). The opportunity to reflect on practice and view challenges as learning experiences is purported to assist with resilience and the development of a positive perspective (Wangensteen et al., 2008). In particular, Generation Y individuals born between 1981-1994, who represent a large proportion of current NGRNs, desire quick and continuous feedback (Keepnews, Brewer, Kovner & Shin, 2010; Lampe, 2011).

Although many of the participants (new graduate registered nurses in a graduate nurse program) felt strongly about their own responsibility and need to pursue help if necessary and not to be reluctant or deterred by lack of interest by their senior colleague, they reported they would have benefited from constructive feedback about their performance. Often the only feedback they received was based on the fact that no-one was complaining or no major mistakes had been made. They would have preferred some encouragement and genuine interest in their performance. It would have helped with their confidence and reduced the stress they experienced from not knowing how others perceived their performance. (Parker et al. 2014, p. 154)

Due to the importance of receiving feedback on performance, it has been suggested that, in the absence of formal feedback, nursing students should be prepared to find options and be proactive in this regard. Assertively seeking progress meetings can be a resilience strategy for the NGRN in order to reaffirm progress, instil a sense of achievement, explore learning opportunities and set new goals (Goodwin-Esola et al., 2009).

If attempts to gain feedback are not successful, there are alternative or complementary options, such as maintaining a portfolio, reflective journal or being alert for other measures of success (Sewell, 2008). These measures may include feedback from patients, being given extra responsibility or informal feedback on practice during the course of the shift etc. Those who have had experience with a reflective journal find that writing assists with self-assessment of progress, provision of perspective and a sense of achievement (Day & Rickard, 2012). Additionally, the use of social media and web blogs as a critical event journal has been suggested for debriefing and shared learning (Sewell, 2008).

Discussion

There is reported to be little research on how to manage specific stressors associated with reality shock (Thiessen, 2016). The objective of this literature review was to identify research that has a focus on the strategies NGRNs employ to manage these stressors. It is also acknowledged that every student will have a different capacity for resilience. At the outset, nursing may have been a default option and not the students preferred profession or perhaps nursing was a stepping stone to another career. As a consequence, this background can negatively influence an individual’s
vulnerability, engagement, perception and occupational health (Rudman & Gustavson, 2012). Conversely, undergraduate nursing students may already have well developed resilience prior to commencement of their studies in nursing (Rudman & Gustavson, 2012). In a study by Chamberlain et al. (2016 p.8) it was found that ‘the strongest predictors of resilience (in nursing students) were attributed to dispositional mindfulness and its subset of acceptance’.

A major challenge to personal resilience relates to the nursing and hospital culture. While professional socialization promises to ease transition when effectively scaffolded, such a network can also be a threat, because of the stress of enculturation to ritualistic practices and expectations (Boychuk Duchscher, 2008). Inevitably loss of empowerment and moral distress is a likely result if pressured in this way to compromise care (Mooney, 2007b; Hamilton, 2005; Boychuck Duchscher, 2004).

In response to these concerns, this study has garnered evidence based strategies reported to assist with facilitating the safe transition of NGRNs and improve their willingness to remain in the workforce. Bridging the gap between the undergraduate experience and the clinical world of nursing is essential to reduce reality shock i.e. ‘a more accurate academic acknowledgement of the clinical world of nursing may decrease new graduates’ sense of anxiety inherent within the professional nursing role’ (Winfred, Melo & Myrick, 2009 p. 12). Hamilton (2005, p.76) describes these disconnects as:

Discursive dissonances or differing constructions of the new graduate within institutional discourses of education and health service. In educational discourse the graduate is positioned as a critical thinking and knowing care giver . . . health service discourses work to construct new graduates as functional, efficient, organizational operatives providing a nursing service.

In accordance with this foreseeable assault on the NGRNs sense of self as a professional, evidence suggests that a nurse’s self-concept fluctuates at the developmental stage as they make the journey from student to graduate nurse (Pfaff, 2014). As a consequence, there are implications for safe patient care and strategies should be directed towards enhancing the undergraduate nurse’s self-confidence in preparation for transition (Cowin et al., 2006 p. 30). NGRNs who lack confidence are less likely to assert themselves in an inter-professional context, are fearful, easily intimidated, and patients may suffer as a result (Pfaff, 2014).

Confronting the realities of practice in the classroom will be of benefit to nursing students before they become NGRNs (Shinners, 2016; Theisen, 2016). Students will likely have misgivings from their engagement with the clinical practice environment as they may have already experienced horizontal violence and pressures from a variety of sources (Hamilton, 2005). Hence, students should be eager to participate in conversations of this nature, to share their stories and learn from each other. Possible conversations include:
• The issues surrounding medication errors and reconciliation of mistakes, particularly when students may have witnessed the mistakes of others (Cooper et al., 2015).

• The confounding problem of moral distress when as students they may have been attempting to perform best practice and are discouraged from doing so (LaSala & Bjarnason, 2010).

• The need to self-assess their own progress as in some workplace environments it is unlikely that such an opportunity will be provided to them on a regular basis (Parker et al., 2014).

• The potential for the NGRN to jeopardize patient safety due to avoidance of shame as was found by Malouf and West (2011).

Overall, there is a need to acknowledge the complexity of the nursing and health care culture in a neutral classroom environment. Firstly, learning that their shared experiences are similar is likely to be beneficial for students and secondly, provision of the opportunity to discuss possible responses and rehearse solutions can be therapeutic and empowering (Goleman & Boyatzis, 2007; Shinners, Africa & Hawkes, 2016). As a consequence of this repositioning, students would be afforded an extra layer of resilience so that, when they adopt the role of NGRN, they recognize their struggles, not as a failure on their behalf, but a product of the many challenges of the culture of nursing and health care environment.

Strengths and Limitations
The inclusion of a large number of journal articles in this review may be considered a strength. All manuscripts were from peer reviewed journals. During thematic analysis, some themes were well supported by a large number of references while others have less support due to the paucity of research in that area. This does not mean that a theme should be discounted (Braun & Clarke, 2006) with regard to recommended strategies or issues of concern for the NGRN. For example, there was a relatively small number of references representing the theme ‘strategies to manage moral distress and foster moral courage’. However, this theme was compelling, considered relevant and therefore retained.

Conclusion
This study was a first step toward development of a comprehensive approach to undergraduate education that prepares nursing students for transition to practice. Strategies recommended include the need to: explore personal self-support, reflection and interpretive style; address social intelligence and the need of the NGRN to fit into the organizational culture; understand the nature of transition to practice; minimize horizontal violence; recognize and regulate emotions; manage moral distress and foster moral courage; self-assess progress and performance. Enacting any one of these strategies in professional practice is purported to be a significant determinant of “well-
being” outcomes for both the patient and NGRN. Interaction of two or more strategies would be even more empowering. Further research is recommended to determine the most effective ways to teach these strategies, to verify their effectiveness and identify possible further inclusions that will improve the capacity of NGRNs to be successful during transition.

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Publication 4: Ways of being: Preparing nursing students for transition to professional practice

This publication reports on the strategies of self-support emerging from interviews with graduate nurses. Transformational strategies which mitigated the inconsistent support were typically experienced. These strategies were assembled into the ‘ways of being’ self-support model for the purpose of empowerment of undergraduates, thus enabling them to navigate the transition from nursing student to professional nurse. My contribution to publication 4 as corresponding author is detailed below. (An authorship declaration is provided in Appendix 5).

Citation
[10.3928/00220124-20160616-10]

Journal impact factor: 0.74  Citations: 35 (See Appendix 4 for details)

Authorship statement and publication background
This study is informed by publication three, ‘Strategies new graduate nurses require to care and advocate for themselves: A literature review’ (Mellor, Gregoric & Gillham 2017), which assisted with framing the questions used in the interviews with graduate nurses for this study. It also allowed an informed application for support of an establishment grant which was approved on 23 January 2013. I applied for ethics approval initially with the Flinders University Social and Behavioural Ethics Committee (SBREC); however, due to the perceived clinical focus, I was redirected to the Southern Adelaide Clinical Human Research Ethics Committee (SACHREC). In addition, I had to address the requirement for Low and Negligible Risk (LNR) specific to each health unit, as some clients may have had special needs. My application was successful, and due to the reflexive nature of the research, included a number of reviews and extensions as appropriate. Site specific approval was appropriated for the three selected health units, i.e., 2 metropolitan teaching hospitals (5 informants) and 1 rural health service (4 Informants). Various adjustments and extensions were granted until 21 June 2015. The following example is representative of SACHREC Ethics Committee permissions for one health unit:

- Use of SA Health email accounts
- Approval of flyer content and contact details
- Leave flyers out for collection by those interested at the RN TPPP Graduation Ceremony in March
- Place flyers in the graduate nurse pigeon holes in the casual pool office for those who have joined the casual pool
**Research design**

I selected, developed, and wrote up the research design. Grounded Theory Method was used, as the development of new theory was a primary goal of the research. Further detailed discussion of the methodology/methods has been provided in Chapter 1. The method of data collection was via interviews with graduate nurses, and I developed and provided the questions used for the interviews. Throughout the research process, I consulted with Professor Jennene Greenhill and Associate Professor David Gillham (via videoconference as required) who provided practical suggestions for the ethics application requirements and for gaining access to the health units.

**Data collection and analysis:** I engaged Lucy Atkinson (research assistant and experienced interviewer) to undertake some of the interviews. To provide credibility and to contextualise/check the interview questions, we were both present for the first interview. A professional transcription service was also engaged to provide a written verbatim account of the recorded interviews for the purpose of analysis. All care was undertaken to facilitate the ethics of interviewing informants with regards to freedom of choice, avoidance of coercion, appropriate consent, and maintenance of a professional and confidential service. We interviewed five graduate nurses from two selected metropolitan hospitals and four graduate nurses from rural health services. The goal was to interview a minimum of twelve graduate nurses. However, there were ongoing challenges due to the strict ethics requirements and the reluctance of some organisations to allow access. Even where access was permitted, there were many restrictions and few willing informants. In order to mitigate these obstacles, a research partnership was forged with the transition to practice coordinator of a major hospital. A reciprocal arrangement, including sharing of the data, was implemented. Approval of this arrangement with SACHREC was successful and produced three willing informants. While not optimal, this provided an acceptable overall number of nine recorded interviews.

Due to a change in my work location, I was fortunate to engage Dr. Carolyn Gregoric as research associate to assist with processing of the transcribed interviews using QSR NVivo 11. This proved to be a valuable resource. Following immersion of myself in the data, and through the process of theoretical sensitivity (in a graduate nurse context), there emerged multiple socio-emotional qualities or ‘ways of being’. As a result, “ways of being” for the nursing context emerged.

**Writing and editing:** I was the corresponding author and wrote the initial manuscript. This included the quotations selected (from the interview transcripts) for the purpose of illustrating each element of the “ways of being” theoretical framework. I also populated the “ways of being” concept model and allocation of strategies appropriate to each concept, i.e., ways of feeling, ways of doing, and ways of relating. My other contributions included the design of figures/tables and manuscript.
revisions when responding to reviewers. Dr. Carolyn Gregoric as first co-author, offered feedback at each stage of development providing valuable perspectives with regard to inclusions, conciseness, and clarity. Dr. Gregoric also assisted with additional important and contemporary resources relevant to grounded theory (i.e., Charmaz, 2014). An authorship declaration is included in Appendix 5. A complete version of this publication is included on the following pages.
Ways of being: Preparing nursing students for transition to professional practice

Abstract

Background: The new graduate registered nurse (NGRN) does not work in isolation but within an organizational environment. Unfortunately for the NGRN, transition to practice programs are often variable and under resourced which means that promised support is unlikely to eventuate. Many NGRNs learn the skills required to navigate the nursing culture “on the job” without support and by trial and error.

Method: A grounded theory method was used to identify the strategies used by nine NGRNs to thrive during their transition to professional practice.

Results: Ways of being emerged from the data to explain the social and emotional strategies NGRNs use during the first year of practice. The Ways of Being model includes ways of feeling, ways of relating and ways of doing.

Conclusion: University preparation needs to ensure that the NGRN is provided with the skills to successfully navigate the workplace. Use of the Ways of Being model could help achieve this.

Keywords: new graduate nurse; self-care; self-advocacy; transition to practice; novice; coping strategies; self-efficacy; resilience; hardiness; empowerment; ways of being.

Introduction

Internationally, the approach to transition to professional practice for the new graduate registered nurse (NGRN) has been to provide a specialised program for this purpose upon entering the work force (Whitehead, Owen, Holmes, Beddingham, Simmons & Henshaw et al., 2013). The NGRN therefore expects that they will be welcomed and need little personal preparation for the transition other than the knowledge and skills learnt at university. This knowledge traditionally focuses exclusively on patients/clients and not on NGRNs as individuals. Unfortunately, for the NGRN, promised support is not always provided in graduate nurse transition programs (Howard–Brown & McKinley, 2014; Whitehead et al., 2013). As a consequence it is not uncommon for the NGRN to fend for themselves when confronted with a challenging work environment during their transition to professional practice (Berry, Gillespie, Gates, & Schafer, 2012; Chandler, 2012; Clark & Springer, 2012; Feng & Tsai, 2012; Hart, Brennan & de Chesnay, 2012; Laschinger & Grau, 2012; Parker, Giles, Lantry & McMillan, 2014; Thomas, Bertram & Allen, 2012).

Many NGRNs are frustrated by the lack of support and being left alone without the strategies to thrive (Parker, Giles, Lantry & McMillan, 2014). Successful NGRNs have related that many of the supports implemented were self-initiated (Mellor, 2009). At the moment, health care is portrayed as
perfect and that transition programs are perfect and the health system is perfect. The discrepancy between preparation and the realities of practice was first identified by Kramer (1974) and termed reality shock. It has also been found that the hospital culture is much more of a challenge than technical knowledge and clinical skills to navigate (Duchscher, 2009; Halfer & Graf, 2006). Hence, preparation of the NGRN as an individual, with regard to the relevant resilience strategies necessary to provide self-support, is critical during the transition to professional practice. Previous research suggests that these skills primarily involve negotiating the nursing culture. For instance, Crigger & Meek (2007) found that many NGRNs may be driven by shame to avoid revealing that they do not know something in their early clinical placements and hence compromise patient care by not asking for help.

From previous studies it is known that there are important conversations that still need to be had by nurse teachers with nursing students to ensure the NGRN thrives through empowerment, engagement and relevance of the education process. NGRNs often do not have opportunities to discuss the concept of moral distress and how to address conflict between the care they have been taught and that which they are being pressured to perform (Day & Rickard, 2012; Gallagher, 2010). NGRNs need to respond appropriately to an experienced registered nurse (RN) whom, for example, when consulted about the need to call the medical emergency team directs the NGRN to alter the record so it is in a positive range and the team is not called (Purling & King, 2012). The NGRN may not have had a performance review for an extended period (Goodwin-Esola, Deely & Powell, 2009) and needs to know how, in these circumstances, to obtain timely feedback or be cognizant of how to self-monitor if their request is not forthcoming. This may include looking for the positive and recording incidents to provide evidence of successes to shift their emotions and self-image.

The main aims of this study were to further develop a body of knowledge surrounding the capacity for NGRNs to take an active role in the process of transition rather than being bystanders and reacting to the scenarios that present on a daily basis. Recommendations are made which will assist universities to better prepare NGRNs to take control and become professionals and leaders who can objectively experience the transition and learn from it.

**Research Method**

This is a qualitative study that uses grounded theory to identify the strategies used by NGRNs to thrive during their transition to professional practice. Grounded theory originated and was first articulated by Glaser and Strauss (1967). Grounded theory involves viewing the research data obtained as the basis for generating new theoretical constructs (Glaser et al., 1967). However, where it is found that recognized theory fits the data with minimal distortion then verification or extension is a possible outcome (Glaser et al., 1967; Strauss & Corbin, 1990).
Study rigor was provided using the four criteria of Guba and Lincoln (1989) i.e. credibility, transferability, dependability and confirmability. To provide credibility, predetermined closed questions were used to collect informant data and open-ended questions were used to elicit richness of ideas, feelings and strategies. Interviews were transcribed verbatim. To assist transferability, field notes were taken to supplement richness of the data and provide context (Charmaz, 2014). An audit trail is available for confirmability (Guba et al., 1989). Transferability is reflected in the rich description of the situated context of the nine informants and the diversity of their transition experience. To provide reflexivity interviews were shared between the primary researcher, who is a university lecturer and an experienced interviewer who was about to undertake her transition to professional practice as a NGRN. The first interview was conducted with both interviewers present in order to contextualise the questions to be asked and to provide confirmability (Guba et al., 1989).

Ethics approval was gained from the Southern Adelaide Clinical Human Research Ethics committee, and site specific approval was gained from all participating health units. Informants were provided with a letter of introduction, an overview of the nature of the research being conducted and a description of their role. Consent forms and the list of questions were provided to informants so that opportunity was provided for consultation with colleagues, friends or family. Informants were also informed at interview that participation was voluntary; they could withdraw at any time and decline to answer any question.

Table 1. Characteristics of study participants

<table>
<thead>
<tr>
<th>Informant*</th>
<th>Age Range (y)</th>
<th>Family</th>
<th>Under-graduate BN Program at Flinders University</th>
<th>Prior Non-baccalaureate Practical Nursing Qualifications</th>
<th>Practical Nurse in the Same Institution as GNTP</th>
<th>Graduate Nurse Transition Program</th>
<th>Hospital Location Rural/City/ Public/ No. of beds</th>
<th>Areas of Practice During Graduate Nurse transition Program</th>
<th>Hours per Week (Shifts)</th>
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<td>Yes</td>
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<td>No</td>
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<td>No</td>
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<td>Hematology; ICU</td>
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<td>Cardiac; recovery</td>
<td>32</td>
</tr>
</tbody>
</table>

Note. BN = bachelor of nursing; GNTP = graduate nurse transition program; ICU = intensive care unit; CVA = cerebrovascular accident

*Pseudonyms have been used.
Nine informants volunteered to participate throughout rural and metropolitan South Australia. Informants were those who had recently completed their transition to professional practice program. See Table 1 for a more detailed account of each informant and their situated context. Pseudonyms have been used.

Interviews with informants were undertaken at a time and place convenient to the informants and away from the work environment where possible. Interview duration was 45 to 90 minutes. Interviews were undertaken face to face or, where this was not convenient for the informant, via telephone. All interviews were digitally recorded, with consent, on a voice recorder. An interview guide included closed and open ended questions such as:

- How has your role changed from student to registered nurse? (Prompts: How different do you feel? What are the skills that you have acquired? What are the barriers to your learning?)
- Did you feel you were well prepared for the RN role? If not, why? If yes, Why?
- What does the term “resilience” bring to mind? (Prompts: This elicits the person’s own language)
- Tell me about the challenges you have experienced as a new graduate (Prompts: e.g. fitting in, time management, maintaining ideals, ethics)?
- What strategies did you use to help cope with these challenges (Prompts: e.g. role models, preceptors, mentors, friends, family or other creative strategies)
- Why do you think these strategies helped you?
Findings and Discussion
Following immersion in the data and the process of theoretical sensitivity (Strauss et al., 1990), multiple ways of being, all of them socio-emotional in nature, emerged as the overarching theme. (Figure 1)

Consideration was given to developing a model specific to these results, however a search of the literature using the key words ways of being revealed a pre-existing social and emotional learning model called Ways of Being which had been developed by Blyth, Olson and Walker (2015). Because this model clearly represented the emerging themes, it was then applied to the study’s findings. The model is complimentary and a good fit. Indeed, Blyth et al. (2015) encourage practitioners to map skills onto the theoretical model as a means to increase awareness and understanding about effective social and emotional supports for their learners.

