

Ubas-Sumagasyay, Nicolette Anne; Oducado, Ryan Michael

Article — Published Version

Perceived Competence and Transition Experience of New Graduate Filipino Nurses

Jurnal Keperawatan Indonesia

Suggested Citation: Ubas-Sumagasyay, Nicolette Anne; Oducado, Ryan Michael (2020) : Perceived Competence and Transition Experience of New Graduate Filipino Nurses, Jurnal Keperawatan Indonesia, Faculty of Nursing, Universitas Indonesia, Depoc, Vol. 23, Iss. 1, pp. 48-63, <https://doi.org/10.7454/jki.v23i1.1071> , <http://www.jki.ui.ac.id/index.php/jki/article/view/1071>

This Version is available at:

<https://hdl.handle.net/10419/221753>

Standard-Nutzungsbedingungen:

Die Dokumente auf EconStor dürfen zu eigenen wissenschaftlichen Zwecken und zum Privatgebrauch gespeichert und kopiert werden.

Sie dürfen die Dokumente nicht für öffentliche oder kommerzielle Zwecke vervielfältigen, öffentlich ausstellen, öffentlich zugänglich machen, vertreiben oder anderweitig nutzen.

Sofern die Verfasser die Dokumente unter Open-Content-Lizenzen (insbesondere CC-Lizenzen) zur Verfügung gestellt haben sollten, gelten abweichend von diesen Nutzungsbedingungen die in der dort genannten Lizenz gewährten Nutzungsrechte.

Terms of use:

Documents in EconStor may be saved and copied for your personal and scholarly purposes.

You are not to copy documents for public or commercial purposes, to exhibit the documents publicly, to make them publicly available on the internet, or to distribute or otherwise use the documents in public.

If the documents have been made available under an Open Content Licence (especially Creative Commons Licences), you may exercise further usage rights as specified in the indicated licence.



<http://creativecommons.org/licenses/by/4.0/>

PERCEIVED COMPETENCE AND TRANSITION EXPERIENCE OF NEW GRADUATE FILIPINO NURSES

Nicolette Anne Ubas-Sumagasyay, Ryan Michael Flores Oducado*

West Visayas State University College of Nursing, 5000 Iloilo, Philippines

*E-mail: rmoducado@wvsu.edu.ph

Abstract

Recruitment and hiring of new graduate nurses are seen as a potential strategy to mitigate the problem of nurse shortage. However, previous studies disclosed that new graduate nurses are inadequately prepared to enter practice and experience transition difficulties. This study aimed to determine the perceived competence and transition experience of new graduate Filipino nurses. Seventy-nine conveniently chosen new graduate nurses were surveyed in this descriptive cross-sectional research. Self-administered instruments were used to gather data. Descriptive statistics, Mann–Whitney U test, and Kruskal–Wallis test were the statistical tools employed. Results indicated that new graduate nurses had a high level of self-reported fundamental nursing skills ($M=7.99$) and core competence ($M=8.16$), although areas needing improvement were identified. There were no significant differences in the perceived competence based on the length of experience, year graduated, area of assignment, sex, type of school graduated, CPD participation, and hospital bed capacity ($p>.05$). The major difficulty experienced by new graduates during their transition was related to changes in role expectations (72.2%). Majority expressed the need for increased support during their transition (83.5%). The most satisfying aspects of their working environment were ongoing learning (81%) and peer support (74.7%), while the least satisfying was the negative nursing work environment (55.7%). New graduate nurses are equipped with the necessary nursing skills and core competencies. However, there are still gaps and areas needing improvement that should be addressed and supported to assist them in their transition to the world of professional nursing practice. Follow up, feedback, mentoring, and preceptorship are beneficial to enhance the competencies of new graduate nurses and facilitate their successful transition into the nursing workforce.

Keywords: competency assessment, new graduate nurses, nursing skills, transition experience

Abstrak

Persepsi Kompetensi dan Pengalaman Transisi Perawat Lulusan Baru Filipina. Rekrutmen dan perekrutan perawat lulusan baru dipandang sebagai strategi potensial untuk mengurangi masalah kekurangan perawat. Namun, penelitian sebelumnya mengungkapkan bahwa perawat lulusan baru tidak cukup siap untuk memasuki praktik dan mengalami kesulitan transisi. Penelitian ini bertujuan untuk menentukan persepsi kompetensi dan pengalaman transisi perawat lulusan baru Filipina. Tujuh puluh sembilan perawat lulusan baru yang dipilih dengan mudah disurvei dalam penelitian cross-sectional deskriptif ini. Instrumen yang dikelola sendiri digunakan untuk mengumpulkan data. Statistik deskriptif, uji Mann-Whitney U, dan uji Kruskal-Wallis adalah alat statistik yang digunakan. Hasil menunjukkan bahwa perawat lulusan baru memiliki tingkat tinggi keterampilan keperawatan fundamental yang dilaporkan sendiri ($M=7,99$) dan kompetensi inti ($M=8,16$), meskipun bidang yang perlu perbaikan diidentifikasi. Tidak ada perbedaan signifikan dalam kompetensi yang dirasakan berdasarkan lama pengalaman, tahun lulus, bidang tugas, jenis kelamin, jenis sekolah yang lulus, partisipasi CPD, dan kapasitas tempat tidur rumah sakit ($p>0,05$). Kesulitan utama yang dialami oleh lulusan baru selama transisi mereka terkait dengan perubahan dalam ekspektasi peran (72,2%). Mayoritas menyatakan perlunya peningkatan dukungan selama masa transisi mereka (83,5%). Aspek yang paling memuaskan dari lingkungan kerja mereka adalah pembelajaran berkelanjutan (81%) dan dukungan sebaya (74,7%), sedangkan yang paling tidak memuaskan adalah lingkungan kerja keperawatan negatif (55,7%). Perawat lulusan baru dilengkapi dengan keterampilan keperawatan dan kompetensi inti yang diperlukan. Namun, masih ada kesenjangan dan bidang yang perlu diperbaiki yang harus ditangani dan didukung untuk membantu mereka dalam transisi mereka ke dunia praktik keperawatan profesional. Tindak lanjut, umpan balik, pendampingan, dan pelatihan guru bermanfaat untuk meningkatkan kompetensi perawat lulusan baru dan memfasilitasi keberhasilan transisi mereka menjadi tenaga kerja keperawatan.

Kata Kunci: keterampilan keperawatan, pengalaman transisi, penilaian kompetensi, perawat lulusan baru

Introduction

Nursing shortage has become a worldwide issue despite the integral part of nursing in the health care system (Fraher et al., 2015). The World Health Organization predicts rising global demand for healthcare workers until 2030 (World Health Organization, 2016). One of the trends in addressing nurse shortage in developed countries is employing international nurses from developing countries (Walker, 2010). The Philippines is one of the major sending countries of foreign healthcare workers worldwide (Yeates & Pillinger, 2018; Yasmin & Ortega, 2018). The country has been losing its most skilled and well-educated workers to the most developed countries (Lu, 2014), leaving hospitals and health care institutions in the Philippines the demands of efficient use of resources, including the hiring of new graduate professionals.

