Experiences of Participating in an Academic–Hospital Partnership Nursing Program: A Qualitative Study

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ABSTRACT

Background: Although 5-year colleges account for 41.7% of all nursing graduates in Taiwan, most of these graduates go on to university and earn a bachelor’s degree. In 2015, four universities received approval from the Ministry of Education of Taiwan and started to enroll students in the academic–hospital partnership nursing program to guide nursing graduates from 5-year colleges into the nursing workplace. The effects of this program have never been examined, especially from the perspective of the students.

Purpose: The aim of this study was to explore the experiences of students currently participating in the academic–hospital partnership nursing program.

Methods: A qualitative approach was used in this study. Twelve students were invited to participate in a focus group that met for five sessions over 3 years to understand the motivations for and experiences of participating in the academic–hospital partnership nursing program. Data were analyzed using thematic analysis.

Results: Six themes were identified: (a) incentives for participating in the academic–hospital partnership nursing program, (b) worries about making the wrong decision, (c) worries about future adaptation, (d) facing the real workplace, (e) confusion about role perception and benefits, and (f) administrator support.

Conclusions/Implications for Practice: The findings of this study enhance the general understanding of nursing student experiences and the changes over time in the academic–hospital partnership nursing programs. Moreover, the findings may be used to help teachers and nursing administrators at healthcare institutes better support the needs of students at each program stage. In addition, the findings may serve as a reference for the government in refining the design of these programs in the future.

KEY WORDS: experience, academic–hospital partnership nursing program, qualitative study.

Introduction

The primary educational backgrounds of registered nurses in Taiwan include 4-year university, 2-year university, and 5-year college nursing programs, each of which has a unique set of entry requirements. Four-year nursing programs enroll high school graduates and award a bachelor’s degree, 5-year nursing colleges enroll junior high school graduates and award an associate degree, and 2-year nursing programs enroll graduates of 5-year nursing colleges. Graduates of 4-year nursing programs and 5-year nursing colleges may take the national registered nurse examination, which they must pass to become a registered nurse in Taiwan.

In 2019, 5-year colleges accounted for 41.7% of all nursing graduates (Ministry of Education, 2020). Although all nursing graduates of 5-year colleges are eligible to work as nurses after passing the national registered nurse examination, most enter 2-year university programs to earn a bachelor’s degree because they perceive this degree will bring them better earnings and opportunities for promotion (Hsu et al., 2015). Only 40.98% of 5-year college nursing programs choose to enter the nursing profession, a phenomenon that is considered to be a major contributor to the nursing shortage in Taiwan (Lin et al., 2008).

In 2015, four universities received approval from the Ministry of Education of Taiwan to enroll final-year students of 5-year nursing colleges in an academic–hospital partnership nursing program (5 + 2 nursing program) to channel them into the nursing workplace and alleviate the nursing shortage. The entrance examination requirement was waived for this program, with program students directly entering university for 2 years of study after graduating from a 5-year college. During their 2 years of study, program students are required to work as nursing staff at hospitals. Each university cooperates with multiple hospitals to run its 5 + 2 nursing program. Upon applying for admission during their final year of 5-year college, the students may choose their preferred hospital from a list of cooperating hospitals. Finally, the students, universities, and hospitals sign a contract on program participation that includes important information such as the university,
working hospital, weekly time allocation, participant obligations, and salary and benefits due during the 2 years of program participation.

The original 2-year university nursing programs typically require 73 credits of course work to graduate. Classes are held on weekdays, which prevents students from working in hospitals while studying. Although the number of credits and the courses offered by the 5 + 2 nursing program are the same as those in the original 2-year nursing programs, the 5 + 2 program schedule is organized so that students study for 2 days at the university and work 3–4 days in a hospital. This schedule was designed to be a win–win strategy that fulfills the university degree aspirations of 5-year nursing college graduates while channeling additional manpower to hospitals. The effects of this program have yet to be examined scientifically. This study is the first to examine qualitatively the experiences of students enrolled in Taiwan’s 5 + 2 nursing program. The findings are expected to enhance understanding of how these students perceive their program-related experiences, to inform nursing schools and nurse managers in hospitals regarding how to support students’ needs, and to help guide policymakers to refine/improve this and similar programs in the future.

Methods

Design
A qualitative approach was used to elucidate the 3-year experiences of participants in the 5 + 2 nursing program and their process of change over time.