The holistic concentric circular Ways of Being model (Blyth et al., 2015) represents identity, awareness and navigation in feelings, relating and doing. There are six key aspects of the model: ways of feeling, ways of relating, ways of doing, ways I am, ways I am aware and ways I navigate. These six nonlinear key aspects include relevant skills, experiences, capacities, attitudes and beliefs for social and emotional wellbeing (Table 2).
Table 2. Ways of being model: six key aspects and definitions

<table>
<thead>
<tr>
<th>Aspect and Definitions (Blyth et al., 2015, pp. 3-6)</th>
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</thead>
<tbody>
<tr>
<td><strong>Social and emotional dimensions</strong></td>
</tr>
<tr>
<td>Ways of feeling focuses on how someone makes sense of their own emotions</td>
</tr>
<tr>
<td>Ways of relating is about relationships with others and teams</td>
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<tr>
<td>Ways of doing considers how tasks and goals are approached</td>
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<tr>
<td><strong>Sublayers</strong></td>
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<tr>
<td>Ways I am integrates self-efficacy, agency and hope</td>
</tr>
<tr>
<td>Ways I am aware considers awareness of self, others and goals</td>
</tr>
<tr>
<td>Ways I navigate reflects the process of navigating opportunities and challenges to get things done</td>
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</table>

Although developed initially with a youth focus, the Ways of Being model (Blyth et al., 2015) nonetheless provides a powerful framework for comprehensive consideration of the strategies required to succeed in the culture of nursing. Social and emotional competence is increasingly being recognized as important for success in any field (Mooney, 2007; OECD, 2015; Weissbourd, Bouffard & Jones, 2013). These competencies currently exist in a number of disparate ways such as social intelligence (Walker & Campbell, 2013), emotional intelligence (Mayer & Salovey, 1993; Johns Hopkins University, n.d.), mindfulness (Ponte & Koppel, 2015), grit (Duckworth & Gross, 2014; Robertson-Kraft & Duckworth, 2014) and resilience (McAllister & Lowe, 2011). The Ways of Being model (Blyth et al., 2015) unifies these. The increased emphasis on social-emotional skills is imperative as they are now considered more important by employers than technical skills (OECD, 2015). Social and emotional capital is not only valuable for success when making the transition from student to RN but also their quality of life academically, at work and in one’s personal life (Beland, 2007).

Figure 2 maps strategies used by NGRN informants according to the Ways of Being model (Blyth et al., 2015). Firstly, within the social and emotional dimensions, are ways of feeling, ways of relating and ways of doing. Secondly, within the sub-layers are ways I am aware and ways I navigate. At the center of the model is the development of identity expressed as ways I am. Identity is considered most significant and purported to influence social and emotional development at all levels (Blyth et al., 2015).
Figure 2. Ways of being model: Ways of being strategies used by new graduate registered nurses to reconcile the ‘ways they are aware’ with ‘the ways they are’ and the ‘ways they navigate’ (adapted with permission from Blyth et al., 2015).

The strategies for success as identified by NGRNs are discussed in more detail below using the six key aspects of the Ways of Being model adapted from Blyth et al. (2015). However, before doing so it is important to note that the strategies used by NGRNs interviewed for this study developed over a relatively short time and resulted from trial and error. Their initial responses to events during their first few months may have been reactive. However, by being proactive and persistent, the NGRNs developed resilience. Along the way they may have sought professional assistance, for example, Heather, from a city hospital, found herself in a negative work environment and sought assistance through the Employee Assistance Program. After doing so she changed her approach to navigating the nurse/doctor relationship on occasions where she does not understand the rationale for a medical decision.

*Question the doctor that’s what I do, “Why are you doing that?” and my line is and which I’ve noticed at my hospital is “look I’m the nurse looking after this patient and I know that you’re the doctor but nurses and doctors think differently so explain to me your reasoning of why you’re doing it that way because next time I’ll learn and I’ll be able to pick that up for next time”. So it’s not coming back on them, it’s coming back on you, as you want to improve your knowledge. (Heather)*

In this way the NGRN retains respectful and productive relationships. The NGRN now has clarified the rationale and understands the overall goals of care more effectively. As a result many other
nursing activities can be provided, such as patient education, in an informed and appropriate way. NGRNs who can navigate their emotions and relationships achieve the best outcome for patients/clients (Kaufman & McGaughan, 2013).

Ways of feeling

The NGRNs readily described their feelings and tried to understand their own emotions when prioritizing care. Self-management strategies included letting go of not being able to do everything. These understandings require emotional competence and self-regulation. For example, Alison described how she created a mindful space to purposively stop irrational thoughts:

So you've got a screaming brain going on, you're freaking out, you know more haste is less speed basically, you just stop and think “Right what's my priorities here, I need to give these antibiotics and they need to be timely. Right we're going to get all them done”. Next, you can worry about bed making, changing sheets, you know, those other little bits and pieces that you can prioritise and, you know, a bit further down the track.

Emotional competence can be achieved by replacing anxiety with more productive thoughts, as Leslie commented:

So, I think that it became a good coping strategy to have something else to focus on, like the next day or the next patient interaction, or whatever to get it out of my head – so, I’d push all that anxiety and repetition out by replacing it with something else that was productive. *(Leslie)*

The self-management strategy of reflection enables objectification of the experience of being a NGRN. As Rachel recounted:

And being honest with your reflection on yourself and the situation that you’re in. I know I gave myself a lot of – I am only new – I can’t be expected to know everything because I am only new to this role, and nobody should expect me to know anything more than a new RN. That’s why I’ve got new written all over me.

It is important that NGRNs are able to recognize their ways of feeling and the impact on patient care. The findings of this study demonstrate that NGRNs adopt strategies to make sense of their emotions in order to provide effective and timely care to their patients (Jones, King & Wilson, 2009). To achieve this degree of emotional regulation is essential to nursing practice (Bulmer-Smith, Johns Hopkins University, n.d; Profetto-McGrath & Cummings, 2009). This requires being mindful of the irrational or overwhelming feelings and choosing to stop and reconstruct this feeling state in a more positive and objective way. Emotional intelligence can affect decision making and is considered more important than IQ with regard to future success (Yale Center for Emotional Intelligence, 2013). The skills to endure hardship, the skills of emotional intelligence and managing conflict are all strategies that assist NGRNs (Hart et al., 2012). According to Freshwater and Stickley (2004), emotional intelligence should be central to learning to care for oneself and others. Freshwater and Stickley (2004) strongly advocated that the value and development of emotions be included as a priority in the nursing curriculum in order to produce emotionally intelligent...
practitioners.

**Ways of relating**

For NGRNs, interactions and relationships with others did not always go as well as they would like. They are still learning to navigate their interactions with others and develop relationships. The predominant strategy NGRNs used was to constantly be mindful of others perceptions. They adopted the role of sensitive negotiator and protector of their nursing colleague’s self-esteem. This heightened sensitivity of some health care team members to being questioned about any aspect of patient care required the NGRN to take a tactful, non-threatening and gentle approach; if the answer is not obtained from one person then they sought it from others, but the message was to do so discreetly (Boychuk Duchscher, 2012).

As Caroline vocalized, there are many strategies for interacting with other members of the nursing team:

> It depends on the person themselves and I ask lots of questions as some people can find that intimidating even though you are doing it just for your own knowledge base and trying to develop rationales for things, but for some people it may be their personality or they have been in an environment for a certain amount of time and if someone new comes asking questions...it challenges them...even though you are not criticizing them you are just trying to say well what is your understanding of the situation.

Empathy for the experienced staff members and awareness of the possible effect of asking questions on their levels of comfort is important. The nurse who is intuitive of others perspective and mindfully takes this into consideration better navigates their work relationships. Asking questions in a positive way and being keen to learn can also develop connectedness and build warm relationships with other staff members.

> I sort of went in and was open and asked questions and I think when you have that sort of attitude that you’re really keen to learn...and I think you find people want to open up and talk to you and tell you what they do, and once you start doing that you sort of warm to that relationship. (Natasha)

During the process of professional socialisation NGRNs are extremely sensitive to the gaze of others and strive for connectedness (Malouf & West, 2011). Feng et al. (2012) also acknowledge the concerns that NGRNs have with “fitting in” and the potential influences on their behaviour. Provision of care and attention to relationships was considered an essential part of social/relationship management (Kooker, Shoultz & Codier, 2007). Successful NGRNs assert that it is important they stay true to their beliefs, are comfortable with their own practice and are aware of the cultural influences and relationship dynamics on their practice.

**Ways of doing**

The NGRNs approached tasks and goals with a willingness to succeed despite the circumstances they found themselves in. The nurses integrated cognitive factors together with ways of feeling.
They demonstrated tenacity and responsible decision-making rather than basing their decisions on their feelings of inadequacy or avoidance of shame. Their strategy is more clearly focused on outcomes for the patient/client rather than concerns for how others might perceive them and their practice. This requires moral courage (Lasala & Bjarnason, 2010). As three informants observed:

> Just don’t be scared to ask. If there is anything you want out of your program or if there is anything you need on the floor for the shift – just yell out and just ask and sometimes you will get a negative response but I think don’t let that deter you – just keep going and keep asking and someone will assist. (Natasha)

> Deal with what you need to deal with and the other stuff it will come when it comes and don’t be afraid to go “You know what! I’ve got 6 doubles at the moment there’s no way I’m going to be able to do this with me and my enrolled nurse [practical nurse or whoever you’re with], you need to give me a hand.” Don’t be afraid to ask for help. (Heather)

> I’m not scared to ask for help anymore, if I need help – that’s like when they have the board handover and they’re like what zone are you in, I’m not scared to say I’m in orange, if I’m in orange and it’s going to affect my patient, the sort of level of care they get, I’m going to say so, but when you’re a new graduate registered nurse you feel like you’ve constantly got something to prove, you feel like if you say you need help you mustn’t be doing your job properly. (Sandra)

Rather than being afraid or ashamed to ask for help the NGRNs recommend the strategy of being proactive and persistence. Not worrying about getting everything done and focusing on the important things, or getting things done with the assistance of others was an important time management strategy (Malouf et al, 2011). The focus on achieving safe outcomes for the client is reported as less stressful and assists with prioritization.

**Ways I am**

It takes time for the NGRN to develop a sense of identity (Hamilton, 2005) as the informants of this study confirm. Initially during the transition to professional practice the NGRNs felt they had limited control over their working life. As they became more experienced they developed a greater sense of agency and were more positive about the future. For example, when Leslie was under siege from patients and staff she felt little sense of control. She then decided to take back her sense of self with a renewed mindset.

> And around the same time I had a couple of rude patients that were just hard to deal with. They would just say things rudely to me, like I was their slave, order me around. And I heard someone respond to a patient one day, and I went, ‘Oh I can do that.’ And the next time a patient said something rude to me, I said, ‘you don’t need to speak to me like that, you’re allowed to ask in a nice way.’ and I didn’t acknowledge it and let myself get walked over…I took a lot of power back just by learning a couple of little sentences and ways of speaking to people without being angry but being assertive. (Leslie)

After hearing how other people stand up for themselves, and then by modelling and doing the exact same thing herself, the NGRN can obtain the power to not let patients dictate and not let other staff take advantage. They can develop a greater sense of agency. In the following excerpt a different form of personal agency is demonstrated:
In terms of shift work, it's quite hard to get used to at first, but you've just got to make sure you have a decent work-life balance which is quite hard being a nurse. Your sleep is important even though a lot of people think, ‘Oh! I can go to work on 4 hours sleep’ ... if you make a medication error then your registration can be on the line. So I think people keeping up their health and sleep is important. (Jenny)

Maintaining a healthy body through healthy eating, exercise and rest can strategically assist NGRNs with maintaining a sense of control over emotions and mental state. Another method mentioned is to observe good role models, how they interact and maintain their effectiveness both personally and professionally. Nurses who have a sense of agency, believe they are effective and imagine their own success are more likely to feel empowered (Simoni, Larrabee, Birkhimer, Mott & Gladden, 2004). The strategy of creating positive interpretations from previously unhelpful thinking assists with development of self-efficacy (Laschinger et al., 2012).

Ways I am aware

The NGRNs were aware that they had a lot to learn and that others on the medical team could help them develop competency. Successful NGRN's are intuitively aware of other people's responses to reactive behavior such as anger. Through humility they can create a cooperative and reciprocal relationship with other staff members. Dean exemplifies this:

You need to be really humble and not angry because then people react very strongly to anger, so be completely so. I think we really need to make an effort as new [graduate] nurses to offer our help or really just enquire... it means to go around and just talk to nurses and remember what they like... it really gives you a different dimension in the relationship... I might help them, and that really helps because those are the same nurses that come back later, when you ask for help they are happy to give it to you. (Dean)

Self-awareness requires social intelligence (Goleman & Boyatzis, 2008). Nursing care is performed within a social context and requires good relationships among professionals. Malouf and West (2011) discuss the vital need that NGRNs have to “fit in” to their clinical situation. Feng et al. (2012) also reported the importance of the NGRN being accepted by senior staff. Walker and Campbell (2013) identified social intelligence as a critical work readiness factor. This is further supported by Feng and Tsai (2012) with the assertion that NGRNs found “learning how to solve the gap between knowing and practising was easier than learning how to behave appropriately and to deal with people in the workplace” (p. 2068).

Ways I navigate

Initially, the NGRNs tended to navigate their emotions, work relationships and tasks alone. After meeting with limited success they were more willing to open up to others and seek additional support. It is possible to achieve excellent results with knowledge of the support networks available and thereby avoid feeling overwhelmed (Mellor & Greenhill, 2014). Natasha did this:

I pulled on Adelaide services so basically rang through to MedStar [a rural medical retrieval service] ... if you're ever in trouble there's always someone else, so for me it was like tapping
Conflict resolution is part of navigating emotions and getting things done. For example, a situation can be de-escalated when the NGRN actively listens to the doctor, provides an understanding response and maintains a calm demeanour.

One doctor came in and one of the higher staff members had ruffled his feathers and given him a real hard time, he come in, he was furious, absolutely furious. And I talked to him, I said “It's okay, it's all getting sorted, I'll go do that for you, don't worry, it's fine”. I didn't actually realise what the other person had done to ruffle his feathers, and yeah I calmed him down and one of the midwives came up to me after and said “Just letting you know you did really well in that discussion”. (Alison)

For the NGRN it is important to build social intelligence/psychological capital to assist in the event that an incident might cause personal distress (Duchscher & Myrick, 2008; Taylor, 2012; Walker et al., 2013). Effective communication between clinicians, other staff and students has been identified as a strategy to decrease horizontal violence (Curtis, Bowen & Reid, 2007; Douglas, 2014). Berry et al. (2012) found a negative effect with a significant correlation between horizontal violence and negative work productivity of novice nurses.

Overall, this study found that to succeed the NGRN has to be extremely proactive and use whatever skills and resources they can to gain the outcome they desire. Nobody can be relied upon to lookout for the NGRN so every individual has to create their own environment of support as illustrated in the Ways of Being model (adapted from Blyth et al., 2015). The informant Caroline gives voice to the dynamic interactive nature of “ways of being”:

You have got to be proactive…I have made a huge push to get where I wanted to be…you chase it…you try and create opportunities…it is not going to come to you…no one else is going to know what you want to do… you have got to get it out there and plant the seed…you don’t have to be in a rut…nursing has so many pathways…you can just go in different directions but…you have got to seek it…you can’t just sit there and complain about it…I am definitely in my happy place now.

Limitations

In this study only nine NGRNs volunteered to be interviewed. Guest, Bunce and Johnson (2006) in their study of interviews and qualitative research, found that themes and variability were often present after only six interviews and saturation was common after twelve interviews. It was also originally planned that all interviews would be face to face; however, a number of interviews took place via telephone for convenience of the informants. In order to address this possible variable, resources on telephone interviews were accessed (Wilson, Roe & Wright, 1998) and data obtained was equally rich. Interviews took place during an 18 month period (Dec 2013 - Jun 2015) due to availability of informants and access to venues with regard to ethics requirements. It is not likely
that the health cultures would change significantly during this time but is a consideration.

Age of participants also required consideration. While some informants were 20-30 years of age, others were in their 50’s. The average age of participants was approximately 35 years. Navigating the nursing culture necessarily requires individuals to develop tolerance of uncertainty and to effectively moderate their stressful experiences (Boychuk Duchscher, 2012; Duchscher, 2008). The focus of this research was to identify strategies that assist with transition from student to NGRN. As such, the Ways of Being model (Blyth et al., 2015) provides a template for self-assessment/identification of the desired socio-emotional skills in accordance with the informant’s developmental stage and experience of previous stressors. The life context in which informants were functioning is illustrated in Table 1.

**Implications for Nursing Education**

The resulting Ways of Being model could be used to inform topic development across the undergraduate nursing curriculum. In addition, the model is also a self-assessment tool that can assist nursing students in their preparation for transition. Having some fore knowledge of what can be expected during transition to professional practice and the likely scenarios NGRNs face on a personal level is critical for exiting nursing students. Throughout these interviews, clinical skills were rarely mentioned as obstacles. However, being able to deal with the culture of nursing was ever present. Schools of nursing need to recognize that social-emotional skills are as important for university graduate’s preparedness to being a RN as clinical skills and evidence based practice. There also needs to be more support to help lecturers and clinical facilitators develop and create links between RN competencies and social and emotional skills so that they are integrated throughout the curriculum.

**Implications for Future Research**

Further research needs to be undertaken with regard to the adoption of social-emotional learning strategies, including the proposed Ways of Being model, as an intervention especially in the final year prior to graduation. The relationship between social-emotional learning and outcomes for NGRNs during their first year of practice should also be further investigated. Partnerships with nursing educators and the health care industry would provide opportunities for obtaining feedback and suggestions for improvements to the proposed Ways of Being model (adapted from Blyth et al., 2015).

**Conclusion**

Throughout this study, NGRNs related the social and emotional strategies used to navigate the culture of nursing. These strategies have been illustrated using the Ways of Being model (adapted from Blyth et al, 2015). The results reinforce the complexity in the relationships between the nurse, the patient/client and other practitioners. Recognizing this complexity is critical (Burger, Parker,
Cason, Hauck, Kaetzel & O’Nan et al, 2010; Ebright, 2010) and highly developed social and emotional skills are required to navigate successfully (Kooker et al., 2007).

Organizational culture “is a complex mixture of different elements that influence the way things are done, as well as the way things are understood, judged and valued” (Kaufman et al., 2013, p. 52). As such, it must be recognized that the NGRN does not work in isolation but within an organizational environment. Unfortunately, transition to practice programs are quite often variable and most are under resourced which means that promised support is unlikely to eventuate. As a result many NGRNs have to learn the skills required to navigate the nursing culture “on the job” without support and by trial and error. By further developing skills for social and emotional wellbeing, as suggested by the Ways of Being model (adapted from Blyth et al., 2015), nursing educators can help improve this situation for future NGRNs.
References


Publication 5: New graduate Registered Nurses and the Spectrum of Comfort in Clinical Practice.

This is the second article published from the data collected from the interviews with graduate registered nurses in study 4. On revisiting the data, I identified a spectrum of comfort considerations for graduate nurses and for the experienced nursing staff supporting them. My contribution to the publication as corresponding author is detailed below. (An authorship declaration is provided in Appendix 5).

Citation


Journal impact factor: 0.74 Citations: 1 (See Appendix 4 for details)

Authorship statement and publication background

This being the second article published from the original data obtained through interviews with nine graduate nurses in study 4, there were minimal ethics requirements, apart from maintaining confidentiality and integrity.

Research design: This article emerged from data obtained through interviews with nine graduate nurses from rural and metropolitan areas, i.e., see publication 3 above: "Strategies new graduates require to care and advocate for themselves". There were a number of reasons for revisiting the data. Detailed discussion of the methodology/methods has been provided in Chapter 1.

Data collection and analysis: As detailed previously for study 4, I engaged Lucy Atkinson (research assistant and experienced interviewer) to undertake some of the interviews. I then applied a renewed theoretical sensitivity and further synthesis. My analysis revealed the concept of the "comfort zone" to be more complex than ordinarily considered. As a consequence, I drew up a unique model illustrating the spectrum of comfort (Figure 1) and constructed the tables with an underpinning theoretical framework. I also obtained feedback from Dr. Carolyn Gregoric (research associate) and adjusted for readability and clarification. I reconstructed the informant characteristics (Table 2) and selected the quotations representative of each theme. In addition, I developed the reaction and response summary (Figure 2) and Spectrum of comfort: considerations and support (Table 3).

Writing and editing: I was the corresponding author and wrote the initial draft for publication. This included the passages selected for the purpose of illustrating each element of the ‘spectrum of comfort’ in the results/discussion section. I also populated the ‘spectrum of comfort’ conceptual
model (Figure 1) and allocated characteristics appropriate to each concept in the theoretical framework, i.e., neutral, positive, and negative regions of the comfort zone. My other contributions included the design of figures/tables and manuscript revisions when responding to the reviewers. Dr. Carolyn Gregoric as first co-author, offered feedback at each stage of development, once again providing valuable perspective with regard to inclusions, conciseness, and clarity. A complete version of this publication is included on the following pages.
New graduate registered nurses and the spectrum of comfort in clinical practice

Abstract

The comfort zone is where a person consistently performs their role in an affective state devoid of anxiety and as a rule without a feeling of risk. This study challenges the notion of a singular “comfort zone” and suggests that a spectrum of comfort is a more accurate reflection of new graduate experiences. A grounded theory methodology was used to identify and explain the spectrum of comfort considerations helpful to nine new graduates amid their transition to professional practice. Emerging from the data were themes which encompassed both the positive and negative regions of the spectrum of comfort. Negative themes were: ‘feeling abandoned’, ‘sometimes I get frightened’ and ‘feeling betrayed - catching hold’, while the more positive themes were: ‘moderation of emotions’, and ‘letting go’. Each of these themes requires an appropriate response from new graduates and experienced staff. The spectrum of comfort model and practical considerations of support could accomplish this.