Recruitment and hiring of new graduate nurses is considered a potential strategy to mitigate the problem of nurse shortage. Despite the nursing shortage, some healthcare institutions and employers have expressed concern regarding the hiring of potential applicants including new graduates, because of their lack of experience (Cox, Willis, & Coustasse, 2014). Benner's (1984) Novice to Expert Model argues that nurses have limited technical skills and clinical experience when entering a new specialty role, and 2–3 years of experience in similar or relevant situations is necessary to be called competent. Thus, new graduate nurses may not be fully competent and prepared to begin professional practice. Previous studies found that new registered nurses have sufficient theoretical knowledge but lack competency in basic nursing skills or they are inadequately prepared to enter practice (Smith & Crawford, 2002; Moeti, van Niekerk, & van Velden, 2004; Morolong & Chabeli 2005). Although studies found that newly qualified nurses are unprepared for and unaware of the demands of the nursing profession (Kelly & Ahern, 2009), new graduates are still expected to be competent and work

independently without direct supervision (Clark & Holmes, 2007).

The transition of graduate nurses from an educational program into the practical setting is a period of stress, role adjustment, and reality shock (Casey, Fink, Krugman, & Propst, 2004). Even in nursing school, nursing students express the need for guidance in their career (Oducado et al., 2017). According to Duchscher's (2008) Transition Theory, new graduates are confronted with a broad range of changes that are both expressions of and mitigating factors during the transition. Unfamiliar and changing personal and professional roles and relationships, as well as unexpected and enhanced levels of responsibility and accountability that are not afforded to students during their education, may further aggravate these factors (Duchscher, 2008).

The Institute of Medicine report in 2010, *The Future of Nursing: Leading Change, Advancing Health* has recommended the need to support the transition of new graduate nurses (Maryniak, Markantes, & Murphy 2017). Additionally, higher education institutions have been called upon to prepare students with the necessary attributes needed of graduates for the future workforce (Sparacino, 2016). In the Philippines, higher education institutions offering the Bachelor of Science in Nursing (BSN) program must conform to the standard set by the Commission on Higher Education (CHED) (2009). The CHED Memorandum No. (CMO) 14 series of 2009 policies and standards for the BSN program specifies the core competencies expected of nursing graduates in the country. The BSN program aims to prepare a nurse, who, upon completion of the degree, demonstrates competencies of a beginning professional in the following Key Areas of Responsibility (KAR): 1) Safety and Quality Nursing Care, (2) Management of Resources and Environment, (3) Health Education, (4) Legal Responsibility, (5) Ethico-Moral Responsibility, (6) Personal and Professional Development, (7) Quality Improvement, (8) Research, (9) Records Management, (10) Commu-

nication, and (11) Collaboration and Teamwork. The KAR were formally introduced in 2005 in the Philippine Core Competency Standards for Nursing; in 2012, these Key Areas were entrenched in the National Nursing Core Competencies Standards or the NNCCS (International Labour Organization, 2014). The NNCCS serves as a unifying framework for nursing education and practice and for any related evaluation tools in various practice settings in the Philippines (International Labour Organization, 2014; Belo-Delariarte, Oducado, & Penuela, 2018). The KAR along with its performance indicators specify what nursing graduates in the Philippines are expected to do at the workplace.

Along with the current local and global nursing shortage, the importance of looking into the competencies and transition experience of the new graduate nurses in the Philippines should be recognized as an urgent need to promote retention, improve the delivery of quality care, and evaluate the outcomes of nursing education. Inputs to nursing education and practice that will be established from study results are critical in ensuring that new graduate nurses are competently equipped with the knowledge, skills, and attitudes of a beginning professional nurse.

Although competencies and transition experiences of new graduate nurses are important issues, limited published studies have been conducted in the local setting looking into these areas. Most studies delving into the transition experiences of new graduate nurses were qualitative. This study aimed to determine the perceived competence (skills and core) and transition experience of new graduate nurses in Iloilo City, Philippines.

Methods

This study utilized a descriptive, cross-sectional survey research design. Convenience sampling was used, because most hospitals in the country are experiencing nursing shortage. Nonetheless, the researcher tried to maximize data

collection to cover as many participants as possible. The participants of this study were the 79 new graduate nurses of four private hospitals in Iloilo City, Philippines. A new graduate nurse in this study was operationally defined as having a total work experience of not more than 12 months as a registered nurse after graduation. The participants included only graduates of nursing schools from 2014 to 2018. These were the graduates under CMO No. 14 BSN curriculum. New graduate nurses, regardless of employment status (permanent, contractual, or trainees) who were available and willing to participate in the study, were included. Those who were on leave during the conduct of the study and second coursers or those who took the nursing course as their second baccalaureate degree were excluded from the study.

The Perceived Competence for Filipino Nurses Questionnaire (PCFNQ), a questionnaire developed by the researchers, and Section IV of Casey–Fink Graduate Nurse Experience Survey - Revised were used as the data gathering instruments. The PCFNQ consisted of two scales: the Fundamental Nursing Skills Competency Scale (FNSCS) and the Nursing Core Competency Scale (NCCS). The FNSCS was composed of 99 items used to determine the self-report level of competence of new graduate nurses in performing basic nursing procedures. The items were based on the works of Cheng, Tsai, Chang, and Liou (2014), Berman et al. (2015), and Potter et al. (2017). The NCCS measured the participants' degree of self-reported competence based on the 11 KAR. This part consisted of all 151 performance indicators as stipulated in the CMO 14 series of 2009. Responses were provided on a 10-point scale, in which one corresponds to "not competent" and 10 indicates "very highly competent." High scores indicate a high level of competence. The 10-point scale was equally divided into five categories, and the following scale of mean was used to interpret the level of competency of new graduates: 1.00–1.79= "very low"; 1.80–3.59= "low"; 3.60–5.39= "moderate"; 5.40–7.19= "high"; 7.20–10.00= "very high".

The Casey–Fink Graduate Nurse Experience Survey - Revised (Casey & Fink, 2006) was used to assess the new graduate nurses' experience of entry into the workplace and their transition experience into the professional nurse role. The tool has been used to assess aspects of the transition experience on new graduate nurses conducted elsewhere (e.g., Cline et al., 2017). In this study, only Section IV of the tool was adopted. Permission to use the questionnaire was sought and granted by the principal authors provided that no changes will be made in any way. Four multiple response items were used to determine the difficulties, support needed, most satisfying, and least satisfying aspects of the transition experience of new graduates. The last one open-ended question that asked about the work environment and difficulties in the role transition of new graduates was not included in this report. A Personal Information Sheet was also utilized to gather the personal characteristics of the participants.