Procedure and Participants
The research site was a technological university in central Taiwan that has regularly offered the 5 + 2 nursing program to 50 students each year since 2016. This study was approved by the institutional review board of a general hospital (Nos. 10434 and 10527). Purposeful sampling, which qualitative studies typically use for recruiting rich informers, was employed in this study to recruit participants. The ideal number of participants per focus group was identified as 3–21 participants, with a median number of 10 participants (Nyumba et al., 2018). Because study data were collected from participants over a 3-year period, a 20% dropout rate was factored in, giving a target number of 12 participants in the target group. To equitably cover the five hospitals participating in the targeted 5 + 2 nursing program, the 50 program students were grouped based on hospital workplace and two to three were chosen at random from each group. Finally, 12 students were selected and invited by the researchers. All agreed to participate and signed the consent form. The participants were all female, aged 20–21 years, and had entered the program in 2016 during their fifth year of nursing college. Their academic performance was ranked in the top 50% of their classes, which met the basic requirement for program participation. They were informed that they could withdraw from the study during the research at will and without negatively impacting their program-related performance or rights. To avoid ethical concerns, the focus-group interviewer was not involved in any of the participants’ program courses. Of the 12 participants, two dropped out during the study: One (code H) withdrew during the first year for personal reasons, and the other (code A) withdrew during the second year to work in the hospital. Participants H and A both provided consent for their experiences to be used in follow-on analysis and reporting.

Data Collection
In this study, data were collected using a focus group format. The focus group environment is generally perceived as a low-pressure, supportive setting for research participants to discuss their perceptions, thoughts, and experiences. In addition, the group interactions in this environment may help researchers highlight similarities and differences among participants and obtain rich information about their perspectives and experiences (Hennink et al., 2019). Focus group meetings were conducted with the 12 participants over 3 years (2016–2018), with the first and second conducted in March and May 2016 (during the participants’ fifth year of college and soon after their decision to enroll in the 5 + 2 nursing program) and the other three conducted between late 2016 and 2018 during their university education. The group meetings were conducted midsemester by the fourth author, who is an experienced qualitative researcher with more than 20 years of experience conducting individual and focus-group interviews. Each 1.5- to 2-hour group meeting was held in a conference room at the college/university at least 1 month after the start of each semester. Meeting times were determined by the participants and set to ensure attendance by the maximum number of participants. The group meetings were recorded with the participants’ consent. Group meeting attendance is shown in Table 1, and the interview questions are listed in Table 2. In addition, five meetings of the focus group were conducted in this study to reach saturation, in line with the number suggested as reasonable by Hennink et al. (2019). However, having too many group members in attendance may degrade the effectiveness of discussion, as some participants may feel reticent to share their thoughts and experiences in larger group settings. To avoid this, the focus group interviewer paid attention to group dynamics and facilitated the discussion by prompting members to speak, requesting that overly talkative participants let others talk, and encouraging all to participate (Connolly et al., 2020).

Data Analysis
The five focus group meetings were transcribed verbatim and analyzed using thematic analysis (Jacob et al., 2020). During the analysis, each transcription was read and reread to obtain an overall understanding of the text and to familiarize the authors with the participants’ experiences in the 5 + 2 nursing program. The initial codes were then generated from the initial list of ideas about the data. The data were then coded as meaning units using highlighters to identify the
segments of data related to participant experiences. The similarities and differences among the codes were compared, and the relationships between codes and themes were carefully considered. Themes were generated by reviewing and comparing the initial codes. In the end, six themes were identified.

**Trustworthiness**

The trustworthiness of the data was ensured using four criteria: credibility, transferability, dependability, and conformability (Stahl & King, 2020). Credibility relates to the truth value of a study and was supported in this study by the authors’ expertise in nursing education and qualitative research and by choosing a sample of 12 students who were working at five different program hospitals. During the group meetings, the interviewer encouraged the participants to share their thoughts and experiences to reach a sufficient depth in the interviews. During the data analysis, the authors minimized their subjectivity to avoid misinterpreting participant experiences. For example, the authors met frequently to discuss the data analysis process, checked and rechecked the labeling, and sorted and named themes during the data analysis. In addition, the authors shared the research results and findings with two randomly selected participants to verify that they appropriately reflected their experiences. Transferability means that the findings are applicable to other contexts. In this study, 12 participants serving in five different hospitals were recruited. The different hospital backgrounds of the participants increased the transferability of the findings. In addition, the concept of thick description was used to describe the study process in detail and to extract participant experiences in sufficient detail to allow other researchers to evaluate the extent to which they examined the issues of interest. Dependability was promoted by all of the interviews being conducted by the fourth author, who has extensive experience in conducting qualitative research and interviews with participants. Furthermore, all of the coauthors met frequently to discuss the data analysis, to check and recheck the labeling, and to sort and name the themes for verification. Finally, conformability was enhanced by extracting participant experiences as thick descriptions of the study phenomena for each theme. In addition, the results were shared and discussed with two randomly selected participants (Participants C and J) who agreed that these findings appropriately reflected their experiences in the 5 + 2 nursing program.