Throughout the first year of nursing practice, negative emotions or being “out of the comfort zone” have been reported by new graduate registered nurses (NGRNs) in the literature. The phrase being out of the comfort zone does not accurately reflect the range of comfort experiences of new graduate RNs and therefore precludes individualised and targeted support.

This article challenges the notion of a singular comfort zone and suggests a spectrum of comfort is a more accurate reflection of new graduates' experience. There is a need to competently and safely address the challenges experienced by new graduates during transition.

Background

NGRN’s report being out of their comfort zone for variable and extended amounts of time. On certain days it is reported they are out of their comfort zone for short periods. On other days they feel out of their comfort zone for most of the time (Duchscher, 2008). The expression of ‘being in one’s comfort zone’ is defined by White (2009) as having the following principle elements:

The comfort zone is a behavioural state within which a person operates in an anxiety-neutral condition, using a limited set of behaviours to deliver a steady level of performance, usually without a sense of risk. (p.2)

In accordance with the previous definition, the comfort zone is typically described as a neutral region of comfort, free of risk and challenge. Additionally, there is an array of positive and negative regions of comfort described in the literature (Brown, 2008; White, 2009). The amalgamation of these three regions of comfort is conceptualized as a spectrum of comfort in Figure 1.
Positive regions of comfort are characterized as the growth or learning zone, also called the stretch zone or the optimal performance zone (Brown, 2008; White, 2009). The negative region of comfort is experienced when an individual leaves the positive comfort region and moves into the ‘panic zone’ or ‘danger zone’. In the negative region, feelings of being overwhelmed and panic are often experienced and as a result performance suffers exponentially (Brown, 2008; White, 2009). The neutral region where there is familiarity and little sense of risk is placed off–center as White (2009) reflected that certain scenarios have the capacity to move individuals out of the neutral region and into the negative region of the comfort spectrum more quickly than others.

Table 1. Theoretical framework illustrating regions of comfort spectrum

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<thead>
<tr>
<th>Region of comfort spectrum</th>
<th>Characteristics</th>
<th>Expected performance</th>
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<tbody>
<tr>
<td>Neutral</td>
<td>Confident and happy; anxiety free; familiarity; predictable.</td>
<td>Acceptable</td>
</tr>
<tr>
<td>Positive</td>
<td>Stretching boundaries; risk; learning and achievement; circle of safety implicit.</td>
<td>Optimal</td>
</tr>
<tr>
<td>Negative</td>
<td>Fearful; stressed; overwhelmed; unsupported.</td>
<td>Compromised</td>
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</table>

Throughout the first year of nursing practice, negative emotions are often the norm, precipitated primarily by being overwhelmed by unexpected responsibility (Pinchera, 2012). The effects of these feelings of tension and resultant relief behaviors hinder social engagement and distort interpretation of any informal feedback received from members of the inter-professional team (Kim, Yeo, Park, Sin & Jones, 2018). These perceived or real threats to the psychological self are purported to result in feelings of inadequacy and insecurity so severe they can cause the NGRN to resist seeking help or avoid asking critical questions (Krozek, 2017). Other symptoms can present
such as physical or psychological illness, crying, acting out, withdrawal, irritation, anger and avoidance (Washington, 2012). These extraordinary stressors place significant demands on the NGRN’s resources of energy and ability to perform well in the context of providing safe patient care. The phenomenon of “walking on thin ice” has been a description used to depict this way of being for many NGRNs (Liang, Lin & Wu, 2018).

To address these concerns, increasing psychological capital can be beneficial (Kim & Yoo, 2018). In addition, observing successful role models, developing competency in nursing skills (Walker & Campbell, 2013), accessing supportive mentors (Kim & Yoo, 2018) and continuing exposure to the clinical environment have also been advocated. Successful overcoming of obstacles is essential to NGRN’s psychological capital and the subsequent resilience that ensues: “Studies have revealed that through the experience of a stressful event and overcoming it through being resilient, individuals emerged stronger, perform better, and become more confident and self-efficient” (Wahab, Mordiffi, Ang, & Lopez, 2017, p. 44).

Where resilience improves, reports of being in the negative region of the comfort zone spectrum are reported to reduce. The interplay between self-talk, relationships with others and the organizational culture influence the comfort zone perspective (Dwyer & Hunter Revell 2016). Camaraderie is considered an important factor to reducing stress in the health care environment (Binte, Wahab, Mordiffi, Ang & Lopez, 2017). Camaraderie requires an attuned social intelligence to effectively engage with others so that when experiencing panic NGRNs are able to access an immediate circle of support (Walker & Campbell, 2013). These feelings of insecurity are likely to continue until NGRNs are more settled into their environment and have the requisite knowledge and skills to be more confident. Consequently, with improved interpretation of relationships and a more positive lens through which they view themselves, the new graduate begins to demand respect as a valued member of the team (Mansour & Mattukoyya, 2018). The aim of this article is to explore the spectrum of comfort as a determinant of success for NGRNs and recommend appropriate support to optimize learning and performance.

**Research Method**

Grounded theory requires examination of the information collected and development of new theoretical frameworks (Glaser & Strauss, 1967). However, where it is discovered that a prior hypothesis fits the data with negligible distortion, verification or expansion of the theory is a conceivable outcome (Glaser & Strauss, 1967; Strauss & Corbin, 1990).

Thoroughness of the investigation was achieved by utilizing the four criteria of Guba and Lincoln (1989) - believability, transferability, dependability and confirmability. To provide believability, predetermined closed questions were utilized to gather informant information and open-ended inquiry was utilized to evoke richness of thought, emotion and strategies. Meetings were translated
verbatim. To help transferability, field notes were taken to supplement richness of the information and provide context to the setting (Charmaz, 2014). An audit trail is accessible for confirmability (Guba & Lincoln, 1989). Transferability is reflected in the rich depiction of the context in which the nine informants were situated and their various transition experiences. To provide reflexivity, interviews were shared between the investigator, who is a university researcher, and an accomplished interviewer who was about to embrace her transition to practice as a NGRN. The initial interview was undertaken with both investigators present so as to contextualize the questions to be asked and to ensure confirmability (Guba & Lincoln, 1989).

Ethics endorsement was provided by the Southern Adelaide Clinical Human Research Ethics committee, and site-explicit endorsement was obtained from all health units. Sources were provided with a letter of introduction, an overview of the nature of the exploration and a portrayal of expectations. Itemized questions were given to informants so consultation with partners, colleagues, or family could occur prior to giving consent. Informants were likewise educated that participation was voluntary, that they could cease participation at any time, and could decline to answer any question.

A cursory view of the data from this research has been analyzed and reported previously. However, the richness of data warranted further scrutiny. Since first publication deeper analysis has revealed significant revelations with regard to new graduate nurses and the spectrum of comfort in clinical practice. This separate examination utilizes grounded theory method to investigate the spectrum of comfort experienced by NGRNs amid their progress to proficient practice.

**Data Collection**

Nine NGRN informants volunteered to be involved from country and metropolitan South Australia. Informants were individuals who had recently completed their transition-to-professional practice program. Table 2 provides a detailed record of every informant and their background using pseudonyms for confidentiality.
Table 2. Informant characteristics

<table>
<thead>
<tr>
<th>Informant</th>
<th>Age (yrs.)</th>
<th>Family support</th>
<th>Prior non-baccalaureate practical nursing qualifications</th>
<th>Practical nurse in the same institution previously</th>
<th>Graduate nurse transition program</th>
<th>Rural/City</th>
<th>Size of Health service (beds)</th>
<th>Clinical rotations</th>
<th>Hours worked per week</th>
</tr>
</thead>
<tbody>
<tr>
<td>Caroline</td>
<td>40-50</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Rural</td>
<td>(30-60)</td>
<td>General medical, Surgical; Emergency.</td>
<td>32</td>
</tr>
<tr>
<td>Alison</td>
<td>40-50</td>
<td>Yes</td>
<td>No</td>
<td>No</td>
<td>Yes</td>
<td>Rural</td>
<td>(30-60)</td>
<td>General medical; Day Surgery</td>
<td>32</td>
</tr>
<tr>
<td>Jenny</td>
<td>20-30</td>
<td>No</td>
<td>Yes</td>
<td>No</td>
<td>No</td>
<td>City</td>
<td>(300 - 499)</td>
<td>Operating room; general medical surgical; emergency.</td>
<td>32</td>
</tr>
<tr>
<td>Leslie</td>
<td>40-50</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>Rural</td>
<td>(30-60)</td>
<td>General medical/surgical; Operating room.</td>
<td>32</td>
</tr>
<tr>
<td>Natasha</td>
<td>30-40</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>City</td>
<td>(300 - 499)</td>
<td>ICU; Medical Ward.</td>
<td>24-32</td>
</tr>
<tr>
<td>Heather</td>
<td>40-50</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>City</td>
<td>(500 - 700)</td>
<td>Stroke ward</td>
<td>32</td>
</tr>
<tr>
<td>Sandra</td>
<td>20-30</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>Yes</td>
<td>City</td>
<td>(500 - 700)</td>
<td>Hematology</td>
<td>32</td>
</tr>
<tr>
<td>Rachel</td>
<td>40-50</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>Yes</td>
<td>City</td>
<td>(500 - 700)</td>
<td>Hematology &amp; ICU</td>
<td>32</td>
</tr>
<tr>
<td>John</td>
<td>40-50</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>Yes</td>
<td>City</td>
<td>(500 - 700)</td>
<td>Hematology &amp; ICU</td>
<td>32</td>
</tr>
</tbody>
</table>

Findings

The results confirmed that NGRNs were challenged and that being in the negative region of the spectrum of comfort was an overwhelming feature of their early practice (Figure 2).

![Figure 2. Reaction & response summary (graphical representation)](image-url)
Overall, the themes identified were both in the positive and negative and regions of comfort. Negative themes were: ‘feeling abandoned’, ‘sometimes I get frightened’ and ‘feeling betrayed - catching hold’, while the more positive themes were: ‘moderation of emotions’, and ‘letting go’.

**Feeling alone and abandoned**

Feelings of abandonment, a precursor to feeling frightened, were often reported and this was expressed in a number of ways. For example:

> I just felt like I had no one and I just felt very alone…What am I going to do? But I pulled it together and I thought where else can I get help? So I was just brainstorming who can I go to? What can I do? (Natasha)

> I did feel really really stressed and knowing that I had all these other patients I had to go to and I knew I couldn’t really ask anyone else to pick up my patients because they were all in the same situation…may be another extra nurse with me, things would have been different. (John)

There was nobody to call upon, which I did try and I wasn’t supported. (Alison)

**Sometimes I get frightened:**

As a consequence of abandonment, coping with the newness, routine and many expectations of the RN role made NGRNs feel frightened. These ‘frightening’ feelings were expressed in different ways. Some found it difficult to articulate how they felt as the emotions would virtually rob them of their ability to speak. Others used descriptions that were emotive such as:

- It was really horrible.
- You do freak [out].
- [An] adrenaline feeling in my bones.
- Eyes were boggling.
- Mass confusion.

For example, Rachel was allocated to a patient who was on a noradrenaline infusion which she was unfamiliar with. Rachel did not know how to titrate the dose and describes how stressed she felt when left to this responsibility as a NGRN having not received any prior education and support. She also made the decision to not be put in this situation again:

> And it was frightening…it was like, do I put it up or do I put it down? I have no idea – it was really horrible as I had no idea. (Rachel)

Similarly, Natasha was unable to address a serious problem with a patient because all of the senior staff were busy with another emergency. She felt a range of powerful emotions including anger at being left in this dilemma as a first year NGRN. However she was mostly frightened at being abandoned:

> I felt I suppose a range of emotions from anger to despair to almost breaking down and having a big cry – what am I going to do? (Natasha)
In a further example, an NGRN identified as Sandra was asked to relieve in an unfamiliar ward when her allocated ward did not have many patients. She had been working with children and the prospect of working with adults was frightening:

When I first got sent to an adult ward I freaked out…I got there and I just panicked. They were like “Can you go and feed this man that’s had a stroke” and I’d never looked after anyone that had had a stroke - I was petrified and I went into the bathroom and I just cried and cried and cried, and I had a bit of a panic attack.

Feeling betrayed: Catching hold and not letting go
Graduates reported they were often left in situations for which they were not prepared and felt betrayed, particularly when covertly allocated a patient who required care that was out of their scope of practice. Due to having a negative experience on one occasion, the NGRN often made a pact with themselves that this would not happen again. It became instinctive to catch hold of the RN or staff member who was handing off and not end the conversation until satisfied that their knowledge of the patient, equipment and care required was complete. In this example, Rachel [all names are pseudonyms] demonstrates her concern at being left in charge of patients for whom she was not prepared or informed of:

I won’t let the [hand-off] person go until they tell me [how to manage this patient] before they leave and they won’t leave me in charge – I will not be left in charge of something that I don’t know and are told ‘That’s okay, they’re fine you don’t need to do anything’.

In the following scenario a patient with chronic obstructive pulmonary disease was admitted to the emergency department however the senior staff attributed anxiety as the underlying cause of the symptoms being experienced. As a consequence, an unsuspecting Leslie (NGRN) was assigned to this patient. Not only did she feel distressed and confused but had difficulty gaining urgent assistance when the patient suddenly deteriorated:

He was just like staring with his eyes open, and the paramedic walked behind him and shone his penlight in his eyes and said, ‘Oh they’re fixed and dilated’. So I went, ‘Oh holy crap, what do I do’ – and it was just like this mass confusion. So the doctor was looking right at me because I was in ED, so I called him over, and he didn’t realize that it was urgent, so I called him over again, louder and I like clapped at him to try and make him come. (Leslie)

Others ensured they had a back-up person to provide support when feeling overwhelmed by a patient situation. In the following scenario, while questioning her own ability as a NGRN, Caroline was still willing to respond to this cardiac emergency patient, providing that a support person was nearby:

I have answered the ambulance radio and got the impression that I was going to be in charge of this patient...and you just think... am I ready for this ?...am I able to respond appropriately and all the rest of it ?...but you do have [support]...even if its administrative support who are also nurses, you kind of...rush up to them and say...look I have got such and such coming through can you just come and be nearby...so that if I am out of my depth I can call on you... (Caroline)
Moderating emotions

Strategies NGRNs used to cope were primarily based around a change of mindset and being proactive in whatever activity they were involved. A positive “mindset” and being confident is a strategy specifically adopted by Caroline:

I do a lot of I think…positive mind…positive outcome sort of thing….a lot of you did well in your studies you know a lot of stuff …you might not have the experience… but you know you have the knowledge base and you should be able to draw upon that…try it and reassure yourself that it is going to be OK. (Caroline)

Assuming full responsibility and being proactive to achieve safe patient outcomes was also important to Heather:

So I need to do this, I need to do this…so you kind of like had a plan in your head of what you needed to do and I think that kind of got me through. (Heather)

Natasha was able to use her emotional intelligence to restore her comfort into the positive array. She was able to recognize her emotional state, interrupt her feelings of panic and adopt a strategic approach and renewed mindset:

Just work off one thing at a time, one step, if you can’t get to the last step that’s okay, as long as you’ve done your important things then you’re getting there. You’ve only got so many hours in a day and you’ve got one pair of hands. (Natasha)

Letting go – restoration of positive equilibrium

Each graduate reflected on their progress and re-interpreted their experience and approach to developing competence and confidence. As a consequence of these insights, they developed resilience and assumed responsibility for their own performance and professional development. Jenny doubted her recording of blood pressure readings which she described as “a bit low” when the systolic reading was 85 mm Hg. After reflection, Jenny made the decision to not always refer to others and to trust her own judgement:

So we had to call the MET team and so I think, now I think back about it, I could’ve escalated it earlier, I could’ve been a bit more confident about it. So I guess in terms of comfort zone, I probably shouldn’t have needed to get the senior RN to check the blood pressure, I could’ve just called the doctor straight away but it, I guess it comes with experience. (Jenny)

Heather was initially fearful of the Intensive Care Unit however she turned the situation around:

I don’t know everything but I’m willing to learn and I’m willing to put the time and the effort in so please feel free… I’m a sponge use me and abuse me. So they did and I think that’s why I think I had such a positive first 6 months in ICU. (Heather)

Alison was keen to reduce unpredictability when caring for her patients. As a result, she made the decision to restore equilibrium by being prepared as much as possible for any eventuality. Her research and increased knowledge was empowering:

Like if I was not quite sure of this medical procedure … you could always go and look it up and find a bit more information … doing a bit more studying… a bit more research and
Leslie made the decision to view the stress reaction to emergency situations as a normal phenomenon:

*I had a bad experience to start with, but then that primed me for the next time, which was a much better experience and I was a lot more functional. I think it’s just exposure to these things that helps … it’s always stressful and I think that’s quite a normal thing.* (Leslie)

**Discussion**

This study confirms that being in the neutral region of comfort was not a familiar experience for NGRNs. As a novice member of the nursing profession the NGRN is uneasy in many different contexts (Duchscher, 2008; Duchscher & Windey, 2018; Zheng, Lee & Bloomer, 2016). Most were extremely driven to leave the negative region of the comfort spectrum after a short period of time and were keen to restore a positive equilibrium as soon as possible (Herron, 2017). In instances where incomplete information was provided many NGRNs felt betrayed and as a consequence actively chose to take charge when there was a patient handoff i.e. where an unfamiliar patient diagnosis, piece of equipment or procedure was encountered, the NGRN would catch hold of the person doing the handoff and cling firmly onto this person, holding them in virtual “custody”, until their fears were addressed. As a result, panic was reduced and the NGRN able to function more effectively (Pinchera, 2012).

Graduates who were less assertive felt alone. They were reluctant to consult other staff whom they perceived as too busy to help. The risk to patient safety and their own well-being was ever-present (Ankers, 2018; Krozek, 2017 & Liang, Lin & Wu, 2018). At times they had to desist from being overwhelmed and choose helpful thinking. Their emotional labor was at times draining but most NGRNs actively moderated their emotions to overcome feelings of being overwhelmed (Moran, 2012).

NGRN’s were able to proactively establish a positive equilibrium in a number of ways. This included being proactive with their learning in anticipation of the likely patient situations to be encountered (Binte, Wahab, Mordiffi, Ang & Lopez, 2017). Reframing can be performed by adopting the perspective that being fearful in a critical situation is a normal response. This mindset enabled two NGRNs to view their inept response to an unfamiliar scenario as positive, as the prior experience enabled them to perform competently, when confronted with the same situation on a subsequent occasion (Binte, Wahab, Mordiffi, Ang & Lopez, 2017). Embracing the perceived anxiety of being a novice in the intensive care unit environment ICU was particularly helpful for one graduate, whereas other NGRNs’ reported that upon feeling anxious or uncomfortable the strategy they instinctively used was to focus on talking openly with as many people as possible. Being honest with their experiences and allowing space to reflect and gain perspective was found to be beneficial in restoring a positive equilibrium. One new graduate with
well-developed social skills found that interacting with patients was a positive way of relaxing when all around them were feeling uncomfortable (Walker & Campbell, 2013).

Experienced colleagues can do much to ameliorate the fear and uncertainty of the NGRN during the first few months of practice. Planned oversight is an important consideration as proffered by Ebright (2010, p.11) “What distribution of care delivery, or alternative assignment of RNs, would assure that every patient was assessed by an experienced RN every shift?” It is essential that purposeful support is provided, one that acknowledges the NGRN’s limited experience, affords the necessary guidance and is sensitive to the need for support and a growing quest for independence (Duchsher, 2008; Ebright, 2010; Gardiner & Sheen, 2017). There should also be a culture of camaraderie (Binte, Wahab, Mordiffi, Ang & Lopez, 2017; Sedgwick & Pijl-Zeiber, 2015) and encouragement of NGRNs to seek help from experienced staff when feelings of panic arise (Ebright, 2010). Table 3, summarizes the NGRN spectrum of comfort experience. Each phase is accompanied by recommendations for self-support and support from experienced staff:

Three negative regions were found within the spectrum of comfort - feeling alone, feeling frightened and feeling betrayed. These reflect behavioral states that elicit a sense of risk and anxiety in response to a trigger event. Rachel’s recount of panic after an incomplete handoff of a critically ill new patient on a Noradrenaline infusion is an example of this. In these instances, experienced staff need to watch-over the practice of the NGRN, verbally signal their availability to assist and ensure that handoff is complete. It is important to proactively ensure that all appropriate patient deterioration variables and MET considerations are included when handing off. With the support of experienced staff, the NGRN should feel confident that they have a complete grasp of the situation and back up if required (Brown, Hochstetler, Rode, Abraham & Gillum, 2018; Walton, Lindsay, Hales & Rook, 2018).