To ensure validity and reliability, the PCFNQ was subjected to face and content validation by three experts with Deanship experience in a College of Nursing and are doctorate holders. One expert is a member of the CHED Technical Committee for Nursing Education. Each member of the panel was requested to evaluate whether each item included in the scale is clear and relevant. The instrument was also pilot-tested prior to the actual survey among new graduate nurses in one of the private hospitals in the city. Ten pilot study participants were asked to evaluate the questionnaire in terms of clarity of items and instructions. Participants were inquired about the length of answering the entire survey to ensure that the possibility of respondent fatigue is considered. Cronbach's alphas of the scales were .975 for FNSCS and .996 for NCCS.

After the distribution of communication letters to conduct the study, compliance with the requirements set by each hospital, including their own ethics committee, was ensured. Once a letter of proceeding with the study was secured,

the self-administered questionnaires were distributed before or after the nurses' shifts. The unit heads of the hospitals assisted in the identification of new graduate nurses. Two to four weeks were spent on each hospital for data gathering, and the entire data collection spanned for about 2–3 months.

The data were encoded in an Excel file and processed via the Statistical Package for the Social Sciences 23. Frequency count, percentage, mean, standard deviation (SD), and rank were used to describe the data. The Mann–Whitney U test and Kruskal–Wallis test were performed to determine significant differences after data normality was assessed. The alpha level of significance was set at 0.05.

This study was approved by the Research Ethics Review Committee of the University and participating hospitals. Informed consent was also obtained before data gathering.

Results

The frequency distribution of the participants on the basis of their personal profile is shown in Table 1. The majority of the participants were female (77.2%), graduated from private schools (59.5%), graduated in the year 2018 (58.2%), had not participated in CPD activities after graduation (64.6%), and were currently working in private hospitals with a 100–200 bed capacity (64.6%). They were assigned in private rooms (38.0%), wards (31.6%), and special areas (30.4%), such as the critical care unit, operating room, and emergency department. In terms of the total nursing work experience after graduation, 38% had 1–3 months experience, 13.9% had 4–5 months experience, and 48.1% had 6–12 months experience.

Table 2 shows that the new graduate nurses had a very high level of perceived fundamental nursing skills competence ($M = 7.99$). Among the 14 skills, new graduates reported being most competent in asepsis ($M = 8.79$, Rank 1) and medication administration ($M = 8.76$, Rank 2).

However, they only had high self-reported competence in wound care ($M=7.19$, Rank 13) and diagnostic testing ($M=7.13$, Rank 14). Table 3 shows the individual enumeration of highest and lowest ranking orders of fundamental clinical nursing skills of new graduates.

Table 2 shows that the new graduate nurses in private hospitals had a very high level of perceived nursing core competence ($M=8.16$). Among the 11 KAR, the new nurse graduates had the highest mean score in ethico-moral responsibility ($M=8.50$, Rank 1), followed by legal responsibility ($M=8.49$, Rank 2). Self-reported competence was also very high in health education ($M=7.92$, Rank 10) and research ($M=7.37$, Rank 11); these areas ranked lowest among the 11 domains of core nursing competencies.

As shown in Table 4, the results of the Kruskal–Wallis test revealed no significant differences ($p>.05$) in the perceived skills and core

competence of new graduate nurses grouped based on the length of experience, year graduated, and area of assignment. The Mann–Whitney test also revealed no significant differences ($p>.05$) in the perceived nursing skills and core competence of new graduate nurses when classified based on sex, type of school graduated, CPD participation, and hospital bed capacity.

As for the transition experience of the new graduate nurses (Table 5), recognizing changes in role expectations was perceived as the major difficulty of 72.2% of the participants, followed by lack of confidence (69.6%). To feel more supported or integrated into the unit, increased support from their manager, coworkers, and mentors was reported by the majority (83.5%) of the participants. Most of the participants answered that the most satisfying aspects of their working environment were ongoing learning (81%) and peer support (74.7%), while the least satisfying was the negative nursing work environment (55.7%).

Table 1. Profile of the Participants

Categories	<i>f</i>	%
Length of Experience		
1–3 months	30	38.0%
4–5 months	11	13.9%
6–12 months	38	48.1%
Year Graduated		
2014–2016	18	22.8%
2017	15	19.0%
2018	46	58.2%
Area of Assignment		
Wards	25	31.6%
Private Rooms	30	38%
Special Areas	24	30.4%
Sex		
Male	18	22.8%
Female	61	77.2%
Type of School		
Public	32	40.5%
Private	47	59.5%
CPD Participation		
Yes	28	35.4%
No	51	64.6%
Hospital Bed Capacity		
100–200	51	64.6%
More than 200	28	35.4%
Total	79	100%

Table 2. Perceived Level of Fundamental Nursing Clinical Skills and Core Competence

Categories	Mean	Interpretation	Rank
Clinical Nursing Skills Competencies	7.99	Very High	
Asepsis (AS)	8.79	Very high	1
Medication Administration (MA)	8.76	Very high	2
Activity and Exercise (A&E)	8.66	Very high	3
Fluid, Electrolyte, and Acid–Base Balance (FEAB)	8.35	Very high	4
Safety (SA)	8.34	Very high	5
Nutrition (NU)	8.26	Very high	6
Oxygenation (OX)	8.18	Very high	7
Peri-operative Nursing (PE)	8.04	Very high	8
Hygiene (HY)	7.69	Very high	9
Health Assessment (HA)	7.64	Very high	10
Elimination (EL)	7.35	Very high	11
Pain Management (PM)	7.32	Very high	12
Wound Care (WC)	7.19	High	13
Diagnostic Testing (DT)	7.13	High	14
Core Competencies	8.16	Very High	
Ethico-Moral Responsibility	8.50	Very High	1
Legal Responsibility	8.49	Very High	2
Records Management	8.46	Very High	3
Collaboration and Teamwork	8.39	Very High	4
Personal and Professional Development	8.38	Very High	5
Communication	8.33	Very High	6
Quality Improvement	8.17	Very High	7
Safe and Quality Nursing Care	8.12	Very High	8
Management of Resources and Environment	8.07	Very High	9
Health Education	7.92	Very High	10
Research	7.37	Very High	11