### Table 2

| No. of Group | Time of Group Meeting | Interview Question                                                                 |
|--------------|----------------------|-------------------------------------------------------------------------------------|
| 1            | March 2016           | 1. What was your motivation for entering the 5 + 2 nursing program?                  |
|              |                      | 2. What concerned you when deciding to enter this program?                            |
|              |                      | 3. Please talk about your decision-making experiences.                                |
|              |                      | 4. What are your expectations toward your study and work lives in the next 2 years?  |
|              |                      | 5. What help would you like to receive at this stage?                                |
| 2            | May 2016             | 1. How has your experience in the 5 + 2 nursing program been so far?                 |
| 3            | October 2016         | 2. Has the 5 + 2 nursing program met your expectations? Why, or why not?             |
|              |                      | 3. Talk about your study and work experiences in the past few months since we last met|
| 4            | May 2017             | 4. Have you encountered any difficulties or challenges? How did you deal with them? |
| 5            | May 2018             | 5. What help would you like to receive at this stage?                                |
|              |                      | 1. How has your experience in the 5 + 2 nursing program been so far?                 |
|              |                      | 2. Has the 5 + 2 nursing program met your expectations? Why, or why not?             |
|              |                      | 3. Share and reflect on your experiences of these 3 years in the 5 + 2 nursing program|

Note. Groups 2, 3, and 4 were asked the same set of five questions.
Results
All of the 12 participants were female and, at the time of the first group meeting, were in the final year of their 5-year nursing college education and 20–21 years old. Most (91.7%) attended at least three group meetings during the study period. Analysis of the data revealed that participant experiences in and perceptions of the 5 + 2 nursing program were captured by six themes, which are listed in Table 3 and described below.

Incentives for Participating in the Academic–Hospital Partnership Nursing Program
Many incentives attracted the participants to apply to enter the 5 + 2 nursing program. First, all agreed that the program was very effective, as they could simultaneously earn a bachelor’s degree and gain experience. Second, enrolling in the program allowed them to avoid taking the standard university entry examination, giving them more time to study for the Registered Nurse license examination, which was held at the same time. Third, some participants expressed that the opportunity to earn a salary as a nurse was an incentive, as earnings could help pay program tuition.

I originally planned to earn a bachelor’s, but I was afraid that it would make me leave the clinic for too long. Now, I can have a degree and don’t have to leave the nursing workplace for too long because of this program. (Case C, Group Meeting 1)

I can work and earn money while studying in the university. I earn a degree and gain 2 years of work experience. It is great to choose the 5 + 2 program. I feel pretty good. (Case E, Group Meeting 2)

Worries About Making the Wrong Decision
For most participants, the decision-making process was not easy. They lacked experience but were required to choose a hospital and sign a 2-year contract. During the decision-making process, they tended to consult with their parents, relatives, peers, teachers, and internship preceptors. At this stage, their major concerns were the hospital’s size, reputation, and distance from home; the convenience of the commute; and the salary. In addition, some participants were influenced by others’ opinions, leading them to change their minds several times about program participation and choice of hospital. They also had second thoughts after deciding to participate.

I decided to sign the contract very quickly, but a friend warned me that the salary was not very good. She also said that, although I could study in the university, there would be many unknown problems in the future. I felt some regret then. (Case F, Group Meeting 2)

I learned the information about the 5 + 2 program from the clinical instructor. I went back and discussed it with my classmates, and then analyzed whether it was a good idea to apply and which hospital was better. After the discussion, I still had no idea. (Case B, Group Meeting 1)

Worries About Future Adaptation
Although the participants were happy about studying for a degree while working in their preferred hospitals for 2 years, some worried about their ability to handle both schoolwork and hospital responsibilities.