The two positive regions within the spectrum of comfort, “moderation of emotions” and “letting go”, reflect a behavioral state in which a change of mind-set by the NGRN avoids panic and elicits a moderated response to the trigger event. This de-escalation allows the NGRN to assess the patient situation effectively and safely. As the new graduate has exposure to the rigors of their particular clinical environment, they become familiar with their personal and workplace triggers and begin to develop a positive equilibrium in which they become more proactive with learning new skills to reduce unpredictability. It is in these phases that staff can provide a positive reassuring environment that is responsive to stress reactions and encourages personal and professional development.

The neutral region of the spectrum of comfort is included in Table 3. It is a no growth zone, performance is steady and there is little anxiety. Complacency can adversely affect patient safety. Paradoxically this neutral region is routinely called the comfort zone, a zone in which most people
want to be all of the time. Being ‘out of the comfort zone’ is viewed as undesirable and this perspective needs to be challenged.

Table 3. Spectrum of comfort: considerations & support

<table>
<thead>
<tr>
<th>Spectrum of comfort</th>
<th>Phases</th>
<th>Comfort Considerations</th>
<th>Self-support</th>
<th>Suggested support from experienced staff</th>
</tr>
</thead>
<tbody>
<tr>
<td>Negative</td>
<td>Feeling alone and abandoned</td>
<td>Left alone – no idea what to do</td>
<td>Recognize feelings as normal</td>
<td><strong>Watch over</strong> – plan to care for the NGRN &amp; provide oversight. <strong>Assist</strong> – be available to assist as necessary.</td>
</tr>
<tr>
<td>Negative</td>
<td>Sometimes I get frightened</td>
<td>Afraid for themselves and their patients</td>
<td>Recognize feelings as normal.</td>
<td></td>
</tr>
<tr>
<td>Negative</td>
<td>Feeling betrayed: Catching hold and not letting go</td>
<td>Refusal to be denied support &amp; critical clinical information</td>
<td>Expand circle of support.</td>
<td><strong>Rescue</strong> – proactively ensure that all IMET considerations are provided/educate when transferring care to a NGRN.</td>
</tr>
<tr>
<td>Positive</td>
<td>Moderation of emotions</td>
<td>Adoption of strategies to cope with emotions</td>
<td>Positive mindset and perspective taking</td>
<td><strong>Provide hope</strong> – Observe for stress reactions. <strong>Encourage</strong> – provide exposure to new skills, support, constructive feedback &amp; encouragement. Provide emotional support</td>
</tr>
<tr>
<td>Positive</td>
<td>Letting go – restoration of a positive equilibrium</td>
<td>Trusting own judgement, change of mindset &amp; perspective.</td>
<td>Be proactive with learning and skills, reduce unpredictability</td>
<td><strong>Foster interdependence</strong> – encourage development of skills through planned exposure to critical situations &amp; debrief. <strong>Prepare</strong> for potential critical scenarios.</td>
</tr>
<tr>
<td>Neutral</td>
<td>Little anxiety</td>
<td>Feeling confident – steady level of performance</td>
<td>Be aware of complacency, continue to be proactive</td>
<td></td>
</tr>
</tbody>
</table>

Note. NGRN = new graduate registered nurse

**Limitation considerations**

In this study nine NGRNs volunteered to be interviewed. Guest, Bunce and Johnson (2006) in their study of interviews and qualitative analysis, found that themes and variability were usually identified following only six interviews and saturation was anticipated after twelve interviews. The original choice of data collection was to be face to face via interview; however, it became necessary to interview some participants via telephone for convenience of the informants. In order to not compromise the study with this variable, resources on effective telephone interviews were accessed (Wilson, Roe & Wright, 1998) and as a consequence the richness of data was preserved. Interviews took place throughout an eighteen month period because of limited access to informants and access to venues with respect to ethics approval. It is unlikely that the health cultures would change considerably throughout the extended interview period however this is a possibility. The prior non-baccalaureate practical nursing history of many of the respondents may influence the outcomes however it is usual for ENs (practical nurses) to require the same level of
support as other RN graduates and hence conceal their past experience:

Surprisingly, GNs who had previously practiced as ENs (practical nurses) preferred not to be identified as having previous nursing experience. This was because they feared being treated by their nurse managers as already capable of practicing as RNs. In reality, this group of new RNs needed support like any GN. (Cubit & Lopez, 2013 p. 210)

The age of the participants additionally needs consideration. Some informants were twenty to thirty years of age, others were in their 50s. The average age of participants was thirty five years. This demographic is consistent with the various studies reviewed (Cubit & Lopez, 2012) however slightly higher than the average entry level of approximately 26.9 years in Australia (Gaynor et al., p.16) and 30 years of age in the US (Allied Staffing Network, 2017). The average nursing workforce age is 44.4 years in Australia (AIHW 2015, p.1) and age 51 years in the US (Allied Staffing Network 2017). Further detail of the life context in which informants were functioning is provided in Table 2. The result of such multi-level influences was studied in detail by Dwyer and Hunter Revell (2016, p. 113) and it was found that undergraduate preparation was the most significant variable and “relatively few demographic variables consistently influenced transitional outcomes”. In addition, all of the informants participated in a standardized graduate program for government hospitals, which included orientation, preceptorship, and clinical rotations. However, it is recognized that interpretation of the curriculum, organizational culture, and resources available when implementing the graduate program could vary at different locations (Table 2). Further research including systematic evaluation with control groups of the interventions inherent in graduate programs is recommended in order to determine their effectiveness.

Conclusion

This study challenges the notion of a singular “comfort zone” and suggests that a spectrum of comfort is a more accurate reflection of NGRN experiences. A number of regions within the spectrum have been identified. These regions are not linear but recursive as different situations arise. The three negative regions on the spectrum include feeling abandoned; feeling frightened and feeling betrayed. In response to the resultant panic and distress, more experienced clinicians need to be aware of these reactions and respond effectively to ensure the emotional well-being of the NGRN and provision of safe patient care. The positive regions within the spectrum include taking charge through proactively seeking support and critical clinical information, moderation of emotions and finally “letting go” as the NGRNs begin to change their mindset and restore a positive equilibrium. Navigating the spectrum of comfort is a significant challenge for NGRNs but with support they can succeed. These findings may assist NGRNs and clinicians with further contextualizing the transition experience and nature of support required by graduates.
References


CHAPTER 5. CRITICAL DISCUSSION AND RECOMMENDATIONS

Chapter overview

Chapter Four presented all the publications for this thesis on which I was first author and primary contributor to the conception, underpinning research, and writing of the manuscripts. This sum of publications and the associated research represent a composite body of work and new revelations. In Chapter Five, this aggregate will be discussed as overall findings. In accordance with the purpose and aim of this study, further knowledge and theory has been generated about graduate nurses in transition. The spectrum of factors and perceptions that have an impact on graduate nurses and their passage to competent professional nurse, from the perspectives of Australian graduates and the published research, have been elucidated. In parallel with the experience of Cinderella, unreliable support is discussed in the form of the adverse health culture, attitudes, and incivility, including illusions of support rather than genuine support. In response to these factors, an answer is provided to the following question: ‘How do nursing students successfully transition to graduate nurse?’ Authentic engagement with nursing students is recommended as is the need to advocate for self-belief and resilience. Adoption of “ways of being” and the capacity to self-regulate in concert with the “spectrum of comfort” is also advocated for. A more delicate balance between the idealistic and realistic nature of nursing is proposed as a philosophy for the preparation of nursing students for the real world. A conceptual model and detailed recommendations are made, which include implications for nursing organisations, undergraduate preparation, and further research. As previously articulated, the discourse continues to parallel the experience of graduate nurses with that of Cinderella and her experience of oppression.

Introduction and background

The focus of this thesis has targeted the point of intersection where the graduate nurse, further paralleled in this critical discussion section as Cinderella, assumes the role of registered nurse following graduation. Central is the notion of preparedness to perform the function expected, when in actuality, the role of the graduate nurse is not fully defined in terms of the comprehensive skill set required (Masso et al. 2019). Most current nurse education curricula disproportionately focus on hard skills such as taking blood samples and other technologies; however, the “soft skills”, or the socio-emotional qualities to successfully perform these skills, is overlooked (Laari & Dube 2017). Graduate nurses strive to be part of the team; however, they find that they cannot rely on the health care system for support (Malouf & West 2011). This was evident in all of the reviewed studies. Nursing students are initially embraced by the nurse education community and provided with an ideal perspective on the world of nursing. Cinderella had a birth mother who provided excellent parenting and nurturing (the ideal world of education); however, when her mother was killed by her cruel step-mother, her world changed (harsh reality). The body of work that has been
presented in this thesis has critically examined the harsh reality experienced by graduate nurses. Two underlying themes were identified. The first is the unreliable support provided by the health care sector during transition. Second, the consequential need for a transposition of thought from an expectation of support during transition to a model where graduate nurses are to advocate and care for themselves. It is acknowledged that reconceptualisation of transition to a self-support model (see Figure 1) will present challenges for graduate nurses; however, it is also anticipated that authentic engagement with regard to the concrete reality of practice will be beneficial. The “ways of being” model when used in concert with the “spectrum of comfort” and “self-initiated support” builds a virtual zone of proximal development (ZPD) for the graduate nurse. The zone of proximal development is defined as:

the distance between the actual developmental level as determined by independent problem-solving and the level of potential development as determined through problem-solving under adult guidance, or in collaboration with more capable peers (Vygotsky 1978, p. 86).

Initially, there should be opportunity for undergraduate student engagement with nurse teachers who are more knowledgeable about the socio-emotional skills, the nature of transition, and social interactions which allow nursing students to imagine their success as graduate nurses (Smith & Sweet 2019). Secondly, “ways of relating” to more capable others during their transition year is enhanced as a consequence of these discussions. Caroline demonstrates below some of the many cognitions graduate nurses process to facilitate their ZPD (Mellor & Gregoric 2016, p. 335).

It depends on the person themselves and I ask lots of questions as some people can find that intimidating even though you are doing it just for your own knowledge base and trying to develop rationales for things, but for some people it may be their personality or they have been in an environment for a certain amount of time and if someone new comes asking questions...it challenges them...even though you are not criticizing them you are just trying to say well what is your understanding of the situation (Caroline).

Such conversations exemplify self-support, illustrate “ways of relating” to more capable others, and empower the graduate nurse as they confront the social interactions that are deemed critical to ontological development and learning (Ewertsson, Bagga-Gupta & Blomberg 2017). Graduate nurses who are prepared for the health care culture are likely to find that “reality” will likely objectify their experience and be less inclined to propagate the unsocial elements of the past. Patient safety is paramount in these considerations. Graduate nurses that are able to effectively navigate the health care culture will advocate for themselves and their patients effectively. Nurses must resist the view of themselves as being an oppressed group with a substantial group-think mentality (McAllister & Lowe 2011). Cinderella respectfully resisted being a victim, adopted new ways of being, and was ready to change the world. The essential elements of the argument and its context will now be discussed.
Adverse health culture, attitudes, and incivility: Step-mother and the ugly step-sisters

Graduate nurses having completed three years of intense study, believe they have found a new home (the graduate support program); however, they find themselves struggling with a transition that threatens to derail them. Cinderella had to cope without support from her new step-mother (the health culture). Her ugly step-sisters (ward attitudes and incivility) had little insight, and unwittingly perpetuated enslavement to the old order and remnants of the ways things were. Such over-work is prevalent in modern nursing life and burnout a constant threat. A combination of over-work and under-appreciation is characteristic of today’s experience as well as that of the distant past (Kramer 1966; Masso et al. 2019). Transition programs are reported by graduate nurses as a separate entity (an external program with study days) to the clinical environment, as illustrated by this graduate nurse, “I think the GNP (Graduate Nurse Program) program is great but it is just the hospital things that the hospital could change” (Mellor 2009, p. 41). Preceptorship, workplace orientation, and other key clinical support strategies were reported to be overlooked, incomplete, or not prioritised and, in many instances, did not occur (Mellor & Greenhill 2014). Preceptors were rarely prepared for their roles, or did not fulfill their role, little feedback on performance was provided, and the graduate nurse (Cinderella) often had to work alone (Lea & Cruickshank 2005; Mellor & Greenhill 2014; Parker et al. 2014).

Illusions of support: A story of neglect

The issue of neglect and lack of support for graduate nurses (Masso et al. 2019) continues to pervade the nursing profession, with issues of incivility and being abandoned to make decisions beyond preparation and experience, as well as situations that marginalise the graduate nurse in the workplace (Mellor & Greenhill 2014). Why do some graduate nurses thrive in the long-term and others fail? Were some graduates in likeness to Cinderella, succeeding not from the transition program, but from some other factor which should be attributed for filling the gaps? This factor was discovered to be the development of their own individual self-support. Unfortunately, health services are iterations of Cinderella’s step-mother and her own self-interest. Transition programs are primarily offered by health services in order to attract, recruit, and exploit graduate nurses. There is minimal evidence to show they are effective in assisting with transition.

Much of the research on effectiveness has focused on organisational outcomes such as staff turnover and retention, job satisfaction and cost effectiveness, rather than identifying improvements in the skills, knowledge and attributes of new-graduate RNs (Masso et al. 2019, p. 33).

As a result, little refinement or improvement of support is offered to graduate nurses. There are many permutations with regard to prerequisites, preclusions, inclusions, and exclusions associated with transition programs, and as such, they are unreliable as support mechanisms for graduate nurses (Mellor, Gregoric, Atkinson & Greenhill 2017). The repercussions of using the term “program” in their titles is to place emphasis on an education program and then neglect to provide
much needed clinical support. Consequently, many “programs” dutifully use their resources to re-teach theory already taught at university, i.e., pharmacology, basic life support, leadership, etc., which only adds to the burden of transition. In addition, transition programs are not routinely screened for quality using appropriate research methods. Evaluation might occur in the form of a satisfaction questionnaire/feedback opportunity with their employer at an exit interview and without the confidence of anonymity. Furthermore, the fullness of transparency is not reported in the literature with essential elements often neglected, creating difficulty for the reader to assess their effectiveness. Such incomplete reporting provides challenges to the replication of such a program, precludes undertaking of comparative studies, and compromises ongoing development through research (Mellor et al. 2017; Masso et al. 2019).

Self-belief and resilience: More than a hand-maiden
Patricia Benner consistently emphasised the need for graduate nurses to work with attending experienced staff (Benner, 2004). If organisations do not routinely provide graduate nurses with attending experienced staff, as is consistently reported (Mellor & Greenhill 2014; Bennett 2012; Parker et al. 2014; Mellor et al. 2017), how is supervision to be enacted? Whose responsibility is it to ensure that the graduate nurse works with experienced staff, particularly when supporting the graduate nurse is contrary to the self-interest of the ‘experienced staff’, i.e., if a senior nurse is looking for a team leader, any “pair of hands” will often suffice. Is it not the graduate nurse who is accountable and who shoulders their novice/advanced beginner status with them wherever they go? The responsibility for safe and rewarding practice is firmly located within the graduate nurse as the dependent variable. Cinderella understood this principle and knew that she was more than a hand-maiden. She believed in herself enough to know that the way she was treated in no way reflected who she actually was. The moment she realised that she could self-initiate her own support, she relinquished the power others had over her. Cinderella developed a mindset of resilience in the face of severe bullying, physical violence, and harassment. Informal self-support proved to be the beginnings of an evolving theme. Self-support is aligned with resilience and how the graduate nurse might assert themselves and seek help. Examples include the confidence to ask for feedback on their performance (Gardiner & Sheen 2017), request debriefing following the death of a patient, or communicate effectively with other health professionals (Walker & Campbell 2013; Shinners et al. 2016; Zheng et al. 2016).

Self-support is demonstrated by Cinderella when she exhibits the socio-emotional qualities of self-efficacy, self-control, emotional regulation, and planfulness.

... planfulness consists of three interrelated facets that map on to the broad cognitive strategies that self-regulation research shows to be reliably associated with improved goal outcomes in experimental settings: temporal orientation (TO) to the future implications of present behavior, mental flexibility (MF) in contextualizing one’s actions in terms of one’s goals, and cognitive strategies (CS) to anticipate and deal with potential obstacles (Ludwig et al. 2018, p. 2).
Cinderella transformed her outlook, and as evidenced by successful graduate nurses, had the confidence that she could effect change and exert control over her circumstances (Mellor & Gregoric 2016; 2019). Such findings are reflected in the experiences of graduate nurses elsewhere in Australia and internationally (Liang et al. 2018). The likelihood that graduate nurses will find themselves in a chaotic, dysfunctional, or unsupportive work environment such as that experienced by Cinderella, remains quite high and the following questions emerge (Parker et al. 2014; Masso et al. 2019): How do nursing students successfully transition to graduate nurse? What are the strategies adopted by graduate nurses who succeed? How do they transcend incivility, and issues of being left alone to make decisions beyond their experience? How do they cope with cultural issues that marginalise the graduate nurse in the workplace?

Emotional illiteracy is responsible for many social evils, including mental illness, crime, and educational failure (Scheerens et al. 2020, p. 4).

Cinderella believed in herself enough to know that the way she was treated failed to reflect who she actually was. She did not let the perpetrators define her, never complained, and had plans to forgive them. The moment Cinderella realised that she could initiate her own self-support, she relinquished the power others had over her.

Ways of being: Transformation and the fairy godmother effect

It is anticipated that graduate nurses prepared with “ways of being” and the magic of insightfulness into the transition process will be transformed (Mellor & Gregoric 2016). Previously, research in which the individual graduate nurse had the opportunity to detail their own experience of self-support or “ways of being” had not been forthcoming. The development of a body of knowledge that would enable graduate nurses to take an active role in the process of transition, rather than passively reacting to the scenarios that would present, was critical. It is therefore recommended that undergraduate nursing programs prepare graduate nurses for transition by laying the foundations for self-support. If graduate nurses are not getting special invitations to the ball, they need to self-advocate and not be resigned to failure. They need to consult a mentor (fairy godmother) and be strategic. As soon as Cinderella’s rags were replaced majestically with the first ball gown (ways of being), and upon her feet the glass slippers (reflecting the light of wisdom and insight), no-one recognised her, as she was transformed so completely, she became a different person. Her world changed. Self-support is transformative and when embraced, more reliable, as it empowers the graduate nurse with “ways of being” that will accompany them throughout their career and wherever they transition to in nursing.