Table 3. Highest and Lowest Ranking Fundamental Clinical Nursing Skills

Fundamental Clinical Nursing Skills	Mean	Interpretation	Rank
Performing handwashing technique (AS)	9.41	Very High	1
Performing capillary blood glucose measurement (DT)	9.24	Very High	2
Administering oral, sublingual, buccal medications (MA)	9.23	Very High	3
Measuring oxygen saturation (HA)	9.19	Very High	4
Discontinuing intravenous lines (FEAB)	9.18	Very High	5.5
Measuring blood pressure (HA)	9.18	Very High	5.5
Administering oxygen by cannula, face mask, or non-rebreather mask (OX)	9.16	Very High	7
Administering intravenous medications using IV push or bolus (MA)	9.15	Very High	8
Preparing medications from vials and ampules (MA)	9.13	Very High	9
Adding medications to IV fluid container (MA)	9.08	Very High	10
Assessing the breasts and axillae (HA)	6.84	High	90
Changing a bowel diversion stoma appliance (colostomy and ileostomy) (EL)	6.81	High	91
Assessing the thorax and lungs (HA)	6.8	High	92
Obtaining wound drainage specimen for culture (WC)	6.73	High	93
Removing, cleaning, and inserting a hearing aid (HY)	6.65	High	94
Performing blood withdrawal or venipuncture (DT)	6.62	High	95
Assessing the female and male genitals and inguinal area (HA)	6.48	High	96
Assessing the rectum and anus (HA)	6.33	High	97
Taking electrocardiogram (ECG) (DT)	5.77	High	98
Interpreting electrocardiogram (ECG) (DT)	5.47	High	99

Table 4. Differences in Perceived Clinical and Core Skills Competence

Independent Variables	Clinical Skills	Core Skills
	p	p
Length of Experience ^a	.397	.564
Year Graduated ^a	.807	.444
Area of Assignment ^a	.415	.330
Sex ^b	.986	.921
Type of School ^b	.407	.956
CPD Participation ^b	.406	.496
Bed Capacity ^b	.406	.667

Notes: ^aKruskal–Wallis, ^bMann–Whitney U, *p<0.05

Table 5. Transition Experience of New Graduate Nurses

Categories	f	%
Transition Difficulties		
Role Expectations	57	72.2
Lack of Confidence	55	69.6
Workload	51	64.6
Fears	41	51.9
Orientation Issues	37	46.8
Support Needed		
Increased Support	66	83.5
Improved Work Environment	46	58.2
Improved Orientation	41	51.9
Unit Socialization	37	46.8
Most Satisfying Aspects		
Ongoing Learning	64	81.0
Peer Support	59	74.7
Professional Nursing Role	50	63.3
Positive Work Environment	50	63.3
Patients and Families	49	62.0
Least Satisfying Aspects		
Nursing Work Environment	44	55.7
System	31	38.0
Interpersonal Relationships	29	36.7
Orientation	8	10.1

Discussion

This study investigated the perceived competence and transition experience of new graduate Filipino nurses. Although prior studies in other countries indicated that newly licensed nurses are said to be inadequately prepared to enter practice or still lack clarity in their level of competency (Smith & Crawford, 2002; Morolong & Chabeli, 2005; Karahan, Toruner, Abbasoglu, & Ceylan 2012; Brown & Crookes, 2016),

new graduate Filipino nurses in this study disclosed a high level of self-reported competency. Similar to the results of this study, some studies reported good competency among new graduate nurses in Taiwan (Cheng et al., 2014) and in the United States (Batch-Wilson, 2016). Studies conducted elsewhere among nurses also revealed good to high competency levels (Meretoja, Isoaho, & Leino-Kilpi, 2004; Meretoja, Leino-Kilpi, & Kaira, 2004; Wangenstein, 2010; Istomina et al., 2011). Local studies found posi-

tive perceptions or satisfactory competency among nurses, new registered nurses, and graduating nursing students (Mangubat, Mangahas, Matias, & Mauleon, 2014; Belo-Delariarte et al., 2018; Feliciano et al., 2019). A study related that new graduate nurses might perceive their preparation more favorably than nursing leaders (Goldstein et al., 2016). Prior research among preceptors found that new graduates were able to perform basic technical skills most of the time (Hickey, 2009). The latest survey by Wolters Kluwer Health Learning, Research, and Practice also disclosed a narrowing perception gap between nurse hiring managers and clinical educators on new graduates' practice readiness. This finding may denote that progress has been made (Wolters Kluwer, 2018). Moreover, efforts have been made to close the theory–practice gap in nursing education in the Philippines (Oducado, Amboy, Penuela & Belo-Delariarte, 2019). The findings of this study may indicate that new graduate Filipino nurses are indeed competent in most but not in all fundamental nursing skills and competencies. They still require assistance in some areas needing improvement. Nevertheless, the results of this study suggest readiness for beginning professional nursing practice from the perspective of new graduate Filipino nurses. Another study found that graduating nursing students' self-reported competence is linked with the perceived quality of the undergraduate program (Kiekkas et al., 2019). The CMO 14 BSN curriculum may have provided nursing students in the Philippines with relatively adequate student experiences that prepared them to function with entry-level competencies expected of the professional nursing role.

In this study, participants posted the highest competencies in asepsis and medication administration. Similar to the result of this study, asepsis (such as handwashing) and medication administration were the two most essential clinical skills with the highest level of competence identified by the new registered nurses in the studies of Boxer and Kluge (2000) and Karahan et al. (2012), respectively. These skills are fre-

quently performed. Despite such results, a review study identified that medication errors, patient falls, and delay in treatment are the most common errors of new graduate nurses (Saintsing, Gibson, & Pennington, 2011). Further research is essential to explore this finding.

By contrast, complex areas of diagnostic testing and wound care revealed low means of competence. These skill sets represent the areas uncommonly practiced by many nurses in the Philippines, except in highly specialized settings. For example, ECG recording and interpretation, and negative-pressure wound therapy management may not be part of the routine return demonstration practice in some nursing schools. Moreover, some hospitals where new graduate nurses had their clinical placements and the hospitals where they are currently employed are teaching and training hospitals. In these hospitals, depending on per hospital protocol, junior interns, postgraduate interns, and resident physicians conduct complex procedures and diagnostic tests. Cardiopulmonary and radiology technicians and wound care specialists are already available in some hospitals. These employees may have lessened the opportunities for new graduate nurses to practice these skills. Notably, most of the fundamental nursing skills requiring improvement in this study entail the use of specific equipment or resources (e.g., PCA, negative-pressure wound machine, and bowel diversion stoma appliance) that may not always be available in school or in some hospitals within the local setting. Other possible reasons reported in the literature that may also reflect the current situation in the Philippines include inadequate participation of students in these areas of instruction (Karahan et al., 2012). Skills are best learned by direct experience, and satisfactory levels of competence are achieved through time (Karahan et al., 2012). A high level of competence is significantly associated with frequent performance of clinical skills (Hassankhani et al., 2018). Despite being relatively adequately prepared by the current undergraduate nursing program, nursing schools may need to provide additional op-

portunities for students to practice some skills needing improvement.