After the interview, I wondered whether this program was the right choice for me. It will be stressful for the next two years to manage both the courses and the work. Everyone starts to hesitate. (Case C, Group Meeting 2)

Sometimes, participant worries arose from a perceived lack of sufficient information regarding the school and the hospital. The worries persisted through the first and second group meetings, even after they had contacted school and hospital personnel. Their worry and uncertainty tended to focus more on the work in the hospital than on schoolwork.

It is because, even now, they have not made the work responsibilities very clear... Do we do the same things as full-time nurses? Is the salary the same as theirs? If we want to terminate the contract with the hospital, what will happen? (Case K, Group Meeting 2)

Facing the Real Workplace
The participants began the 5 + 2 nursing program during the second year of this study. Initially, all of the participants expressed that handling the stresses of being a new nurse, working in a new job, and navigating the interpersonal relationships in the hospital were difficult. While adapting, they often faced unpredictable clinical conditions and would sometimes question whether joining this program was the right decision.

I work in an emergency department, so the pace is very fast. Sometimes, I respond a little bit slowly and get scolded by senior nurses. I don’t feel I’m doing well. When the stress is very high, I feel that entering this program was the wrong choice. (Case A, Group Meeting 3)

Table 3
Themes of Students’ Experiences

| Year       | Theme                                              |
|------------|----------------------------------------------------|
| First year | 1. Incentives for participating in the academic–hospital partnership nursing program |
|            | 2. Worries about making the wrong decision         |
|            | 3. Worries about future adaptation                 |
| Second year| 4. Facing the real workplace                       |
|            | 5. Confusion about role perception and benefits     |
| Third year | 6. Administrator support                           |
I was on the night shift my first day. In theory, I should have had a senior nurse to supervise me, but she had been in a car accident. The other senior nurse briefly told me about the night shift nurse’s duties and then was busy with patients on another team. All by myself, I had to care for a whole team that night. Even worse, I cared for 19 patients, and it was really very stressful. (Case I, Group Meeting 3)

Furthermore, although the 5 + 2 program specified 2 days of study and 3–4 days of hospital work, allowing at least 1 day off, the participants sometimes worked 5 days per week because of the manpower shortages in their units, so they were unable to have days off.

The nursing staff in our hospital is too small. On our schedule for next month, everyone has only eight or nine days off. Our head nurse told me that having the day off for my classes on Monday and Tuesday should be enough. I should not ask for more. (Case F, Group Meeting 3)

Confusion About Role Perception and Benefits

The participants tended to perceive themselves as both part-time students and new, part-time nurses. However, most noticed inconsistencies in their perceived roles that confused them and the other staff. They felt misunderstood by the other staff regarding the improvement of their work performance and the privilege of taking days off.

They will think, “How come you still can’t do it right?” But I have been studying half the time and working the rest of the time every week. I can’t work all week. I thought that was the reason I didn’t do it well. I don’t know…. They just can’t understand. (Case D, Group Meeting 3)

I think the hospital should let everyone know that we are 5 + 2 students. We have to work and study, and they must make it clear first. Otherwise, I feel misunderstood by the senior staff. At first, she wondered why I could have so many days off each week. (Case B, Group Meeting 4)

In addition, the participants initially felt they were treated unfairly because they were expected to work and perform like full-time new nurses but were paid as part-time nurses, without satisfactory compensation or benefits.

The salary is low—not even 20,000 NT dollars per month. It’s half that of the full-time nurses. But I do the same things as them. The number of days we work every month is almost the same. Why is our salary only half of theirs? (Case G, Group Meeting 4)

The sense of unfairness and dissatisfaction with the compensation package was slightly alleviated after their complaints had been heard and the hospitals and nursing administrators partially responded.

Administrator Support

In the third year, the participants reflected on their experiences in the 5 + 2 program. Most affirmed the government’s good intentions in establishing this program. They could earn a degree and gain 2 years of work experience, while also having money for living expenses and tuition. However, they perceived that many factors (such as the manpower and the supporting measures of the hospitals) contributing to their experiences did not meet their original expectations. In addition, despite the hospital welcoming them as new nurses, the whole hospital system appeared poorly prepared for their arrival. Some participants argued that they were the first group of students in this program to work in these hospitals and were treated like laboratory rats. All of the participants expressed a belief that the attitudes and support from the hospital and nursing administrators were essential to the success of this program.