Table 1 below illustrates the thread of self-support which weaves through each of the publications submitted for this thesis by prior publication. Exemplars are provided to illustrate the connections and provide an element of confirmability. Publication 1 illustrates the beginnings of enlightenment and illustrates clearly that graduate nurses had to self-initiate many of the “positives” in their
program, i.e., their own support. Publication 2 illustrates that the components of transition programs are quite different from that which were promised as they were not based on evidence, and were extremely variable and ill-defined. This predates the need for nursing student preparation in the form of self-support. Publication 3 identifies the plethora of issues faced by graduate nurses and the self-support strategies identified in an extensive review of the literature, and informs the subsequent study discussed in publication 4. Publication 4 presents the “ways of being” self-support model, a grounded theory emerging from interviews with nine graduate nurses. All the interviewees had insightful and meaningful contributions that would prove valuable for the next generation of nursing students when preparing for their transition year. The final publication (publication 5) asks a different question of the interview data and affirms that graduate nurses initiate their own self-support across the spectrum of comfort. By assembling the self-support strategies adopted by successful graduate nurses and exploring the issues which have an impact on their capacity to successfully navigate their transition year, curricula can be developed to provide the appropriate education and resources (Masso et al. 2019). The contribution of the health care environment to the transition of graduate nurses has received a great deal of attention as illustrated previously. However, discussion with regard to the contribution of the academic environment and best practice in relation to addressing reality shock and self-care needs have been minimal (Graf et al. 2020). How can universities better prepare graduate nurses to take control and become professionals and leaders who can objectively experience the transition and learn from it? Self-support aligned with resilience is actioned by successful graduate nurses in order to successfully navigate their first year of practice. The “ways of being” self-support model enables undergraduates to firstly self-assess their preparedness (zone of actual development) for their transition year; and secondly to consult with the compendium of strategies and practical exemplars illustrative of self-support, i.e., zone of proximal development (Mellor & Gregoric 2016; Impedovo et al. 2018; Masso et al. 2019).
<table>
<thead>
<tr>
<th>Publications</th>
<th>Inconsistent support</th>
<th>Self-support</th>
<th>Exemplars unifying the need to prepare graduate nurses for self-support</th>
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<tbody>
<tr>
<td>Publication 1</td>
<td>Clinical support not considered part of a graduate program.</td>
<td>Informal self-support frequently cited by focus group informants.</td>
<td>Example of informal self-support (Mellor 2009, p. 42). “I have gained quite a lot of positives out of this GNP too…ALL of my own making…The GNP if you’ve got difficulty…communicating with people or you are shy it might not be as good. It’s hard to really talk about the stuff that needs to be improved…so we’re talking about the negatives. But I think that is a negative in a sense because I’m the one that had to be initiating all the positives”: Lesley (graduate nurse)</td>
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<td>Mellor &amp; Greenhill (2014)</td>
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<td>Publication 2</td>
<td>Components of transition programs extremely variable and ill-defined. Not based on evidence.</td>
<td>Preparation for self-support is identified as an expedient consideration.</td>
<td>An example predicking the expediency of preparation for self-support is where organisations espouse preceptorship support, and graduate nurses find a different reality, i.e., “a low-support preceptorship model where the preceptor is available for questions but does not share the workload with the new RN” (Mellor, Gregoric, Atkinson &amp; Greenhill 2017, p. 27).</td>
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<tr>
<td>Mellor, Gregoric, Atkinson &amp; Greenhill (2017)</td>
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<td>Publication 3</td>
<td>Identifies in the literature a myriad of issues/ self-care strategies relevant to beginning graduate nurses.</td>
<td>A self-support spectrum is framed to address the issues. Recommendations are made for further research.</td>
<td>An example of a need for self-support surrounds the often reported lack of feedback. “Although many of the informants felt strongly about their own responsibility and need to pursue help if necessary and not to be deterred and not to be reluctant…they reported that they would have benefited from constructive feedback about their performance” (Parker et al. 2014, p. 154).</td>
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<td>Mellor, Gregoric &amp; Gillham (2017)</td>
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<td>Publication 4</td>
<td>Evidence of the extent that graduate nurses self-initiate their own support. A “Ways of being model” emerged.</td>
<td>The “Ways of being model” provides graduate nurses with the essential skills to be self-supporting when mitigating the nursing culture.</td>
<td>This example of self-support is valuable for all graduate nurses: “I had a couple of rude patients that were just hard to deal with… like I was their slave. And I heard someone respond to a patient one day, and I went, ‘Oh I can do that.’ And the next time a patient said something rude to me, I said, ‘you don’t need to speak to me like that, you’re allowed to ask in a nice way,’ and I didn’t let myself get walked over…I took a lot of power back without being angry but being assertive.” (Mellor &amp; Gregoric 2017, p. 12).</td>
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<td>Mellor &amp; Gregoric (2017)</td>
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<td>Publication 5</td>
<td>Affirmation that graduate nurses self-support across the spectrum of comfort. Negative, positive, and neutral.</td>
<td>Self-support/strategies to ameliorate the spectrum of comfort were revealed.</td>
<td>Self-support strategies to mitigate being left in charge of patients for whom the graduate nurse was not prepared or informed, i.e., Catching hold and not letting go: “I won’t let the [hand off] person go until they tell me [how to manage this patient] before they leave… I will not be left in charge of something I don’t know about and be told “That’s okay, they’re fine you don’t need to do anything.”</td>
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<tr>
<td>Mellor &amp; Gregoric (2017)</td>
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The spectrum of comfort: departure from the ball at midnight

The comfort zone is where a person performs his or her role in an effective state devoid of anxiety and without a feeling of risk. However, due to the “spectrum of comfort” responses from the interviews with the graduate nurses, it was found that to be either in or out of one’s comfort zone was too simplistic (Mellor & Gregoric 2019). From this premise, and significant engagement with the relevant literature, an expanded view encompassing a spectrum of comfort emerged. The “spectrum of comfort” highlights targeted interventions which complement the strategies graduate nurses use to mitigate their responses to stressors within the health care system. Themes were identified that encompassed both the positive, negative, and neutral regions of the spectrum of comfort, all of which require an appropriate response from both clinicians and graduate nurses. The self-regulation evidenced in the restraint exhibited by Cinderella when she leaves the grandeur and excitement of the ball at midnight was profound. To depart from the ball at midnight required planfulness, or Cinderella would risk morphing back to her former state of being, and lose touch with the essential realities of everyday life. Such self-regulation is one of the ‘ways of being’ (protective factors) indicative of self-support and resilience in graduate nurses (i.e., the positive zone for growth, learning, and optimal performance reflected on the spectrum of comfort).

This study reconfirms that the expectation of support from health services cannot be a presumption. Ever-present is the concept of self-support as an underlying theme. Graduate nurses need to risk manage their limited experience by adopting self-support behaviours to mitigate against adverse events, such as disallowing any staff member to dismiss their concerns of patient care when handing off or handing over (Mellor & Gregoric 2019), not permitting themselves to be shamed into not protecting patients from harm, or performing best practice due to fear of retribution. The celebration of evidence-based practice should be the norm instead of socialisation (being pressured) into providing a lesser standard of care based on hearsay and tradition. Development of a body of knowledge informing graduate nurses of ways to self-initiate their own support is important.
Figure 1. Nursing student transition to professional practice: a self-support model

Ways of being explain the social and emotional strategies graduates use during the first year of practice. The Ways of Being model includes ways of feeling, ways of relating and ways of doing. Many have to learn the skills required to navigate the nursing culture “on the job” without support and by trial and error. By developing student skills for social and emotional wellbeing, nurse teachers can assist with graduate transition.

The Spectrum of comfort is a reflection of the graduate experience. The three negative regions in the spectrum include feeling abandoned; feeling frightened and feeling betrayed. Each region of the spectrum of comfort requires educational preparation so students develop an effective response.

Strategies of self-initiated support includes student exploration of personal self-support, social intelligence, the need to fit into the organizational culture, minimize horizontal violence; recognize and regulate emotions or moral distress. Enacting any one of these strategies is purported to be a significant determinant of “well-being” outcomes for both the graduate and the people in their care.
The power of idealistic-realism: The Prince and Cinderella

Can the research and knowledge around the transition from nursing student to successful graduate nurse be encompassed in a self-support model? A model (Figure 1) for supporting graduate nurses with transition that is non-dependent on any contribution from health units is critical, because this is the likely outcome in the current and future healthcare environment (Masso et al 2019). Cinderella followed the directions of her godmother (more competent other) and was successful at returning home by midnight on two successive occasions; however, in her rush to meet the midnight deadline on the third night, she lost one slipper. This was paradoxically a fortunate twist as it clarified the need for balance between the two slippers of idealism and reality. Separately, these qualities are limited and ineffective, as Cinderella found that she could only walk effectively with a glass slipper on both feet. Nurse teachers have a tendency to reject the realistic slipper in the hopes of embodying their ideal of perfection, and in doing so, create a generation of ‘crippled’ graduate nurses who are unprepared for reality.

This final episode reiterates that the likelihood of “inconsistent support”, coupled with the requisite need for graduate nurses to proactively care and advocate for themselves, reconceptualises transition to practice. Cinderella had no support from her family, but was successful in creating opportunities through her own “ways of being”. Cinderella was determined and able to advocate and care for herself. She transcended her “spectrum of comfort”, and approached the prince to try the slipper as herself (real), and not as the prince knew her (ideal). Fortunately, the slipper of reality fit perfectly. The tension between idealism and reality was reinstated. Wisdom was hence restored.

Preparation of nursing students for the real world of nursing that they will encounter as graduate nurses will assist with building self-support. Allowing the student to reimagine their own identity and perception of self through reflection on their own ways of being and spectrum of comfort will enhance their relationships with staff and others (Blyth et al. 2015). Such opportunities will guide how they might develop connections (thus extending their zone of proximal development), and navigate the cultural norms of the health culture, and by what means “fitting in” can be achieved (Laari & Dube 2017).

The outcomes of this research have been translated to empower (NURS3006) third year nursing students in the College of Nursing and Health Sciences at Flinders University. My contribution has built upon Kramer’s (1974) research. It identifies the contemporary harsh realities (Mellor & Greenhill 2014; Mellor, Gregoric, Atkinson & Greenhill 2017) and their resolution (ASP) derived uniquely from graduate nurses (Mellor, Gillham & Gregoric 2017; Mellor & Gregoric 2016; Mellor & Gregoric 2019) who have recently travelled this path. This research and knowledge around the transition from nursing student to successful graduate nurse can be encompassed in a self-support model as a bridge of empowerment transforming the nursing student to the “ways of being” and
“spectrum of comfort” of the graduate nurse.

**Strengths of the research**

The purpose of this study was to generate further knowledge and theory about graduate nurses in transition. The specific aim was to explore the spectrum of factors and perceptions that have an impact on graduate nurses and their passage to competent professional nurse in Australia from the perspectives of graduates and the published research, and to find a model of addressing this problem. How do nursing students successfully transition to graduate nurse? Rigorous application and evaluation using the appropriate quality criteria and methods have been employed during this research to reflect credibility, transferability, dependability, and confirmability.

In Chapter Two, a discussion of the individual studies was undertaken with regard to the methods and methodology used. A diverse perspective was gained from graduate nurses who were participants in the GTM studies. The participants originated from a variety of health care settings in South Australia, including rural and city locations. Respect for the participants has been described in detail, as research integrity is contingent with the obtaining of trustworthy responses from participants. In addition, the studies were completed in consultation with experienced researchers, as detailed in Appendix 1. Their counsel also provided perspective, advice, and moderation with regard to the research activities. The interview and focus groups questions were carefully tested and crafted, taking into consideration the potential for bias. All were reflexively considered. As a consequence, multiple views were garnered, which revealed rich description of sufficient quantity. All the studies were demonstrated to have appropriate levels of rigour against established criteria. Additionally, external validation has been evidenced by acceptance of the five publications in quality peer-reviewed journals. Such peer review acceptance reinforces the uniqueness of the works presented for this thesis and provides assurance of originality and relevance.

As an adminicle to the studies presented in this thesis, a comprehensive integrative literature review was undertaken to establish a contemporary knowledge base, and to reaffirm the nature of the previous research. As a result, this reaffirmation establishes that this thesis is unique and has made a significant contribution to the existing body of knowledge around transition to professional practice. It is anticipated that the conceptual modelling developed as a result of these studies/publications will further inform education, practice, and policy development in Australia and internationally. Further research is recommended to determine the most effective ways to teach these strategies, to verify their effectiveness, and identify possible further inclusions that will improve the capacity of graduate nurses to be successful during transition.

**Limitations of the research**

There are a number of limitations of which to be cognisant when applying the findings of this research. The outcomes from this thesis need to be applied judiciously against relevant related
research where appropriate. For the GTM studies, recruitment was problematic at times. Despite an extensive recruitment effort and close collaboration with health services, participants were difficult to acquire for interview. In addition, each of the health services from which graduate nurses were recruited had unique characteristics that may affect the transferability of the findings. The GTM studies were also limited to South Australia, and therefore, claims for transferability both nationally and internationally need to be carefully considered. For the literature review and critical review studies, limitations were also possible when searching the databases. Identifying relevant peer-reviewed publications with a focus on “nurses in transition” or “transition programs” was challenging. Titles were often not transparent and their description insufficient to address the inclusion/exclusion criteria effectively. While steps have been taken to minimise bias by being actively reflexive, particularly with regard to the researcher’s personal experience, background, and interpretations, there may be transparencies that have been overlooked. Personal experience as a registered nurse, transition program coordinator, lecturer, and researcher could have had an impact on my ongoing synthesis of the research data and potential bias. As such, any claims or recommendations made in this thesis will be contextual to the limitations expressed.

Despite these limitations, the research question, ‘How do nursing students successfully transition to graduate nurse?’, was answered. New knowledge has been created on the subject of graduate nurse transition forming a unique and beneficial contribution to the body of knowledge.

Recommendations

Implications for practice, organisational practice, and transition programs

Graduate nurses, in the same way as Cinderella, are especially vulnerable to self-neglect and unfair treatment due to inexperience and their limited tenure. Graduate nurses need to feel validated by their leadership and supported as individuals. Validation promotes acceptance by members of the team and their preparedness to help graduate nurses succeed. Nurse Managers need to be cognisant of these factors to avoid exploitation with the burden of over-work, i.e., the expectation that graduate nurses will be constantly available to fill gaps in service delivery. It is also recommended that the workplace support graduate nurses in their professional and personal growth by keeping them informed of any organisational changes or developments, providing access to further education, and access to resources within the organisation. Each graduate nurse should be allocated a dedicated preceptor to work with them on the same shifts. Preceptors also need education and allocation of time to enable them to fulfil their teaching role. The effects of workplace incivility and horizontal violence from fellow nurses and supervisors was frequently reported by graduate nurses as their most destructive obstacle, and predisposed graduate nurses to mental ill health. Prevention of violence begins with the attitude that experienced nurses have towards new nurses, who should be respected and valued as important members of the health care team. Graduate nurses did not have a fairy godmother to mentor them, and were found to be
severely exposed during their first year of practice, with mental health risks such as emotional fatigue, doubt, and cynicism ever present. The need for counselling of graduate nurses and increased emotional support from their nursing colleagues and inter-professionally is recommended. This includes provision of copious amounts of quality feedback to mitigate possible graduate nurse distress. Nurse administrators, transition program coordinators, and preceptors should be aware of these concerns and have adequate educational preparation for their roles of support and guidance.

**Implications for the nursing curriculum, clinical education, and preparation of nursing students for the realities of transition**

It is evident that many health care organisations do not provide consistent support, or any support at all, for graduate nurses. It is therefore recommended that undergraduate nursing programs prepare nursing students for transition in advance. There is an obligation to include the psychosocial perspective in the university curriculum. This can be achieved in a number of ways. The first is the issue of clinical experience, where there are reported gaps in nursing students' responsibilities compared to those of the practicing registered nurse. These gaps need to be closed so that nursing students are practicing the actual role of the registered nurse and not a convenient version that fills in time. It is recommended that the research and knowledge around the transition from nursing student to successful graduate nurse be encompassed in a self-support model. There is a need to have a comprehensive self-support model for undergraduate students, i.e., 'ways of being', which includes self-support, self-care, and self-advocacy, in the nursing curriculum. Self-support, where embraced, is more reliable than a transition program as it empowers and transforms the graduate nurse with skills that will accompany them throughout their career and wherever they transition to in nursing. Undergraduates need to be aware of the reality of transition and how to navigate the health care culture. Teaching of communication skills that focus on relatedness and building of relationships is important when adapting to stress and social acceptance. Such relationship building is considered critical, and communication an essential facilitator of relatedness. Finally, emotional intelligence, self-motivation, planfulness, and taking the initiative to seek help, were significant strategies adopted by resilient graduate nurses in order to feel safe and not overwhelmed. These self-support qualities need to be fostered in nursing students prior to graduation.

**Further research into transition/graduate qualities**

There are ways of being which have already been identified through this research; however, this requires an ongoing process of discovery; a holistic and comprehensive expose on the elements of transition that are challenging for graduate nurses. The first requirement is to acknowledge the totality of the role of the graduate nurse. Many of the required learnings are not called out, as stated earlier. For example, graduate nurses have been known to preceptor and supervise nursing students in their first weeks of practice. Secondly, self-support and self-care strategies have been
recently assembled as a body of knowledge in the form of “ways of being”. This initial assembly represents a beginning only, and further research is recommended. In addition to interviews with graduate nurses and staff, inquiry inclusive of careful observational studies in a variety of settings is required to ensure that current NMBA standards are a true reflection of the contemporary role of the graduate nurse.

**Conclusion**

As stated in Chapter One, the purpose of this study was to generate further knowledge about graduate nurses in transition. It was intentional for the aim to be flexible, thus allowing the dynamic adoption of multiple methods, i.e., literature research, critical literature research, and grounded theory methodology. These studies examined and interpreted the various constructions that form the spectrum of factors and perceptions that have an impact on graduate nurses and their passage to competent professional nurse in Australia from the perspectives of graduates and the published research. The following research question emerged: How do nursing students successfully transition to graduate nurse?

In Chapter Two, the contextual statement introduced the historical context, beliefs, and nurse educational practices for over one hundred years - primarily from the perspective of health services. Australian nurse education was a process of indoctrination with little change until 1984 when the national government made the decision to transfer registered nurse education to the tertiary education sector. In the late 1980s, a position statement on transition programs for graduate nurses was developed for South Australia. The support frameworks were based on the transition theorists, Marlene Kramer and Patricia Benner, and the outcome of a number of research reports and conferences. By 1993, they were a familiar discourse in many health services. Despite the fact that the profession lauded these theories and recommendations, the nature of clinical support provided for graduate nurses has not proven to be effective. Overwhelmingly, it has been found that transition programs are primarily offered in order to attract and recruit graduate nurses. There is minimal evidence to show they are effective in assisting with transition. Graduate nurses have and continue to report bullying, incivility, and lack of feedback or inappropriate feedback on their performance. Added to these concerns was the lack of clarity with regard to education for the role of graduate nurse. The role is currently not fully defined in terms of the comprehensive skill set required.

In Chapter Three, a contemporary integrative literature review, it was found that health care organisations are primarily solipsistic and the likelihood of providing consistent quality support or any support at all for graduate nurses is quite small. It was also revealed there was little perspective from the university sector, or expectations of the university sector’s role in the passage from student to competent professional nurse. Much of the literature around the psychosocial
factors involved was focused on postgraduate experiences of transition rather than on purposive psychosocial preparation of nursing students for self-support. Universally, transition to practice programs were reported as ineffective and, at times, harmful.

Chapter Four presented the five publications which, as an aggregate, demonstrate the progression of theory by initially establishing the nature of support provided to graduate nurses in publications one and two. These led to the consequential investigation of self-support in publications three through to five. This chapter has synthesised the publications and clarified the uniqueness of the penultimate research findings. The contribution of this research is the development of new theory championing the transposition of thought towards a new reality and research question, i.e., How do nursing students successfully transition to graduate nurse?

Such a self-support model is possible, as it has been found that graduate nurses can and do self-initiate their own support because they cannot rely on formal transition programs. This research has established that graduate nurses use multiple strategies to self-care, advocate for themselves, and fit in to the ward culture. These have been quantified and developed in the form of ‘ways of being’ and ‘spectrum of comfort’ considerations for the purpose of curriculum development. Much of the literature has focused on postgraduate experiences of transition to professional practice, rather than purposive psychosocial preparation of nursing students for transition to professional practice. However, there should be the opportunity for undergraduate student engagement in a self-support model facilitated by nurse teachers who are knowledgeable about socio-emotional skills and the nature of transition and social interactions which allow nursing students to imagine their success as graduate nurses. Furthermore, “ways of relating” to more capable others during their transition year should be developed as a consequence of these discussions. These preparatory activities create a virtual zone of proximal development, as they arm nursing students with strategies to scaffold their effective transition after graduation. This study has provided a unique perspective of graduate transition. Emergent is the development of a distinctive and comprehensive preparation model with resources that can be used to facilitate transition to professional practice. Indeed, the research and knowledge around the transition from nursing student to successful graduate nurse can be encompassed in a self-support model.
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APPENDICES

The appendices are provided as an adjunct to the body of this thesis for the purpose of supporting assertions and context.
APPENDIX 1 – BRIEF CONTEXTUAL MODEL

On the following pages is a brief contextual model illustrating Peter Mellor’s background and professional involvement with regard to the transition of nursing students to professional practice. It is displayed chronologically and there are three major categories, i.e.,

- **Action** - the actions of research engagement and creativity.
- **Evidence/Publication** - the formal collection of evidence through rigorous inquiry and publication of research.
- **Roles** - translation of evidence into practice within a career context.
Phase 1: Focus on graduate programs to facilitate transition and patient safety concerns (Part 1)

Rural School of Nursing (South Australia)

**Year** | **Action** | **Evidence** | **Roles**
--- | --- | --- | ---
1986 | Significant transition issues with graduate nurses were voiced by rural hospitals with the transfer of education from hospital to university education. Workforce/staffing and safety concerns. |  | Principal Nurse Educator
1987 | Consulted with Directors of Nursing of 9 rural hospitals & SACE research “They are different somehow.” |  |
1988 | Developed a rural nursing course with a focus on the transition needs of rural graduates and securing a workforce post tertiary education. |  |
1989 | Initiated Nursing Practice in the Rural Community – a transition course for new graduate registered nurses. ‘Nursing practice in the rural community – a course for registered nurses’ |  |
1990 | Significant transition issues with graduates were voiced by metropolitan/rural hospitals with the transfer of education from hospital to university education. | Metropolitan Hospital SA | Staff Development Consultant
Developed first transition program to support tertiary graduates.
1991 | Participated in ‘Delights & Dilemmas’ forum with metropolitan Directors of nursing & staff to elicit further transition experiences/concerns and recommendations. |  |
1992 | Developed a refined course for clinical support of local and tertiary graduates during transition to practice (rural/metropolitan nursing). | Completed a detailed evaluation & hand delivered to Nurses Board of South Australia (NBSA). Viewed very favorably.
1993 | ‘Circle of willingness’ conceptualized. And presented at NBSA forum ‘The future of the novice graduate nurse’ held 7 July 1992 |  |
1994 |  | Chaired 2 NBSA committees and developed a generic IPPP with guidelines for South Australia. |
Phase 1: Focus on graduate programs to facilitate transition and patient safety concerns (Part 2)

Rural Regional Health Service

2001
- Returned to rural nursing and developed a renewed interest in the transition needs of rural NGRNs as casual observations revealed concerns.
- Registered Nurse/Student co-ordinator/Staff development/Quality Assurance & Accreditation/ Austraile Nursing & Midwifery Foundation union delegate.