Furthermore, in this study, most new graduate nurses displayed high regard in ethico-moral and legal responsibility. This result was supported by other prior studies (Lazarte, 2016; Karasuda, Tsumoto, & Uchida, 2014). Similarly, graduating nursing students had a high level of proficiency in these areas (Belo-Delariarte et al., 2018). New graduate nurses center around on their duties at hand. Doing so possibly increased their abilities related to their ethical duty and responsibilities to perform professional obligations in compliance with prevailing rules and regulations (Fukada, 2018; Feliciano et al., 2019). Rule-governed behavior is typical of a novice nurse (Benner, 1984) and may even be common among nurses beginning in their practice. With the increasing number of nurses being summoned to court (Faraji, Aryan, Jafari, & Khatony 2018), nurses and clients are now becoming more legally conscious.

Although a very high level of competence was reported in health education and research, these two areas ranked lowest among the 11 KAR. Results in other studies conformed to the low self-reported competency in health education or teaching coaching (Lazarte, 2016; Karasuda et al., 2014; Istomina et al., 2011). Local studies also found gaps in health literacy and health education competencies of graduating nursing students (Belo-Delariarte et al., 2018; Maduramente et al., 2019). Although the nurse who has an innate role in rendering care would always accompany teaching in his/her practice (Feliciano et al., 2019), work overload, lack of time, and limited support from coworkers (Adejumo & Guobadia, 2013) may have thwarted the development of nurses' health education competencies. Moreover, the study of Lazarte (2016) indicated that research is also among the weak areas of competency among beginning staff nurses. A recent review study also disclosed that nurses still lack awareness about research (Tuppal et al., 2019), and few new graduates utilize research (Wangensteen, 2010). Additi-

onally, a study among nursing students in a private nursing school revealed the lowest grade in nursing research (Oducado & Penuela, 2014). Results of the present study suggest that additional attention must be given to the health education and research competencies of nurses.

Meanwhile, previous studies have shown that length of work experience is positively correlated with level of competence (Meretoja, Leino-Kilpi, & Kaira, 2004; Meretoja, Isoaho, & Leino-Kilpi, 2004; Istomina et al., 2011). However, the results of this study suggest that 1 year may not be sufficient to appreciate an increase in the level of competence of new graduates. According to Scanlon (2017), the threshold for a nurse to achieve the level of being competent in practice varies. Although the first 6 months after graduation is a crucial period for new graduate nurses to reinforce clinical competence, Cheng et al. (2014) suggested that new graduates still need to have at least 12 months to feel comfortable to work in a new environment.

Benner (1984) argued that a newly registered practitioner becomes competent only with a degree of exposure to that role for 2–3 years after the point of registration. However, it is acceptable to expect that a person is competent at the level of registration (Scanlon, 2017). Besides, the professional licensure examination system ensures that the person bearing the license has met the minimum or entry-level competencies to perform acts allowed by the license (Oducado, Cendaña, & Belo-Delariarte, 2019). As novices in the role of a beginning professional nurse and for situations in which they have no prior experience, new graduate Filipino nurses perceived themselves as highly competent. New graduate Filipino nurses appear to demonstrate marginally acceptable performance consistent with the advanced-beginner level in Benner's model (1984). Their Related Learning Experiences or clinical placements in the undergraduate nursing program may be significant in honing new graduates' competency (Oducado, Amboy, Penuela, & Belo-Delariarte, 2019).

Concerning transition experience, new graduate nurses are confronted with an array of challenges when transitioning into the workforce (Hofler & Thomas, 2016). New graduate Filipino nurses in this study emphasized changes in role expectations, followed by lack of confidence and workload as their primary difficulty during their transition to practice. Practicing autonomy and being fully responsible and accountable for their actions were described by the new graduate nurses as tough and hard. Transition shock, feeling pressured, learning excitement, and needing support were also the emerging themes in the transition experiences reported in a qualitative study among new graduate Filipino nurses (Labrague, McEnroe-Pettite, & Leocadio, 2019). Other studies conducted in other countries among new graduate nurses in the United States (Fink, Krugman, Casey, & Goode, 2008); New Zealand (Walton et al., 2018), Australia (Kelly & Ahern, 2009; Ankers, Barton, & Parry, 2018), Hongkong (Wong et al., 2018), and Oman (Al Awaisi, Cooke, & Prymachuk, 2015) reported similar themes about transition difficulties and positive experiences in the first year of practice. Hussein et al. (2017) cited that new graduate nurses experience stress in the first year of practice as they strive to “fit in” and apply newly acquired skills. This result supports Duchscher’s (2008) Transition Theory where a period of feeling overwhelmed and recognizing difference from student experiences was interpreted as the first initial transition phase, known as the “shock” state. During this phase, new graduates simply focus on “surviving” the experience and exposing their self-perceived incompetence.

As reinforced by a wealth of literature (Dyess & Sherman, 2009; Hofler & Thomas, 2016; Hussein et al., 2017; Wildermuth, Weltin, & Simmons 2019; Labrague et al., 2019), support during the transition period is vital for new graduate nurses. New graduate Filipino nurses considered support from their supervisor, co-staff nurses, senior staff, coworkers, mentors, family, and friends as essential in coping through their transition. Inadequate orientation and sup-

port to new graduates during transition is associated with burnout and job dissatisfaction that may lead to high rates of turnover (Laschinger et al., 2009; Theisen & Sandau, 2013).

This study also demonstrated that new graduate nurses considered ongoing learning to be one of the most satisfying factors in their work environment. However, a significant number of new graduates in this study have not participated in any CPD activities after graduation. Nurses’ needs and expectations for ongoing professional development are necessary in the various stages of their career (Price & Reichert, 2017). Early-career nurses expect opportunities for continuing education to help them in their transition into the workplace and in the advancement of their careers (Price & Reichert, 2017). More opportunities for CPD must be provided to new graduate nurses.

Finally, new graduate nurses in this study reported that a poor nursing work environment was the least satisfying aspect of their job. The worsening working conditions of Filipino nurses reported in the news (Crisostomo, 2017; Lina, 2018) must be given proper attention to facilitate the successful transition of new graduates into the nursing workforce. As new graduate nurses seek employment in supportive workplaces (Price & Reichert, 2017), they continue to enter a work environment with limited nursing staff and increasing number of patients with complex conditions; they are often left with minimal clinical support (Hussein et al., 2017; Hofler & Thomas, 2016). These negative experiences in the work environment may result in feelings of heightened work stress and significantly influence their job satisfaction and retention.

A high level of competency takes time to develop, but with proper support and training, new graduate Filipino nurses can take on the demands of the nursing profession expected of a beginning professional nurse. Sourcing of new nurse graduate nurses may potentially address the shortage of nurses in hospital settings.