2006
- Master's Thesis: 'The nature of professional support given to New Graduate Registered nurses in rural areas' (Melior 2005) Completed focus groups with NGRNs at three different rural locations.

2009
- Casual lecturer (nursing) for Flinders University Rural Clinical School at Renmark.

2010
- Wrote a new curriculum for 'Transition to Professional Practice' for the Regional Health Service. Experienced difficulty with implementation of preceptorship and other elements. Issues evident around 'circle of willingness' and support of NGRNs.
- 1. Presented findings to ANMF as a delegate at their delegates meeting, made recommendations for change.
- 2. Presented findings to the Transition to Professional Practice co-ordinators group, made recommendations for change.

2011
- Transition to professional practice coordinator at Regional Health Service.
- Flinders University
- Lecturer in nursing (level B) Flinders University – School of Nursing & Midwifery, Located at Rural Clinical School (Renmark).

2012

2013
- Developed research proposal 'Are new graduate registered nurses safe?' In consultation with Professor Jeremee Greenhill - April 2013. Plan was to consult SA Health and investigate patient safety incidents involving NGRNs.
- Publication 1: Melior, P. and Greenhill, J. (2014) A patient safety focused registered nurse transition to professional practice program. Contemporary Nurse, 47(1-2), 51-56. Results: In this 2008-2009 study of these rural transition to practice programs it was found that clinical support for NGRN's did not eventuate.
Phase 2: Transposition – focus on student preparation as a solution to transition and patient safety concerns

**YEAR**  | **Action** | **Evidence/Publications** | **Roles**
--- | --- | --- | ---
2013 | Met with Debra Pratt (Principal Nursing and Midwifery Adviser SA Health) on 16 April 2013. My proposed research was not deemed possible. Ensuring safe practice of NGRNs was deemed to be the responsibility of the university sector not SA Health. | | 
2013 | Developed a new research proposal and advised SA Health of the following studies. **Study A:** An international critical review of transition to professional practice program models and their effectiveness. **Study B:** Interview of NGRNs to investigate ‘what are the strategies NGRNs use to advocate and care for themselves?’ (See appendices) | | 
2014 | Completed an extensive literature review. “What are the strategies new graduates use to advocate and care for themselves?” Application for establishment grant was successful on 23 January 2013. | | 
2014 | Ethics Is On May 30 2013 completed initial ethics application with Flinders University Social and Behavioural Research Ethics Committee (SOREC) with the project title: What are the strategies new graduates use to advocate and care for themselves? For the recruitment interview structure/time/ data collection, questions and approach to be used. i.e. a convenience sample to be taken from 2 metropolitan teaching hospitals and 1 rural health service. 6 participants were to be recruited from each site. | | 
**Publication 3:** **Study B** (Part 1) Mellor, P.D., Gregoric. C. and Gilham, D.M. (2017). Strategies new graduate registered nurses require to care and advocate for themselves. A literature review, Contemporary Nurse, 38(3), 390-405. Results: Eight strategies with potential to assist NGRNs to care and advocate for themselves were identified. All of them are context-dependent in nature. This review of the literature provides a valuable resource that can be used to prepare nursing students for the workplace culture during their first year as a registered nurse. Scenarios can be developed for educational activities such as simulation, role play, discussion and self-reflection. Further development through research is recommended. | 
| | **NUR5306s Topic Coordinator for Transition to professional practice 3 (In final semester for 3rd year nursing students).** Translation of research findings into new topic design and content. Reinforced the need to teach NGRN’s how to advocate and care for themselves. | Transferred from Ubiquitous University (Norway) to the Adelaide campus. 
| | **Lecturer (Nursing - level B) Flinders University - School of Nursing & Midwifery.** Located at Adelaide Campus to co-ordinate NUR5306. | Meeting with Professor Associate Professor David Gilham. Prepared the Agenda/meeting notes/recorded and distributed (1/1/2014) 
| | **NUR5306s Topic Coordinator for Transition to professional practice 3 (In final semester for 3rd year nursing students 2014).** Translation of research findings into new topic design and content. Incorporated initial shift strategies as a beginning foundation. | Recorded and distributed meeting notes/Agenda (2/3/2014) 

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Phase 2: Transposition – focus on student preparation as a solution to transition and patient safety concerns

### Year: 2014

**Action:** Ethics 2: SREC redirected the application for ethics approval to Southern Adelaide Clinical Human Research Ethics Committee (SACHERC). Advised to complete a Low and Negligible Risk (LNR) ethics approval application. This application was successful with a number of revisions/extensions including the specific approval from the three selected health units, i.e., 2 metropolitan teaching hospitals and 1 rural health service. Received approvals to 21 June 2015.

**Evidence/Publications:**
- Initial ethics approval granted (337.11 SAC HREC approval 27/03/2015).
- Project extension request granted to 21/8/2015, (337.23 SAC HREC extension approval 28/5/2016).

**Roles:** Developed a collaboration with the TPPP coordinator of a major health service - to assist with specific recruitment of NGN’s for interview.

### Year: 2015

**Action:**
- Obtain approval from SACHERC LNR ethics to engage an additional investigator (Lucy Atkinson) to assist with some data collection.
- Engaged Dr. Carolyn Gregoric (research assistant) to assist with categorization of transcripts by a professional transcribing service, (11/1/2014).

**Evidence/Publications:**
- Publication: Study 2 (Part 2)
  - Results: Ways of being emerged from the data to explain the social and emotional strategies NGNs use during the first year of practice. The ways of being model includes ways of feeling, ways of relating, and ways of doing. University preparation needs to ensure that the NGN is provided with the skills to successfully navigate the workplace. Use of the ways of being model could help achieve this.

**Roles:**
- NURS5000 Topic Coordinator for Transition to professional practice 3. Translation of research findings into new topic design and content. Integrated "Ways of being" into topic in 2015-16.

### Year: 2016

**Action:** Worked with various research assistants (all of whom were not in nursing roles) and colleagues to complete each project and publish the five articles.

**Evidence/Publications:**
- With each project/publication, I consulted with experienced researchers/assistants who are all acknowledged as authors appropriate to their contribution. I was personally responsible for the conception, ethics, design, analysis, integrity and interpretation of data for all of the works. I drafted the manuscripts, approached the various publishers, and was responsible for revisions and submissions.

### Year: 2017

**Action:**
- Consulted with my co-authors/research assistants individually with regard to their specific expertise in order to achieve the research and publication outcomes.

### Year: 2018

**Action:**
- Coordinated and managed the publication process for the five articles.

### Year: 2019

**Action:**
- NURS5006 Transition to professional practice 3. Translation of research findings into new topic design and content. New Graduate Registered Nurses and the Spectrum of comfort in Clinical Practice. Journal Continuing Education in Nursing, 50(12), 563-571. Results: Emerging from the data were themes that encompassed both the positive and negative regions of the spectrum of comfort that require an appropriate response. The spectrum of comfort model and practical considerations of support could accomplish this.

### Year: 2020
APPENDIX 2 – INTERVIEW QUESTIONS

Questions that will be discussed in interview:

Introduction to interview

The objective of this interview is to identify the strategies you adopted to advocate and care for yourself during transition from student to registered nurse. These strategies can be in the form of practical ideas stress management activities, changes in thinking, time management, self-care, spirituality or any other strategy you found helpful.

1. What was your experience like as a new graduate registered nurse?
2. What placements have you had during your graduate program?
3. How has your role changed from student to registered nurse? Prompts: How different do you feel? What are the skills that you have acquired? What are the barriers to your learning?
4. Did you feel you were well prepared for the RN role? If not, why? If yes, Why?
5. What does the term “resilience” bring to mind? (This elicits the person’s own language)
6. What capabilities did you bring with you from past experience (e.g. past employment, life experience)?
7. Tell me about the challenges you have experienced as a new graduate (e.g. fitting in, time management, maintaining ideals, ethics)?
8. What strategies did you use to help cope with these challenges (e.g. role models, preceptors, mentors, friends, family or other creative strategies)
9. Why do you think these strategies helped you?
10. Tell me about a situation where you were stretched out of your comfort zone? How did you respond? Prompts:
   • How did you feel?
   • What did you do?
   • Who and what helped? How?
   • Who or what didn’t help? Why?
11. Tell me about a situation where you felt that you performed really well in the clinical environment? What strategies did you use? Prompts:
   • How did you feel?
   • What did you do?
   • Who and what helped? How?
   • Who or what didn’t help? Why?
12. Suppose you had to start over again as a new graduate nurse. Prompts: What hints or advice would you give to new graduate registered nurses who are about to start their first year of practice?
13. Reflecting back on your graduate year, is there anything you would have done differently?
14. Tell me about you, how’s your health?

Demographics:

• Age
• Gender
• Cultural background
• Your parents/family
• Partner/Spouse
• Children
• Friends
• Financial pressures

Thank you for taking time to participate in this interview
APPENDIX 3 – LITERATURE REVIEW TABLE

<table>
<thead>
<tr>
<th>Author and Date</th>
<th>Aim/Objective</th>
<th>Sample and Setting</th>
<th>Methods and Methodology</th>
<th>Major Findings</th>
<th>Limitations and Rigour/Validity</th>
<th>MMAT</th>
<th>Significance to the issue</th>
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</thead>
<tbody>
<tr>
<td>1</td>
<td>Tong, V. &amp; Epenetering, B. J. (2018). A Comparative Study of Newly Licensed Registered Nurses’ Stressors: 2003 and 2015 (2015).</td>
<td>Comparison of the stressors of new graduates in cohorts from 2003 and 2015.</td>
<td>Focus group 1: 2003 (n=21) participants; Focus group 2: 2015 (n=22) participants. Total (n ≥183). All had ≥4 months or ≤ 12 months of experience as RNs. Setting: Pacific Northwest USA.</td>
<td>Qualitative descriptive study. Focus groups used to collect data from new graduate registered nurses in 2003 and 2015. Focus groups were semi-structured with some questions focused and others open-ended.</td>
<td>Unlike the 2003 participants, the 2015 group did not express lack of support in the work environment, burnout, or lack of control as major concerns for them. The 2015 nurses agreed that the workload was challenging, but realistic and fair. They felt the workload was distributed equitably and fairly among the nursing staff, and that the organisation valued them as new nurses. There were however ongoing concerns. i.e. Difficulty With Communication. Participants addressed communication issues with physicians, supervisors, patients, and the patients’ families. Feelings of Inadequacy. In their first positions as licensed nurses, both the 2003 and 2015 respondents said they felt inadequate as nurses (Tong et al., 2018).</td>
<td>Informants self-selected, so possible non-selection bias. The sampling (n=21/ n=22) may not represent their peers (n ≥ 183). Unclear if focus group questions similar for both cohorts. Trustworthiness good (Lincoln &amp; Guba 1986). Minimal exemplars for 2015 cohort.</td>
<td>85%</td>
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<tr>
<td>2</td>
<td>Murray, M., Sundin, D. &amp; Cope, V. (2019). New graduate nurses’ understandings and attitudes about patient safety upon transition to practice (2019).</td>
<td>To explore the transition experiences of newly graduated registered nurses with particular attention to patient safety.</td>
<td>New graduates (n=11) of cohort (n=210). Setting: 2 major tertiary hospitals, Western Australia.</td>
<td>Qualitative descriptive study usingsemi-structured face-to-face and telephone interviews. Transcribed verbatim. Themes developed using NVivo for analysis.</td>
<td>The findings elicited five main themes: “patient safety &amp; insights”; “time-management”; “making a mistake”; “experiential learning”; and “transition.” Themes incorporated new graduate fears of causing harm to their patients, the fear of repercussions, and the need for confidence to ask for help. Over time, they threw caution to the wind and asked straight away. Learning/knowing the system was a safety practice, i.e., knowing who to call on, when to question, and who is available to access when help is required (Murray et al., 2019)</td>
<td>Examples of interview questions provided. Follows COREQ guidelines. Criteria for trustworthiness was evidenced in the text.</td>
<td>95%</td>
</tr>
<tr>
<td>3</td>
<td>Zamanzadeh, V., Jasemi, M., Valizadeh, L., Keogh, B. &amp; Taleghani, F. (2015). Lack of preparation: Iranian nurses’ experiences during transition from college to clinical practice.</td>
<td>Analysis of nurses' experiences of the transition from college to clinical practice in various acute venues across Iran.</td>
<td>New graduates (n=14) selected through purposive sampling. Setting: Teaching hospital in Iran.</td>
<td>Qualitative study that employs content analysis in order to identify and define the phenomenon of nurses’ transition from college to clinical practice. Semi-structured interviews.</td>
<td>The findings revealed that nurses, during the transition to their clinical roles, felt challenged in their preparation in three primary areas: poor practical skills, limited academic knowledge, and poor communication skills. Secondary concerns were lack of self-assurance, poor self-confidence, unhealthy emotional reactions, lack of independence, frustration, and loneliness. (Zamanzadeh et al., 2015)</td>
<td>Analysis undertaken using software (MAXQDA). Categorising and development of themes was a feature. No reference to evaluative criteria validating the process.</td>
<td>80%</td>
</tr>
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The purpose of this study was to investigate the factors influencing new graduate nurses’ successful transition to their full professional role in Canada. The study was conducted over a one-year period in their early employment. Sample size was 3,906 new graduates. Survey 1 (November 2012-March 2013), Survey 2 (May-July 2014). Matched data of respondents to both surveys over the one-year time period were analyzed (n=406).

Setting: Canada.

Quantitative study. The current study was a two-wave national survey of new Canadian graduate nurses. Surveys containing standard questionnaires were mailed to informants’ home addresses. Descriptive statistics, correlations, and hierarchical linear regression analyses were conducted using SPSS software.

Overall, situational factors such as authentic leadership, structural empowerment, support for professional practice, new graduate support, and person-job fit were significantly related to job-related outcomes in their new role. Improvement of working conditions for new graduate nurses was recommended. Incivility was significantly related to job-related outcomes in their study (Laschinger et al., 2016).

Scott et al’s (2008) organisational socialisation model was used as the evaluation tool. The low response rate at Time 1, and attrition from Time 1 to Time 2 may introduce non-selection bias. Cronbach’s alpha for internal consistency and SPPS for calculations. Surveyed 10 regions, 400 respondents. Unsure of distribution response.

90% Significant correlation of psychological capital to the personal strength factors and all outcomes for new graduate nurses. Influences intentions to remain in nursing.


To investigate the direct and indirect experiences of horizontal violence in newly graduated nurses, as well as to shed light on the phenomenon, on its awareness and recognition.

A proactive sample of newly graduated nurses until data saturation (n=21). Informants to have worked in teams, in any context between 6 months and 3 years.

Setting: Milan, Italy.

A qualitative descriptive phenomenological study. Face-to-face and in-depth interviews with new graduates who either had direct or indirect lived experience of horizontal violence. Audio-recorded and transcribed verbatim. Phenomenological method of analysis derived from Giorgi (1985).

It was found that newly graduated nurses had very little knowledge about horizontal violence and of the various forms through which it can manifest itself. Four major themes were identified: the ‘enemies’, that is the perpetrators; the ‘weapons’ used by them to induce violence; the ‘effects’; and the types of ‘armour’ used to protect themselves. According to the interviewees, horizontal violence is often considered by senior nurses as an obligatory rite of passage into the professional nurse’s role. If this kind of situation is not kept under control, the fear of being judged hinders the reporting of errors made, preventing detection and correction (Rosi et al., 2020).

The interviews were undertaken outside working hours, in a quiet relaxing environment in a university hospital to ensure privacy, and for interviewees to feel relaxed. Interviewees were free to take the time they needed.

100% Undergraduate psychological preparation needs to include knowledge of horizontal violence and the forms it can take. Psychosocial security within organisations is advocated to address the violence.


The aim of this study was to identify educational strategies used to teach and assess self-care competencies as part of the professional nursing role.

Participant recruitment for this study followed a total sample approach. Invitation emails were sent to all Program Directors (n=38) of undergraduate nursing schools in Ontario, Canada.

A qualitative descriptive cross-sectional research study was designed to gather information about the way self-care competencies are taught and assessed in Ontario's nursing education programs. Three self-care.

Self-care competencies that are important to nursing practice and job sustainability (i.e., relationship, emotional, and spiritual self-care) are not necessarily taught in nursing education programs. The relative lack of attention to self-care competencies in nursing professional practice standards and entry-to-practice competency guidelines is evident. Recommend further exploration of how to teach and how to effectively assess acquisition of self-care competencies (Docherty-Skippen et al., 2019).

Sample provided with surveys was 100%. 21% responded; however, only 13% of programs had RNs which were the target population. Risk of non-response bias was difficult to determine.

60% Undergraduate education on attainment of psychosocial self-care competencies is advocated.
<p>| 7  | Law, B. Y-S. &amp; Chan, E. A. (2015). The experience of learning to speak up: a narrative inquiry on newly graduated registered nurses. | To explore the process of learning to speak up in practice among newly graduated registered nurses. New graduate (n=18) RN ≤ 24 months. Setting: Hong Kong public hospitals. Qualitative research via narrative enquiry. Four methods of collecting data and four sources of data were employed. Interviews at 12, 18, and 24 months after registration. Unstructured interviews and email dialogue. This inquiry revealed that the process of new graduates learning to be a committed advocate for patient safety is complex and requires: 1) more than one-off training and safety tools; 2) mentoring by others and self-mentoring during the experience of educative and mis-educative experiences to sustain their professional identity and continue to speak up in the future; and 3) the need for public spaces that are safe for telling secret stories of patient safety (Law et al. 2015). Details of the data analysis are represented clearly. Checking of researcher interpretations with informants. Procedures meticulously described with exemplars and rich description. 100% The process of learning to speak up identified as a factor influencing patient advocacy and safety. Implications for undergraduate education and nursing units. |
| 8  | Lea, J. &amp; Cruickshank, M. (2015). Supporting new graduate nurses making the transition to rural nursing practice: views from experienced rural nurses. | To identify experienced rural nurses’ beliefs, perceptions, and experiences of the nature and timing of support provided to new graduates during a transition program that would provide safety and support in a rural health setting. Rural nurses (n=16) who worked with new graduate nurses in rural practice. Setting: New South Wales, Australia. Using a qualitative case study framework, this study specifically aimed to investigate and describe the nature and timing of support required during the transition to nursing practice that is specific for the rural context and capacity. Individual in-depth interviews were conducted. Staffing allocations and skill mix within the rural environment that affect workload allocation and level of responsibility were seen by participants in this study as barriers to implementing and sustaining structured support mechanisms within the rural Transition to Practice Program. This study identified that registered staff are very stretched and are not able to provide the incremental learning, direct supervision, or support required of a newly graduated nurse. Rural graduates are also reluctant to ask RNs for support because they observed the experienced RNs to be busy with their own workload (Lea &amp; Cruickschank 2015). Individual interviews were appropriate for practicality; however, the choice of this medium was not explained. 95% Furthers understanding of the barriers to safely supporting new graduate nurses. Identifies need for new graduates to learn how to speak up. |
| 9  | Boamah, S. &amp; Laschinger, H. (2015). Engaging new nurses: the role of psychological capital and workplace empowerment. | The purpose of this study was to test a hypothesised model linking perceptions of workplace empowerment and psychological capital (PsyCap) to new graduate nurses’ work engagement by integrating theories of empowerment, PsyCap, and work engagement. Used census drawn from the registry list of practicing new graduate nurses for sample (n=342) in Ontario, Canada. Response rate 60% (n=205). A quantitative study. Collected data via a survey. Hierarchical multiple linear regression analysis was used to test the influence of empowerment and psychological capital on new graduate nurses’ work engagement. Demographics of those who chose to participate was provided. Employee engagement is likely to occur when individuals have access to empowering work conditions (organisational resources), as well as intrapersonal psychological resources (PsyCap). PsyCap may assist employees to recognise the value of empowering work conditions in facilitating their work. Work engagement appears to be amenable to actionable evidence-based management strategies (Boamah &amp; Laschinger 2015) Used the Psychological Capital Questionnaire, a recognised tool. T-test and P values of 0.001 showed correlation of psychological capital with empowerment in workplace engagement. Risk of non-response bias was difficult to determine. 95% It was found that workplace empowerment and psychological capital were significant independent predictors of work engagement. |
| 10 | Cope, V., Murray, M., &amp; Sundin, D. (2019). New graduate nurses’ understanding and attitudes about patient safety upon transition to practice. | To explore the transition experiences of newly graduated registered nurses with particular attention to patient safety. | Sample (n=11) from three transition to practice (TTP) intakes, 2016-2017. Setting: Western Australia. Qualitative descriptive approach using semi-structured interviews until data saturation. Audio-recorded and transcribed verbatim. This study reports that new graduate registered nurses (NGRN) have an understanding of patient safety and what it means for their patients and their practice. Medication safety is at the forefront of a NGRN’s mind during initial clinical practice, especially in relation to patient safety, often causing anxiety and distress that at times leads to error. This study also confirms that NGRNs enter clinical practice experiencing transition shock, and it is this initial shock that limits their ability to look beyond their tasks to the bigger picture (Cope et al., 2019). | Not sure of representation of each of 3 intakes. Examples of questions provided. Analysed using Braun and Clarke’s (2006) six steps of thematic analysis using NVivo. Tested for trustworthiness. 80% | The initial shock of transition limits the perspective of new graduates and their capacity to practice safely. |
| 11 | Ke, Y. &amp; Stocker, J. F. (2019). On the difficulty of finding one’s place: A qualitative study of new nurses’ processes of growth in the workplace. | To explore new nurses’ processes of growth in the workplace in order to understand the challenges they face. | 20 new graduates; 16 from purposive and 4 from snowballing. ≤ 1 year experience. Setting: Southern Taiwan. Qualitative study using exploratory research design. Interviews using semi-structured questions. Audio-recorded and transcribed verbatim. Growth stages were identified: Stage 1: Feeling disillusioned and shocked; Stage 2: Gaining experiential knowledge; Stage 3: Making a place for oneself. A unique finding (Stage 1) found that tension with preceptors and senior staff resulted in graduates having “bitter experiences”. New graduates had to prove themselves worthy or deserving of support or acceptance from preceptors or senior nurses. Some preceptors wanted to break away from the relationship when faced with an underperforming new nurse (p. 4328). Others felt they had made progress in learning how to embrace their numerous duties, build mutual trust or respect with their preceptor, and work well with others, as well (Ke &amp; Stocker 2019). | EQUATOR guidelines using COREQ checklist used for content analysis. Interview questions elicited the appropriate data. Good exemplars provided and interpretation appears accurate. 100% | The negative influence of some preceptors and “bitter” interactions with senior nurses in the initial stage of transition to practice was identified. |
| 12 | Charette, M., Goudreau, J. &amp; Bourbonnais, A. (2019). Factors influencing the practice of new graduate nurses: A focused ethnography of acute care settings. | To explore the influence of an acute care setting on competency deployment of new graduate nurses (NGNs) from a competency-based undergraduate programme. | 19 participants: New graduates (n=4), nurse preceptors (n=2), clinical nurse specialists (n=9) and nurse managers (n=4). Purposive and snowballing strategies used for recruitment. Setting: Montreal, Canada. Qualitative study. Focused ethnography. Data were collected through individual interviews, focus groups, observation, and documentation. Organisational and individual factors were identified as influencing the deployment of competencies of new graduates: Orientation programs need to be longer; Stability: a crucial element to smooth transition - 3 new graduates had been preceptors. One NGN had 5 preceptors in seven days. Rotations can be too short. Workload: expectations not always adapted to their skill level; Scientific culture: essential to maintain and develop NGNs’ competencies; Where imitation is expected rather than based on evidence, e.g., new graduates using evidence-based practice can threaten the preceptor who will then demean them (so they are not accepted). Personality and clinical placements: they weigh heavily in the balance; as undergraduates, some may not have been proactive and made best use of their learning opportunities. Qualities, such as being proactive or having different life experiences, allow some new graduates to integrate into their roles more easily than others. Be a role model, promote integration, and denounce bullying – e.g., preceptors | Data were analysed according to a recognised ethnographic nursing analysis framework. Provided comprehensive data. Good exemplars provided to illustrate. Interpretation well substantiated. Relative sample sizes were small for each representative group. 100% | Organisational and individual factors were shown to influence new graduate competency attainment. Personal attributes, being proactive, and psychosocial influences were deemed important factors. |</p>
<table>
<thead>
<tr>
<th>ID</th>
<th>Title</th>
<th>Methodology</th>
<th>Sample/Participants</th>
<th>Findings</th>
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<tr>
<td>13</td>
<td>Educational Needs for New Graduate Nurses in Korea (2019)</td>
<td>Qualitative study, grounded theory, constructivist approach, audio-recorded interviews, verbatim</td>
<td>New graduates, n=7; Female: n=6, Male: n=2; Setting: 2 hospitals in South Australia</td>
<td>Five themes emerged: 1) Communication skills that lead to good relationships, e.g., to learn fully about how to communicate with caregivers, patients, physicians, and other healthcare professionals; 2) managing unexpected situations, e.g., difficulty addressing patients’ complaints, symptoms, mistakes, and clinical events; 3) prioritisation; 4) practical experiences, e.g., hands-on practice; and 5) different ways of delivering education, e.g., adding simulation exercises.</td>
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<td>14</td>
<td>How Graduate Nurses Adapt to Individual Ward Culture: A Grounded Theory Study (2019)</td>
<td>Qualitative study, grounded theory</td>
<td>New graduates, n=7; Female: n=5, Male: n=2; Setting: 2 hospitals in South Australia</td>
<td>New graduates used multiple strategies to adapt and fit into an individual ward culture. These strategies were sorted into three main categories: self-embodiment &amp; self-consciousness, e.g., speaking up about what you don’t know and being confident with your abilities; navigating the social constructs, e.g., understanding the process of creating friendships and how to fit in; and raising consciousness, e.g., feeling the difference between fitting in and not fitting in.</td>
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<td>15</td>
<td>Educational Needs for New Graduate Nurses in Korea (2019)</td>
<td>Qualitative study, used inductive qualitative content analysis to process data, focus groups</td>
<td>New graduates, n=8; Setting: 2 university hospitals in Korea</td>
<td>Five themes emerged: 1) Communication skills that lead to good relationships, e.g., to learn fully about how to communicate with caregivers, patients, physicians, and other healthcare professionals; 2) managing unexpected situations, e.g., difficulty addressing patients’ complaints, symptoms, mistakes, and clinical events; 3) prioritisation; 4) practical experiences, e.g., hands-on practice; and 5) different ways of delivering education, e.g., adding simulation exercises.</td>
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<td></td>
<td>Liang, H.-F., Lin, C.-C. &amp; Wu, K.-M. (2018).</td>
<td><strong>Breaking through the dilemma of whether to continue nursing: Newly graduated nurses' experiences of work challenges.</strong> This study aims to explore NGNs' experiences of work challenges in Taiwan. It focuses on the phenomena of challenges experienced in practice in a clinical setting, perceived impacts, and coping strategies. <strong>Purposeful sample.</strong> New graduate (n=25) RNs ≤ 10 months. <strong>Setting:</strong> recruited from Chang Gung Hospital, Taiwan. <strong>Qualitative study.</strong> An interpretive qualitative design/phenomenologic al approach. Semi-structured interviews until saturation was achieved (n=25). Audio-recorded interviews. Transcribed verbatim. Data was analysed using content analysis. <strong>Four themes emerged from the findings:</strong> Being Tense ‘as if walking on thin ice’, i.e., Fear of making mistakes and hesitancy with decision-making. Suffering Physical Exhaustion and Mental Stress, i.e., work overload, shift work, unfamiliar work culture, and feeling others’ expectations. Entering and Adjusting to the Profession, i.e., Weighing up strengths and weaknesses and whether to quit nursing or strategically build up competency. Gaining more confidence, with experience gained more confidence, engaged in problem-solving, improved emotional intelligence, identified with role models, and established their own professional persona. (Liang et al., 2019) Very thorough description and processes which illustrated credibility, confirmability, transferability, and dependability. Exemplars support results well. 100% The study aim was successful and provided a good overview of the psychosocial challenges and coping strategies of new graduates.</td>
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<td>16</td>
<td>Cadavero, A. A., Sharts-Hopko, N. C. &amp; Granger, B. B. (2020).</td>
<td><strong>Nurse Graduates’ Perceived Educational Needs After the Death of a Patient: A Descriptive Qualitative Research Study.</strong> Explore the perceived needs of NGs after experiencing the death of a patient. <strong>Convenience sample.</strong> New graduates (n=20). Age 20-28 years. All enrolled in a residency program. Setting: South Eastern University Teaching Hospital, North Carolina, USA. <strong>Qualitative descriptive study.</strong> Audio-recorded semi-structured interviews and field notes. Transcribed verbatim. Discontinued after saturation received (n=20). **All themes indicated a lack of preparedness and support of new graduates with end-of-life care, i.e., navigating the process, not prepared, support, missed opportunities, preparing NGs for death and dying, and guiding NGs through practice. Some proactive new graduates took the initiative and mobilised the appropriate resources to guide them through the process, i.e., accessing more experienced nurse to assist; requesting written guidelines and checklists; and fostering of self-care. Pre-licensure opportunity for students to debrief and process dying experiences. Overall, perceptions of support were influenced positively by a strong and healthy work culture (Cadavero et al., 2020) <strong>Overall, perceptions of support were influenced positively by a strong and healthy work culture (Cadavero et al., 2020)</strong>. **Unsure of duration that new graduates were in the program/since graduation. NVivo software for analysis. Data was constantly compared until saturation was achieved. Themes and discussion representative of data/ exemplars. Audited independently. Limitations clearly stated for the reader. 100% New graduates require more preparation for end-of-life care. Undergraduate education was inadequate. Those who were proactive, engaged in self-care, and were supported fared better.</td>
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<td>18</td>
<td>Oneal, G., Graves, J. M., Diede, T., Postma, J., Barbosa-Leiker, C. &amp; Butterfield, P. (2019). Balance, Health, and Workplace Safety: Experiences of New Nurses in the Context of Total Worker Health. Workplace Health &amp; Safety. To explore the experiences of newly licensed novice RNs and their transition to practice, while working in health care facilities in Washington and Oregon. Total new graduate informants (n=34). Urban acute hospitals (84%). BSN degree (72%). Setting: Washington and Oregon, USA. Qualitative descriptive study. Semi-structured questions. Four focus groups of informants (n=29) held in different regional cities. Informant interviews Puget Sound (n=5). Key themes: Health, Work Environment, Learning to Be. Health – social support – family and friends’ difficulty with shifts/hours, absence from social activities, and listening to work concerns. Not understanding nursing work. Learned to value time with family/friends. Health threats – incivility, bad attitudes/bullying. Ergonomic risks, security risk; night shift. Violent patients. Work environment – caring holistically was difficult. Time management critical. Communication – socialising with work colleagues; unit culture differences; Interprofessional issues; abusive physicians. Gender differences – men allocated extra lifting, aggressive patients, calls from abusive physicians, Organizational resources – inadequate orientation; not enough staff or equipment, rooms, etc. Learning to be – Self autonomy and self-advocacy: aware of the need to advocate for themselves at work and home. Having a choice of where to work was important to self-growth/ goal setting. Spending time with family. Knowing/Not knowing: Many participants unsure of the “right way” to do things. Work way versus school way: balancing work expectations and what was taught or not taught in school. Proving worth: Pressure to prove themselves at work and home. Pressure to take extra shifts/ scolded for being sick. Fall asleep driving home (Oneal et al., 2019) Key informant interviews guided by sub-themes to validate emerging constructs. Field notes taken in focus groups and interviews which assisted with codification and sub-themes. Data collected until saturation. 100% Psychosocial, ergonomic, and organisational factors were identified as being important to the context of total worker health. Including the need to advocate for themselves.</td>
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<td>19</td>
<td>Shaw, P., Abbott, M. &amp; King, T. S. (2018). Preparation for Practice in Newly Licensed Registered Nurses. Aim to examine current RN preceptor perceptions of newly licensed RNs’ preparedness for practice. Surveys to RN preceptors (n=42). Setting: Columbus, Ohio USA. Mixed-methods descriptive study. Questionnaire used via Survey Monkey in 2 parts: Quantitative: Likert scale. Qualitative: Space for written commentary. Found preceptor perception that communication and caring/compassion were well developed in new graduates; however, enhanced learning opportunities in prioritisation and time management were recommended for undergraduates. Qualitative data revealed that preceptors believe that personality of the new graduate impacted competency development. They also believe that new graduates are task-focused. Preceptor awareness of Benner’s (1982) novice-to-expert seminal works is also recommended (Shaw et al., 2018) Developed own 10-item survey using the Likert scale. Survey questions were assessed by an independent panel prior to distribution. Qualitative data was triangulated with quantitative data. Quality criteria relevant to the methods used were unclear. 100% Psychosocial skills deemed good. Prioritisation, complex situations, time management were lacking. Personality impacts competency development.</td>
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<td>20</td>
<td>Labague, L. J., McEnroe, P. D. &amp; Leocadio, M. C. (2019). Transition experiences of newly graduated Filipino nurses in a resource-scarse rural health care setting: A qualitative study. To understand and examine the lived experiences of novice newly graduated nurses during their initial placement in nursing practice. Purposive sample. New graduate (n=15) RN ≥ 12 months. Setting: rural hospital, Philippines. Saturation of data influenced the sample size. Qualitative study: Husserl’s approach to phenomenology. Structured interviews using predetermined questions. Audio-recorded and transcribed. Similar to other studies, Filipino new graduates in rural areas are a scarce commodity. They also find their transition to be stressful with many challenges. There was gap between theory and practice that new graduates found frustrating. In addition, support from the organisation and staff was not forthcoming. Themes were: experiencing transition shock; feeling pressured; learning excitement; needing support. A proposed transition program and list of strategies to facilitate transition was provided (Labague et al., 2019). Rationale for using Husserl’s phenomenology was provided. Process of data analysis was provided. Exemplars are congruent with interpretation of data. The transition experiences of rural Filipino nurses was revealed, with lack of support, and the gap between theory and practice, causing stress.</td>
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<td>21</td>
<td>Urban, R. W. &amp; Barnes, D. M. (2020). Transition to Practice: The Lived Experience of New Graduate Nurses in Early Solo Flight. To understand the experience of new graduate nurses in the first few months of practice. Purposive sample. New graduate (n=15) RN ≤ 9 months BSN or associate degree (Nursing). Setting: private hospitals in South-western city, Texas USA. Qualitative phenomenological research design (van Manen). Semi-structured interviews. Audio-recorded and transcribed. Three major themes with sub-themes emerged: Overwhelmed: knowledge insecurity; high anxiety; taking the job home. Relationships: work relationships; safe people; getting bitten. Finding my flow: flying solo; organising myself; getting it right. (Urban et al., 2020) Audit trail and process of data collection and analysis was provided. Exemplars are congruent with interpretation of data. A thorough account of process provided. Data saturation influenced the sample size. Work-based relationships and teamwork were important for survival. Fear of unprofessional and uncivil behaviour was a significant stressor for new graduates.</td>
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<td>22</td>
<td>Wahab, S. N. B. A., Mordiffi, S. Z., Ang, E. &amp; Lopez, V. (2017). Light at the end of the tunnel: New graduate nurses’ accounts of resilience: A qualitative study using Photo voice. To explore new graduate nurses accounts of resilience and the facilitating and impeding factors in building their resilience. Purposive sample. New graduate (n=9) RN ≥12 months. Setting: Singapore. Descriptive qualitative design using Photo voice. The guidelines included: Take a photo or any image that describes what being resilient means to the new graduate. Focus group interviews ensued with sharing of photos used to convey the meaning of resilience. Four themes emerged: (1) resilience is persevering and overcoming obstacles; (2) resilience is accepting one's responsibilities and fulfilling them; (3) resilience is adapting to new situations; and (4) resilience is taking control of own learning (Wahab et al., 2017). “Participants' manageability of the situation was through their own capacity to seek resources extrinsically from others and appreciate the help from the managers and preceptors” (Wahab et al., p. 47). Guided by the theory of Sense of Coherence. Research process clearly explained. Focus groups allowed rich description and in-depth data. Participants' perspectives of the photos actively engaged them with their experience as it occurs in their daily lives. Findings relate well to the data. Accounts of resilience and the factors impeding and enabling resilience, were explored. Proactivity was an important factor.</td>
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<td>23</td>
<td>Kim, E.-Y. &amp; Yeo, J. H. (2019). Effects of pre-graduation characteristics and working environments on transition shock of newly graduated nurses: A longitudinal study. To determine the effects of pre-graduation characteristics and working environments on the transition shock of newly graduated nurses. Convenience sample. New graduate (n=312) RN ≤ 9 months. Setting: South Korea. Quantitative study. A prospective, longitudinal, and correlational design was used. Two surveys of same informants: 1. Undergraduate when nursing students. Demographic data grade point average, self-efficacy, and professional nursing values. 2. Post-graduation as new graduates. Included transition shock and working environments. Factors affecting transition shock were identified: 1. Pre-graduation characteristics. It was found that 9% of variance was attributed to, i.e., age of new graduates and self-efficacy. 2. Working characteristics. i.e., working in preferred unit, and the nurse working environment were also significant factors (29%). Self-efficacy was correlated with enabling reduction of transition shock in newly graduated registered nurses. Enhancement of self-efficacy in undergraduate programs was deemed essential (GPA and professional values did not reduce transition shock). Support through a transition program that enhanced the work characteristics was also recommended. (Kim et al., 2019) This research was supported by Basic Science Research Program through the National Research Foundation of Korea (NRF), funded by the Korean government (Ministry of Education). Statistical Analysis well described and relevant. Used IBM SPSS for processing. 100% Recommendations were provision of: support with enhancing work characteristics; and undergraduate education to enhance self-efficacy.</td>
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<td>24</td>
<td>Kailhlanen, A.-M., Elovainio, M., Haavisto, E., Salminen, L. &amp; Sinervo, T. (2020). The associations between the final clinical practicum elements and the transition experience of early career nurses: A cross-sectional study. Identify the essential elements of the final clinical practicum that enhance successful transition. Convenience sample. New graduates (n=712), 18% response rate. RN ≤ 24 months. Setting: Finland. Quantitative cross-sectional study. Descriptive statistics: Linear regression analysis. Survey of new graduates with regard to their final clinical practicum. Systematicness involves a final practicum that is well planned and provides an active social and engaged community work environment for the student, i.e., a visible and acknowledged member of the team as a student was found to improve the confidence of new graduates and their transition experience. Nurses with higher scores in systematicness had less psychological distress, less sleep problems, less role conflict/ambiguity, and more positive perception of transition and educational preparation. (Kailhlanen et al., 2020) IBM SPSS Statistics 25 used for analysis. All processes clearly described for the reader. Variables and instruments all listed and justified. Confounding and practical elements/ factors tested using multivariate ANOVA. 100% An active social and engaged community were essential elements in the final practicum. Improved confidence and their experience of transition.</td>
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<td>25</td>
<td>Gardiner, I. &amp; Sheen, J. (2017). Graduate nurses’ experience of feedback, support, and anxiety: a pilot study. Australian Journal of Advanced Nursing, 33(1), 6-15. To explore the relationship between feedback and anxiety. To investigate new graduate experiences of feedback and support during their graduate program. Convenience sample using passive snowballing technique via Facebook. New graduates (n=107), RN ≤ 24 months Setting: Australia. Mixed-methods approach. Survey consisted of 3 sections: Demographics; Instrument for measuring feedback and support (qualitative); State Trait Anxiety Inventory. Found a negative relationship between feedback and anxiety. Support and regular quality feedback was inconsistent and highly variable. Provision of quality and timely feedback reduced anxiety in nurses (p=.03), contributed to successful role transition, and enhanced safe practice. Where ward culture/assessors were vindictive/ unprofessional, this adversely impacted the quality of feedback and transition experience. Some GNs formed strong relationships with other nurses, while other participants were isolated and bullied. Used recognised instruments for assessment of variables. Limitations clearly explained and comprehensive. Used one-way ANOVA for analysis of both State and trait anxiety. 100% Regular quality feedback was reported as essential to assist with role transition, reduce anxiety in new graduate nurses, and improve patient safety.</td>
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<td>26</td>
<td>Liu, H., Zou, H., Wang, H., Xu, X. &amp; Liao, J.</td>
<td>(2020). Do emotional labour strategies influence emotional exhaustion and professional identity or vice versa? Evidence from new nurses.</td>
<td>To examine the reciprocal relationships of emotional labour strategies with emotional exhaustion and professional identity. <strong>Hypothesis 4a:</strong> Professional identity will negatively predict surface acting. <strong>Hypothesis 4b:</strong> Professional identity will positively predict deep acting. New study design. Setting: 8 hospitals in 11 provinces of Central China. Quantitative. Four-wave panel research design to test the hypotheses. Survey data collected in 2018 via a social app WeChat. Longitudinal confirmative factor analysis measurement of emotional labor, professional identity, and emotional exhaustion. Found that professional identity leads to more appropriate emotions and behaviours in a more authentic way (known as deep acting). Deep acting is less taxing, i.e., Hypothesis 4b. Education and training that has a focus on nurses' professional identity may promote deep acting behaviours (Liu et al., 2020). All stages of the research process were transparent and provided in detail, i.e., validity and reliability, hypotheses testing, and robustness checks. Controls were used to cater to the possible effects of the universities and education/qualifications. 100% Professional identity leads to more appropriate emotions and behaviours in a more authentic way. Deep acting is less taxing, i.e., Hypothesis 4b.</td>
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<td>27</td>
<td>Casler, T.</td>
<td>(2020). Improving the Graduate Nurse Experience through Support on a Social Media Platform.</td>
<td>Project goals included increased job satisfaction and job performance, and improved intent by GNs to stay within the nursing profession and organisation. Convenience sample of newly graduated nurses (n=25). Originated from 8 states of USA, Puerto Rico, and Scotland. Setting: large medical centre, Austin, Texas USA. Quantitative. Descriptive statistics. Intervention was semi-structured (discussion posts, photos, polls, articles, video) with weekly topics as well as an open forum for GNs to seek advice or support. Topics were informed by the transition shock model of Duchscher (2012). This quality improvement project found that the Facebook social media platform was preferred by millennial graduate nurses to provide the support needed to transition from student to independent professional nurse at a nurse residency program of a central Texas Medical Center. Areas assessed: skills and procedure; performance comfort and confidence support; organising and prioritising; communication and leadership; professional satisfaction; and Facebook group engagement. Overall improvements using the social media platform were in physician communication, time management, and specific clinical skills (Casler et al. 2020). A Quality Improvement project, but followed the process of research. Relatively small sample, not reliably generalizable and a number of other possible confounding factors were cited. 90% Social media forums can assist new graduates with clinical and psychosocial job performance.</td>
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<td>28</td>
<td>Wing, T., Regan, S. &amp; Spence Laschinger, H. K. (2015).</td>
<td><strong>Hypothesis 1:</strong> perceptions of co-worker incivility will mediate the effect of structural empowerment on mental health symptoms in new graduate nurses; <strong>Hypothesis 2:</strong> perceptions of supervisor incivility will mediate the effect of structural empowerment on mental health symptoms in new graduate nurses.</td>
<td>Convenience sample. New graduates (n=394), 18% response rate. RN ≤ 36 months. Setting: Ontario, Canada.</td>
<td>Workplace incivility by colleagues and from those supervising was significantly associated with mental ill-health. As the frequency of uncivil behaviour increases, so too does the prevalence of mental ill-health in new graduate nurses. Kanter’s (1977) theory of structural empowerment was supported, as high levels of structural empowerment were significantly associated with low rates of mental ill-health. However, the presence of uncivil behaviour in the workplace diminishes the positive effect of empowerment in new graduate nurses. “Violence prevention needs to target the attitude of experienced nurses towards young nurses, who should be respected and valued as important members of the health care team” (Wing et al., 2015 p. 641).</td>
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<td>29</td>
<td>Kim, K. J. &amp; Yoo, M. S. (2018).</td>
<td>Explore the influence of new graduate nurses’ psychological capital (PsyCap) and work engagement (WE) on their intention to remain in nursing.</td>
<td>New graduates (n=156), response rate 91.8%. RN 3-12 months. Setting: 2 tertiary and 1 university hospital in South Korea (2,800 beds total).</td>
<td>This study found that the intention to remain of new graduate nurses was influenced by psychological capital. In this final regression model, only Psychological capital (β = 0.376, P G .001) and Work engagement (β = 0.283, P = .001) influenced new graduate nurses’ intention to remain (Kim et al., 2018).</td>
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The aim of this study is to examine British newly graduated nurses’ experience of their perceived organisational empowerment and willingness to challenge unsafe practices.