This study bears certain limitations that may pose threats to the validity and reliability of findings. First, cautious interpretation of the data should be observed due to the use of convenience sampling. The study was conducted with a relatively small sample size in four private hospitals in the Philippines, thereby limiting the generalizability of the results. Although certain competencies may be generic to nursing, findings cannot be extrapolated to other countries because the core competencies, the content of the curriculum, and the teaching methods may vary among countries. Second, research questions framed relative to competence has always been challenging to define (Scanlon, 2017), and surveys can lead to self-reported bias and social desirability. Given that the instrument used in this study underwent validation and pilot testing, further psychometric evaluation is still warranted. Other variables not included in this research may have caused variation in the competence of new graduates. Although most findings are supported by a body of literature, the results about the overall competency level of new graduate nurses is not conclusive. Despite these limitations, this study has provided empirical evidence on the limited information on competence and transition experience of new graduate nurses in Iloilo City at a particular time. Even though progress has been made in improving the competency of new graduates, there is still room for improvement. Other studies may be conducted to validate the results of the present investigation, and results must be triangulated.

Conclusions

Despite the learning gaps and areas needing improvement identified in this study, results showed that new graduates displayed beginning confidence and perceived themselves to be adequately equipped with the necessary skills and core competencies expected of a beginning professional nurse. Although new graduates are essentially novices with the role of a beginning professional, they have marginally acceptable performance in most of the fundamental nurs-

ing skills frequently done but may be uncomfortable and require guidance to carry out complex procedures and skills that they have less exposure. Recognizing changes in role expectations was perceived as their major difficulty, but they feel more supported or integrated into the unit with the presence of increased support from their manager, coworkers, and mentors. This study highlights that length of up to 1 year may not be sufficient to significantly increase the skills of new graduate nurses and be considered highly competent. Thus, when onboarding new graduates to practice, continuous training needs assessment must be done. Alignment with the global and local trends and current health care situation, as well as considering the areas needing improvement found in this survey, may serve as a guide when revisiting the curriculum. New graduate nurses go through a range of positive and negative experiences during transition. Difficulties are expected, but adequate support plays a vital role in the transition of new graduate nurses. Follow up, feedback, mentoring, and preceptorship should be recognized as relevant support needed by new graduate nurses.

Acknowledgement

The authors would like to acknowledge Mr. Grant Ireneo Pilla for his valuable support in the completion of this study.

References

- Adejumo, P.O. & Guobadia, P.O. (2013). Nurses' attitude to reading research articles and their perception of research utilization in clinical practice in a Nigerian city. *Journal of Medicine and Biomedical Research*, 12(1), 46–56.
- Al Awaisi, H., Cooke, H., & Prymachuk, S. (2015). The experiences of newly graduated nurses during their first year of practice in the Sultanate of Oman - A case study. *International Journal of Nursing Studies*, 52(11), 1723–1734. <https://doi.org/10.1016/j.ijnurstu.2015.06.009>.

- Ankers, M.D., Barton, C.A., & Parry, Y.K. (2018). A phenomenological exploration of graduate nurse transition to professional practice within a transition to practice program. *Collegian*, 25(3), 319–325. <https://doi.org/10.1016/j.collegn.2017.09.002>.
- Batch-Wilson, W. (2016). *Practice preparedness in new graduates: Exploring the education-practice gap* (Doctoral Dissertation). Walden University. Retrieved from <https://scholarworks.waldenu.edu/dissertations/2341/>
- Benner, P. (1984). *From novice to expert: Excellence and power in clinical nursing practice*. Menlo Park, CA: Addison-Wesley Publishing.
- Belo-Delariarte, R.G., Oducado, R.M.F., & Penuela, A.C. (2018). Terminal assessment of core nursing knowledge in a state university. *Asia Pacific Journal of Multidisciplinary Research*, 6(2), 10–17.
- Berman, A., Snyder, S., Kozier, B., Erb, G., Levett-Jones, T., Dwyer, T., Hales, M., Harvey, N., Moxham, L., Park, T., Parker, B., Reid-Searl, K., & Stanley, D. (2015). *Kozier & Erb's fundamentals of nursing. Australian edition*. (3rd Ed.). Australia: Pearson Higher Education AU.
- Boxer, E., & Kluge, B. (2000). Essential skills for beginning registered nurses. *Nurse Education Today*, 20(4), 327–335. <https://doi.org/10.1054/nedt.1999.0415>.
- Brown, R.A., & Crookes, P.A. (2016). What level of competency do experienced nurses expect from a newly graduated registered nurse? Results of an Australian modified Delphi study. *BMC Nursing*, 15(45), 45. <https://doi.org/10.1186/s12912-016-0166-2>.
- Casey, K., Fink, R., Krugman, M., & Propst, J. (2004). The graduate nurse experience. *Journal of Nursing Administration*, 34(6), 303–311. <http://doi.org/10.1097/00005110-200406000-00010>.
- Casey, K., & Fink, R. (2006). Casey-Fink graduate nurse experience survey (revised). Denver, CO: University of Colorado Hospital.
- Retrieved from <https://www.uchealth.org/wp-content/uploads/2016/10/PROF-CF-survey-2006.pdf>.
- Cheng, C.Y., Tsai, H.M., Chang, C.H., & Liou, S.R. (2014). New graduate nurses' clinical competence, clinical stress, and intention to leave: A longitudinal study in Taiwan. *The Scientific World Journal*, 748389. <http://doi.org/10.1155/2014/748389>.
- Clark, T., & Holmes, S. (2007). Fit for practice? An exploration of the development of newly qualified nurses using focus groups. *International Journal of Nursing Studies*, 44(7), 1210–1220. <https://doi.org/10.1016/j.ijnurstu.2006.05.010>.
- Cline, D., La Frenz, K., Fellman, B., Summers, B., & Brassil, K. (2017). Longitudinal outcomes of an institutionally developed nurse residency program. *Journal of Nursing Administration*, 47(7–8), 384–390. <https://doi.org/10.1097/NNA.0000000000000500>.
- Commission on Higher Education. (2009). *CHED memorandum order no. 14 series of 2009 policies and standards for bachelor of science in nursing (BSN) program*. Retrieved from <https://ched.gov.ph/cmo-14-s-2009/>
- Cox, P., Willis, K., & Coustasse, A. (2014). *The American epidemic: The U.S. nursing shortage and turnover problem*. Paper presented at Business and Health Administration Association Annual Meeting 2014, Chicago, IL. Retrieved from https://mds.marshall.edu/cgi/viewcontent.cgi?referer=&httpsredir=1&article=1125&context=mgmt_faculty.
- Crisostomo, S. (2017). Nurses need better pay, work conditions – FNU. *Phil Star Global*. Retrieved from <https://www.philstar.com/headlines/2017/10/20/1750983/nurses-need-better-pay-work-conditions-fnu#96K0KpI8B2Mh5soB.99>.
- Duchscher, J.B. (2008). A process of becoming: The stages of new nursing graduate professional role transition. *Journal of Continuing Education in Nursing*, 39(10),