**Quantitative study.** A cross-sectional survey was used in this study. SPSS software for analysis of results and demographic data. Setting: 4 acute hospitals in Eastern England.

The findings correlate structural empowerment with speaking up behaviour when confronted with four hypothetical scenarios of unsafe practices. It was recommended that senior nurses pursue strategies to build the confidence of new graduates. This will empower them with moral courage to speak up when required and enhance patient and staff safety (Mansour, & Mattukoyya 2018).

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<th>Conditions of Work Effectiveness Questionnaire (CWEQ-II). Used Cronbach’s alpha and other correlational measures to process the data. All processes were transparent and can be validated. Risk of non-response bias unclear.</th>
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<td><strong>100%</strong> The willingness to challenge unsafe practices was found to be related to perceived organisational empowerment.</td>
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The purpose of the study was to evaluate the effect of a 3 × 3 hour group intervention aiming to prevent symptoms of stress-related ill health among new RNs by increasing engagement in proactive behaviours.

**New graduates (n=239), response rate 61%. RN ≤ 18 months.** Setting: Transition program for new graduates in Sweden.

Findings were inconclusive, as there was no discernible difference between the group who had the education on transition and strategies to address the stressors, fears, and known characteristics, and the control group. Suggested that there may have been some leakage between the two groups, or the intervention was too small to have effect. Adherence to the intervention was positively associated with social acceptance (Frögéli et al., 2020).

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<th>Process was transparent. Used recognised statistical analyses, including regression analysis. Tables of results provided. Use of self-report questionnaires may be a confounding factor.</th>
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<td><strong>85%</strong> Knowledge of transition and the strategies to address the stressors, fears, and characteristics were positively associated with social acceptance.</td>
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### 32 Thompson, R. (2016). Preparing New Nurses to Address Bullying: The Effect of an Online Educational Module on Learner Self-Efficacy.

Evaluation of an online educational module introducing pre-licensure baccalaureate nursing students to bullying in the workplace. The second purpose was to examine the effect of the module on their self-efficacy related to bullying behavior as they transitioned to being a new graduate.

**Convenience sample of pre-licensure baccalaureate nursing students (n=40), response rate 80%.** Setting: Southwestern Pennsylvania US

Findings showed that an online module on bullying had the following impact, i.e., post-intervention scores on the adapted self-efficacy survey were significantly higher than the pre-intervention scores (p<0.001). Data analysis found the intervention was associated with increased perceived self-efficacy. This outcome indicated participants perceived themselves to be more confident in their ability to recognise and address bullying in the workplace after education. This was important, because the research indicates persons with high self-efficacy are more likely to persist longer in the face of opposition (Thompson 2016).

<table>
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<tr>
<th>Quantitative data were analysed using SPSS. Cronbach’s alpha for the adapted GSES was 0.70, indicating good reliability. A paired t-test significance set at p&lt;0.05 was used to assess the change in overall scores. Graphical representation. Module topics provided.</th>
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<td><strong>100%</strong> The intervention, i.e., education modules on bullying, resulted in improved self-efficacy and likely persistence to persevere.</td>
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APPENDIX 4 – CITATIONS OF MY PUBLICATIONS

The following articles have cited my publications.

Publication 1 (Mellor & Greenhill 2014)


Gellerstedt, L., Moquist, A., Roos, A., Karin, B. & Craftman, Å. G. (2019). Newly graduated nurses' experiences of a trainee programme regarding the introduction process and leadership in a


Otoo, G. N. (2016). Effects of Undergraduate Nursing Student-Preceptor Relationship on the Student's Self-Reported Clinical Competence, Self-Esteem, and Readiness to Work as a Registered Nurse (RN).


doi: 10.1097/DCC.0000000000000354


Publication 2 (Mellor, Gregoric, Atkinson & Greenhill 2017)


Publication 3 (Mellor, Gregoric & Gillham 2017)


Rogers, L. E. (2019). Staff Development Introducing Self-Care Within the Nurse Residency Curriculum.


Publication 4 (Mellor & Gregoric 2016)


McAllister, L. (2019). Nursing Faculty Perception of Student Transition to Practice: An Exploratory Case Study (Doctoral dissertation, University of Phoenix).


Publication 5 (Mellor & Gregoric 2019)


APPENDIX 5 – CO-AUTHORSHIP APPROVALS FOR HDR

In accordance with Clause 5, 7 and 8 in the HDR Thesis Rules, a student must sign a declaration that the thesis does not contain any material previously published or written by another person except where due reference is made in the text or footnotes. There can be no exception to this rule.

a. Publications or significant sections of publications (whether accepted, submitted or in manuscript form) arising out of work conducted during candidature may be included in the body of the thesis, or submitted as additional evidence as an appendix, on the following conditions:

i. they contribute to the overall theme of the work, are conceptually linked to the chapters before and after, and follow a logical sequence

ii. they are formatted in the same way as the other chapters (i.e. not presented as reprints unless as an appendix), whether included as separate chapters or integrated into chapters

iii. they are in the same typeface as the rest of the thesis (except for reprints included as an appendix)

iv. published and unpublished sections of a chapter are clearly differentiated with appropriate referencing or footnotes, and

v. unnecessary repetition in the general introduction and conclusion, and the introductions and conclusions of each published chapter, is avoided.

b. Multi-author papers may be included within a thesis, provided:

i. the student is the primary author

ii. there is a clear statement in prose for each publication at the front of each chapter, recording the percentage contribution of each author to the paper, from conceptualisation to realisation and documentation, in accordance with the Research Publication, Authorship and Peer Review Policy, and

iii. each of the other authors provides permission for use of their work to be included in the thesis on the Submission of Thesis Form below.

c. Papers where the student is not the primary author may be included within a thesis if a clear justification for the paper’s inclusion is provided, including the circumstances relating to production of the paper and the student’s position in the list of authors. However, it is preferable to include such papers as appendices, rather than in the main body of the thesis.
Publication 1 - Co-authorship Approval


A. STUDENT’S DETAILS (to be completed by the Student)

<table>
<thead>
<tr>
<th>Name: Peter Mellor</th>
<th>Student ID:</th>
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<tr>
<td>PhD by Prior Publication</td>
<td>College of Nursing &amp; Health Sciences</td>
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<td>Degree:</td>
<td>College:</td>
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Title of Thesis: TRANSITIONING OF GRADUATE NURSES

B. CO-AUTHORSHIP APPROVALS (To be completed by the student and co-authors)

If there are more than four co-authors (student plus 3 others), only the three co-authors with the most significant contributions are required to sign below.

Please note: A copy of this page will be provided to the Examiners.

1. Full publication Details

Section of the thesis where the publication is referred to: RESULTS SECTION

Student’s Contribution to the publication:

- Research Design: %
- Data Collection and analysis: %
- Writing and editing: %

Outline your (the student’s) contribution to the publication:

I wrote the research design section within a grounded theory context and with reference to the works of the theorists.

I detailed the data collection i.e. extensive preparation undertaken for collection of data via focus groups (from three locations of SA) including the considerations and ethics required to preserve the independent responses of participants. As corresponding author I designed all of the figures (1, 2 & 3) and rewrote the entire draft/revisions in consultation with Jennene Greenhill.

☐ I confirm that the details above are an accurate record of the student’s contribution to the work.

Name of Co-Author 1: Jennene Greenhill Signed: Date: 20/1/20

☐ I confirm that the details above are an accurate record of the student’s contribution to the work.

Name of Co-Author 2: Signed: Date: J/1/

☐ I confirm that the details above are an accurate record of the student’s contribution to the work.

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Publication 2 – Co-authorship Approval


<table>
<thead>
<tr>
<th>A. STUDENT’S DETAILS (to be completed by the Student)</th>
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<td>Name: Peter Mellor</td>
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<tr>
<td>Degree: PhD by prior Publication</td>
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<tr>
<td>College: College of Nursing and Health Sciences</td>
</tr>
<tr>
<td>Title of Thesis: TRANSITIONING OF GRADUATE NURSES</td>
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<td>Student ID: 7265 860</td>
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<th>B. CO-AUTHORSHIP APPROVALS (To be completed by the student and co-authors)</th>
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<td>If there are more than four co-authors (student plus 3 others), only the three co-authors with the most significant contributions are required to sign below.</td>
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Please note: A copy of this page will be provided to the Examiners.

1. Full publication Details

Section of the thesis where the publication is referred to

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<th>Student’s Contribution to the publication:</th>
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<td>Research Design</td>
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<td>Data Collection and analysis</td>
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<td>Writing and editing</td>
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Outline your (the student’s) contribution to the publication:

I designed the literature review included exclusive articles. Key words were included in identifying relevant articles. I was responsible to read the peer review of each article (60) to identify the strategies used by NCMs in case 1 advocates for themselves.

I used the PRISMA search strategy to pre-screen the publications so that the search could be established. If necessary, I will forward the data to the conceptual model of results. I wrote the individual as corresponding author and

responsible for the revisions and made amendments in the manuscript as required. Dr. Carolyn Gregoric provided valuable feedback to myself with regards to structure, grammar, figure designs and equations.

Associate Professor David Gilmour also provided valuable support throughout and as designated times provided helpful suggestions when required to improve.

☑️ I confirm that the details above are an accurate record of the student’s contribution to the work.

Dr. Carolyn Gregoric

Name of Co-Author 1: Carolyn Gregoric Signed: Date: 21/7/20

☑️ I confirm that the details above are an accurate record of the student’s contribution to the work

Name of Co-Author 2: David Gilmour Signed: Date: 11/8/20

☑️ I confirm that the details above are an accurate record of the student’s contribution to the work

Name of Co-Author 3: Signed: Date: 1/1/20
Publication 3 – Co-authorship Approval


**A. STUDENT’S DETAILS (to be completed by the Student)**

Name: ___________________________  Student ID: ________

PhD by prior Publication: YES  College of Nursing and Health Sciences

Degree: ___________________________  College: ___________________________

Title of Thesis: TRANSITIONING OF GRADUATE NURSES

**B. CO-AUTHORSHIP APPROVALS (To be completed by the student and co-authors)**

If there are more than four co-authors (student plus 3 others), only the three co-authors with the most significant contributions are required to sign below.

*Please note: A copy of this page will be provided to the Examiners.*

**1. Full publication details**

Section of the thesis where the publication is referred to: ____________

Student’s Contribution to the publication:

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<th>Research Design</th>
<th>50%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Data Collection and analysis</td>
<td>50%</td>
</tr>
<tr>
<td>Writing and editing</td>
<td>50%</td>
</tr>
</tbody>
</table>

Outline your (the student’s) contribution to the publication:

[Text]

I confirm that the details above are an accurate record of the student’s contribution to the work.

Name of Co-Author 1: ___________________________  Signed: ___________________________  Date: 24/7/20

I confirm that the details above are an accurate record of the student’s contribution to the work

Name of Co-Author 2: ___________________________  Signed: ___________________________  Date: 21/7/20

I confirm that the details above are an accurate record of the student’s contribution to the work

Name of Co-Author 3: ___________________________  Signed: ___________________________  Date: 20/07/20
Publication 3 - Co-authorship Approval (continued)

B. CO-AUTHORSHIP APPROVALS (To be completed by the student and co-authors)

If there are more than four co-authors (student plus 3 others), only the three co-authors with the most significant contributions are required to sign below.
Please note: A copy of this page will be provided to the Examiners.

1. Full publication details

Section of the thesis where the publication is referred to: Results section

Student’s Contribution to the publication:

<table>
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<tr>
<th>Research Design</th>
<th>90%</th>
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<tr>
<td>Data Collection and analysis</td>
<td>80%</td>
</tr>
<tr>
<td>Writing and editing</td>
<td>80%</td>
</tr>
</tbody>
</table>

Outline your (the student’s) contribution to the publication:

[Signature]
I was corresponding author and responsible for ensuring the research design elements. I therefore would claim both bone and spine evaluation using s AS Indirect the flro and evaluation criteria of

[Signature]
I also drafted the Abstract and results. Coding, checking of all data collection and coding accuracy was primarily the responsibility of Dr. Carolyn Gregoric. Lucy Atkinson was a participant in this project.

[Signature]
I confirm that the details above are an accurate record of the student’s contribution to the work.

Name of Co-Author 1: Carolyn Gregoric Signed: ___________________________ Date: __/__/__

[Signature]
I confirm that the details above are an accurate record of the student’s contribution to the work.

Name of Co-Author 2: Lucy Atkinson Signed: ___________________________ Date: __/__/__

[Signature]
I confirm that the details above are an accurate record of the student’s contribution to the work.

Name of Co-Author 3: Jennene Greenhill Signed: ___________________________ Date: __/__/__
**Publication 4 - Co-authorship Approval**


**A. STUDENT'S DETAILS (to be completed by the Student)**

<table>
<thead>
<tr>
<th>Name:</th>
<th>Student ID:</th>
</tr>
</thead>
<tbody>
<tr>
<td>Peter Mellor</td>
<td>7965880</td>
</tr>
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<table>
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<th>Degree:</th>
<th>College:</th>
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<td>PhD by prior publication</td>
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<th>TRANSITIONING OF GRADUATE NURSES</th>
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</table>

**B. CO-AUTHORSHIP APPROVALS (To be completed by the student and co-authors)**

If there are more than four co-authors (student plus 3 others), only the three co-authors with the most significant contributions are required to sign below.

Please note: A copy of this page will be provided to the Examiners.

1. **Full publication Details**

   Section of the thesis where the publication is referred to

   Student’s Contribution to the publication:

   - Research Design
     - 50% 
   - Data Collection and analysis
     - 65% 
   - Writing and editing
     - 85% 

   Outline your (the student's) contribution to the publication:

   I contributed to the research design section including research question. What are the strategies new graduates use to automate and care for themselves? I also contributed to the analysis section. I interviewed two patients and two nurses to gain insight into the experiences of being new graduates in the hospital setting.

   I collaborated with my co-author, a research assistant, to help me design the project. We reviewed the literature and discussed the methodology. I also collaborated with the statistician, Dr. Gregoric, to determine the appropriate statistical tests.

   I also contributed to the writing of the paper. I drafted the initial sections of the manuscript, including the introduction and methods.

   I also provided feedback on the final draft and helped to revise the manuscript. I reviewed the final draft and provided comments and suggestions.

   I confirm that the details above are an accurate record of the student’s contribution to the work.

   Name of Co-Author 1: ___________ Signed: ___________ Date: 24/12/20

   I confirm that the details above are an accurate record of the student’s contribution to the work

   Name of Co-Author 2: ___________ Signed: ___________ Date: __/__/__

   I confirm that the details above are an accurate record of the student’s contribution to the work

   Name of Co-Author 3: ___________ Signed: ___________ Date: __/__/__
**Publication 5 - Co-authorship Approval**


### A. STUDENT'S DETAILS (to be completed by the Student)

<table>
<thead>
<tr>
<th>Name: Peter Mellor</th>
<th>Student ID: 7895680</th>
</tr>
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<tr>
<td>PhD by Prior Publication</td>
<td>College of Nursing and Health Sciences</td>
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<tr>
<td>Degree:</td>
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<td>Title of Thesis: TRANSITIONING OF GRADUATE NURSES</td>
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</tbody>
</table>

### B. CO-AUTHORSHIP APPROVALS (To be completed by the student and co-authors)

If there are more than four co-authors (student plus 3 others), only the three co-authors with the most significant contributions are required to sign below.

Please note: A copy of this page will be provided to the Examiners.

1. **Full publication Details**

   Section of the thesis where the publication is referred to

   Student's Contribution to the publication:

   - Research Design 90 %
   - Data Collection and analysis 85 %
   - Writing and editing 85 %

   Outline your (the student’s) contribution to the publication:

   This was the second article published from data student from interviews of new graduate registered nurses. "What are the strategies new graduates use in self-care and care for themselves?" These were not additional ethical requirements.

   for this study, application of the revised theoretical framework, I conducted the interviews, and collected data which formed the underlying theoretical framework. I consulted with Dr. Carol Gregoric (research associate) and modified the questionnaire to address these concerns as required.

   Dr. Carol Gregoric provided valuable feedback and suggestions for inclusion/exclusion with regard to the original document and with each draft as a consultant when responding to peer reviewers.

   I confirm that the details above are an accurate record of the student’s contribution to the work.

   Name of Co-Author 1: _______________ Signed: _______________ Date: 24/7/20

   I confirm that the details above are an accurate record of the student’s contribution to the work

   Name of Co-Author 2: _______________ Signed: _______________ Date: __/__/__

   I confirm that the details above are an accurate record of the student’s contribution to the work

   Name of Co-Author 3: _______________ Signed: _______________ Date: __/__/__