- 441–50. <https://doi.org/10.3928/00220124-20081001-03>
- Dyess, S.M. & Sherman, R.O. (2009). The first year of practice: New graduate nurses' transition and learning needs. *Journal of Continuing Education in Nursing*, 40(9), 403–410. <https://doi.org/10.3928/00220124-20090824-03>
- Faraji, A., Aryan, A., Jafari, F., & Khatony, A. (2018). Awareness of professional rules among Iranian nurses: A cross-sectional study. *BMC Nursing*, 17(1), 55. <https://doi.org/10.1186/s12912-018-0324-9>.
- Feliciano, E.E., Boshra, A.Y., Mejia, P.C.G., Feliciano, A.Z., Maniago, J.D., Alsharyah, H.M., Malabanan, M.C., & Osman, A. (2019). Understanding Philippines nurses' competency in the delivery of healthcare services. *Journal of Patient Care*, 5(1), 146. <https://doi.org/10.4172/2573-4598.1000146>.
- Fink, R., Krugman, M., Casey, K., & Goode, C. (2008). The graduate nurse experience: A qualitative residency program outcomes. *Journal of Nursing Administration*, 38(7–8), 341–348. <https://doi.org/10.1097/01.NNA.0000323943.82016.48>.
- Fraher, E., Spetz, J., & Naylor, M. (2015). Nursing in a transformed health care system: New roles, new rules. *Robert Wood Johnson Foundation Interdisciplinary Nursing Quality Research Initiative*. Retrieved from <https://www.shepscenter.unc.edu/wp-content/uploads/2015/07/inqri-ldi-brief-nursing.original.pdf>.
- Fukada, M. (2018). Nursing competency: Definition, structure and development. *Yonago Acta Medica*, 61(1), 1–7. <https://doi.org/10.33160/yam.2018.03.001>.
- Goldstein, N., D'Alessandro, M., Sussman, A., & Brown, J. (2016). *New graduate nurse perception of competence compared to nurse leadership*. Paper presented at Sigma Theta Tau International 43rd Biennial Convention 2015. Retrieved from <http://hdl.handle.net/10755/602968>. Las Vegas, NV, USA.
- Hassankhani, H., Hasanzadeh, F., Powers, K.A., Zadeh, A.D., & Rajaie, R. (2018). Clinical skills performed by Iranian emergency nurses: Perceived competency levels and attitudes toward expanding professional roles. *JEN: Official Publication of the Emergency Department Nurses Association*, 44(2), 156–163. <https://doi.org/10.1016/j.jen.2017.06.007>.
- Hickey, M.T. (2009). Preceptor perceptions of new graduate nurse readiness for practice. *JNSD: Official Journal of the National Nursing Staff Development Organization*, 25(1), 35–41. <https://doi.org/10.1097/NND.0b013e318194b5bb>.
- Hofler, L. & Thomas, K. (2016). Transition of new graduate nurses to the workforce: Challenges and solutions in the changing health care environment. *North Carolina Medical Journal*, 77(2), 133–136. <https://doi.org/10.18043/ncm.77.2.133>.
- Hussein, R., Everett, B., Ramjan, L.M., Hu, W., & Salamonson, Y. (2017). New graduate nurses' experiences in a clinical specialty: A follow up study of newcomer perceptions of transitional support. *BMC Nursing*, 16, 42. <https://doi.org/10.1186/s12912-017-0236-0>.
- International Labour Organization. (2014). National nursing core competency standards: Training modules Philippines. Retrieved from https://www.ilo.org/wcmsp5/groups/public/-/asia/---ro-bangkok/---ilo-manila/document/s/publication/wcms_316218.pdf.
- Istomina, N., Suominen, T., Razbadauskas, A., Martinkėnas, A., Meretoja, R., & Leino-Kilpi, H. (2011). Competence of nurses and factors associated with it. *Medicina*, 47(4), 230–237. <https://doi.org/10.3390/medicina47040033>.
- Karahan, A., Toruner, E.K., Abbasoglu, A., & Ceylan, A. (2012). Perceptions of new graduate nurses regarding their competence in nursing skills. *Hacettepe University Faculty of Health Sciences Nursing Journal*, 62–72.

- Karasuda, S., Tsumoto, Y., & Uchida, H. (2014). Relationship between clinical competence of new graduate nurses and instructive support of colleagues - From the survey result at the time of one year after graduation. *Shimane Daigaku Igakubu Kiyo*, 37, 27–36.
- Kelly, J. & Ahern, K. (2009). Preparing nurses for practice: A phenomenological study of the new graduate in Australia. *Journal of Clinical Nursing*, 18 (6), 910–918. <https://doi.org/10.1111/j.1365-2702.2008.02308.x>.
- Kiekkas, P., Michalopoulos, E., Igoumenidis, M., Michalopoulos, A., & Stefanopoulos, N. (2019). Factors associated with self-reported competence of graduating nursing students. *Collegian*, 26(2), 267–272. <https://doi.org/10.1016/j.colegn.2018.08.004>.
- Labrague, L.J., McEnroe-Pettite, D., & Leocadio, M.C. (2019). Transition experiences of newly graduated Filipino nurses in a resource-scarce rural health care setting: A qualitative study. *Nursing Forum*, 54(2), 298–306. <https://doi.org/10.1111/nuf.12330>.
- Lazarte, F.C. (2016). Core competencies of beginning staff nurses: A basis for staff development training program. *Journal of Advanced Management Science*, 4(2), 98–105. <https://doi.org/10.12720/joams.4.2.98-105>.
- Laschinger, H.K., Finegan, J., & Wilk, P. (2009). New graduate burnout: The impact of professional practice environment, workplace civility, and empowerment. *Nursing Economics*, 27(6), 377–383.
- Lina, J.D. (2018). Our overworked and unpaid/underpaid nurses badly need help. *Manila Bulletin*. Retrieved from <https://news.mb.com.ph/2018/02/26/our-overworked-and-unpaid-underpaid-nurses-badly-need-help/>
- Lu, J.L. (2014). Analysis of brain drain in the Philippines: The case of professionals. *International Journal of Sociology Study*, 2, 93–99.
- Maduramente, T., Orendez, J., Saculo, J., Trinidad, A.L., & Oducado, R.M. (2019). Health literacy: Knowledge and experience among senior students in a nursing college. *Indonesian Nursing Journal of Education and Clinic*, 4(1), 9–19. <https://doi.org/10.24990/injec.v4i1.227>.
- Mangubat, N.R.C., Mangahas, B.T., Matias, C.J.C., & Mauleon, A.J.A. (2014). Level of competency of new registered nurses as perceived by their nursing supervisors. *CAM Research Journal*, 2(1), 136–169.
- Maryniak, K., Markantes, T., & Murphy, C. (2017). Enhancing the new nurse experience: Creation of a new employee training unit. *Nursing Economics*, 35(6), 322–326.
- Meretoja, R., Isoaho, H., & Leino-Kilpi, H. (2004). Nurse competence scale: Development and psychometric testing. *Journal of Advanced Nursing*, 47(2), 124–133. <https://doi.org/10.1111/j.1365-2648.2004.03071.x>.
- Meretoja, R., Leino-Kilpi, H., & Kaira, A.M. (2004). Comparison of nurse competence in different hospital work environments. *Journal of Nursing Management*, 12(5), 329–336. <https://doi.org/10.1111/j.1365-2834.2004.00422.x>.
- Moeti, M.R., van Niekerk, S.E., & van Velden, C.E. (2004). Perceptions of the clinical competence of newly registered nurses in the north west province. *Curationis*, 27(3), 72–84. <https://doi.org/10.4102/curationis.v27i3.1003>.
- Morolong, B.G., & Chabeli, M.M. (2005). Competence of newly qualified registered nurses from a nursing college. *Curationis*, 28 (2), 38–50. <https://doi.org/10.4102/curationis.v28i2.944>.
- Oducado, R.M.F., Amboy, M.K.Q., Penuela, A.C., & Belo-Delariarte, R.G. (2019). Correlation between theoretical classroom instruction and related learning experiences: Evidence from a Philippine nursing university. *International Journal of Scientific and Technology Research*, 8(12), 3666–3670.

- Oducado, R.M.F., Cendaña, D.P., & Belo-Delariarte, R.G. (2019). Institutional competency assessment and other factors influencing the nurse licensure examination. *International Journal of Scientific and Technology Research*, 8(12), 268–270.
- Oducado, R.M.F., Frigillano, P.R.S., Gunce, J.J.T., Jover, P.L.B., Meliton, P.N., & Pangilinan, K.T. (2017). Guidance needs of nursing students in Iloilo City, Philippines. *PEERS Inc. Multidisciplinary research journal*, 1(2), 35–47.
- Oducado, R.M.F. & Penuela, A.C. (2014). Predictors of academic performance in professional nursing courses in a private nursing school in Kalibo, Aklan, Philippines. *Asia Pacific Journal of Education, Arts and Sciences*, 1(5), 21–28.
- Yasmin Y., & Ortiga, Y.Y. (2018). Learning to fill the labor niche: Filipino nursing graduates and the risk of the migration trap. *RSF: the Russell Sage Foundation Journal of the Social Sciences*, 4(1), 172–187. <https://doi.org/10.7758/rsf.2018.4.1.10>
- Potter, P., Perry, A., Stockert, P., & Hall, A. (2017). *Fundamentals of nursing*. (9th Ed.). USA: Elsevier Inc.
- Price, S. & Reichert, C. (2017). The importance of continuing professional development to career satisfaction and patient care: Meeting the needs of novice to mid- to late-career nurses throughout their career span. *Administrative Sciences*, 7(2), 17. <https://doi.org/10.3390/admsci7020017>.
- Saintsing, D., Gibson, L.M., & Pennington, A.W. (2011). The novice nurse and clinical decision making: How to avoid errors. *Journal of Nursing Management*, 19(3), 354–359. <https://doi.org/10.1111/j.1365-2834.2011.01248.x>.
- Scanlon, A.P. (2017). An analysis of the concept of competence in nursing education. *Advanced Practices in Nursing*, 2(4), 1–7. <https://doi.org/10.4172/2573-0347.1000144>.
- Smith, J. & Crawford, L. (2002). Report of findings from the 2001 employers survey. *National Council of State Boards of Nursing Research Brief*, 3, 1–12. Chicago: National Council of State Boards of Nursing, Inc.
- Sparacino, L.L. (2016). Faculty's role in new graduate nurses' adjustment to practice. *SAGE Open Nursing*, 2. <https://doi.org/10.1177/2377960816635182>.
- Theisen, J.L. & Sandau, K.E. (2013). Competency of new graduate nurses: A review of their weaknesses and strategies for success. *Journal of Continuing Education in Nursing*, 44(9), 406–414. <https://doi.org/10.3928/00220124-20130617-38>.
- Tuppall, C.P., Vega, P.D., Ninobla, M.M.G., Reñosa, M.D., Al-Battashi, A., Arquiza, G., & Baua, E.P. (2019). Revisiting the barriers to and facilitators of research utilization in nursing: A systematic review. *Nurse Media Journal of Nursing*, 9(1), 90–102. <https://doi.org/10.14710/nmjn.v9i1.20827>.
- Walton, J.A., Lindsay, N., Hales, C., & Rook, H. (2018). Glimpses into the transition world: New graduate nurses' written reflections. *Nurse Education Today*, 60, 62–66. <https://doi.org/10.1016/j.nedt.2017.09.022>.
- Wangensteen, S. (2010). *Newly graduated nurses' perception of competence, critical thinking and research utilization* (Doctoral Dissertation). Sweden: Karlstad University Studies. Retrieved from <http://www.diva-portal.org/smash/get/diva2:344929/FULLTEXT01.pdf>.
- Walker, J. (2010). The global nursing shortage: Migration, brain drain, and going forward. *Johns Hopkins School of Nursing Magazine*. Retrieved from <https://magazine.nursing.jhu.edu/2010/08/the-global-nursing-shortage/>
- Wildermuth, M.M., Weltin, A., & Simmons, A. (2020). Transition experiences of nurses as students and new graduate nurses in a collaborative nurse residency program. *Journal of Professional Nursing: Official Journal of the American Association of*

- Colleges of Nursing*, 36(1), 69–75. <https://doi.org/10.1016/j.profnurs.2019.06.006>.
- Wolters Kluwer. (2018). *Perception gap on new graduates' practice-readiness narrows between nurse hiring managers and clinical educators*. Retrieved from https://www.nursingcenter.com/nursingcenter_redesign/media/nursingcenter/Nurse-Preparedness-White-Paper.pdf.
- Wong, S.W.J., Che, W.S.W., Cheng, M.T.C., Cheung, C.K., Cheung, T.Y.J., Lee, K.Y., So, K.C., & Yip, S.L. (2018). Challenges of fresh nursing graduates during their transition period. *Journal of Nursing Education and Practice*, 8(6), 30–37. <https://doi.org/10.5430/jnep.v8n6p30>.
- World Health Organization. (2016). *Global strategy on human resources for health: Workforce 2030*. Geneva: World Health Organization.
- Yeates, N. & Pillinger, J. (2018). International healthcare worker migration in Asia Pacific: International policy responses. *Asia Pacific Viewpoint*, 59 (1), 92–106. <https://doi.org/10.1111/apv.12180>.