I think the key is the support from the administrator. If she can, she will give you a day off after 4 days of work, then give you two days to study, since you are a part-time 5 + 2 student. I think this is very important. If the supervisor faced a staffing shortage, she did not try to solve it, but asked you to come in and work all the time. I feel that this is unacceptable. (Case E, Group Meeting 5)

Discussion

The findings of this study add depth and richness to the meager literature available on the students participating in the newly designed 5 + 2 nursing programs. This program was developed to both satisfy student desires to pursue a bachelor degree and alleviate the nursing shortage in clinical settings. In particular, the experiences of Taiwanese participants in a 5 + 2 nursing program were examined longitudinally over a 3-year period. These experiences were captured by six themes: (a) incentives for participating in the 5 + 2 program, (b) worries about making the wrong decision, (c) worries about future adaptation, (d) facing the real workplace, (e) confusion about role perception and benefits, and (f) administrator support. Some critical issues around our six themes are worthy of further discussion.

At face value, the 5 + 2 nursing program successfully channels the graduates of 5-year nursing colleges into the nursing workplace for at least 2 years and partially relieves the nursing shortage in the hospitals involved in this program. In addition, the participants realized their wishes to study for a bachelor’s degree while accumulating 2 years of experience and seniority, to have more time to prepare for their Registered Nurse license examination, and to financially support their cost of living and tuition. By the end of the study period, most of the participants affirmed that the program was generally good. However, the findings also
revealed many experiences that may lead to increased worry and stress in the participants and encourage them to doubt their decision to attend this program. The findings also highlighted different support needs at different program stages.

Similar to previous reports (Sabio, 2019), in the first year, the participants expressed being happy about the opportunity to attend this program, to experience both personal and professional growth, and to develop their future potential. Their difficulties were revealed in the decision-making process, when they were unsure about making the “right decision.” This was particularly difficult for the participants as, like other students in Taiwan, they were encouraged to perform well on achievement tests and did not have an effective career counseling program. Thus, they lacked sufficient opportunities for self-exploration both before and during college (Chang et al., 2017). The participants tended to seek help from their teachers, parents, relatives, classmates, and friends, although these consultations did not satisfy their needs. Obviously, the students required professional career guidance (Mills et al., 2016).

In addition, the participants lacked confidence that they could handle both their work and study loads and expressed that they lacked sufficient information regarding their future work in the hospital. This may be quite normal for nursing students, who worry about work-related stresses and interpersonal relationships before graduation (Hsu et al., 2015). Nursing educators and administrators should talk to students about their perceptions and concerns regarding their careers and about factors that might influence their career preferences as well as provide suitable mentoring to help students make appropriate decisions and reduce their uncertainty (Chang et al., 2017; Hsu et al., 2015).

The second year of the study seemed to be the most challenging for the participants. During this year, the participants were required to adapt to new roles as a part-time nurse and a part-time student. Unlike the findings of a previous study, the participants in this study mentioned no difficulties related to their studies, revealing that part-time employment may be negatively associated with academic performance and that the amount of time spent in paid employment is the strongest predictor of academic performance (Okogbaa et al., 2020). This finding may be explained by the participants perceiving their academic load as acceptable because they had just completed studies at a 5-year college.

Participant experiences revealed that the most difficult aspect of the program was adapting to hospital work. This is unsurprising, as newly qualified nurses generally find the transition from the protected environment of academia to the unfamiliar context of professional practice both stressful and traumatic (Çamveren et al., 2020). The participants in this study experienced stresses related to workload, failure to meet colleagues’ expectations, and the limited support received from senior staff. These findings are similar to those of a previous study (Çamveren et al., 2020). It has been suggested that hospital administrators should provide appropriate levels of support during the first year of clinical practice to facilitate the transition of newly qualified nurses (Schmitt & Schiffman, 2019).

According to the findings in the second year of the study, the participants’ perceived challenges in clinical practice were more complicated than those generally perceived by newly qualified nurses. The role of the 5 + 2 program student was completely new to the hospital organization system. Therefore, the other nurses, head nurses, and administrators in the hospitals were unclear about the privileges and obligations of this new role. Thus, some participants felt misunderstood by their colleagues regarding their scheduling and the challenges in improving their work performance, and they felt they were treated unfairly because their salary and work-related benefits fell short of their original expectations. This may have hindered the participants in building interpersonal relationships in the workplace and influenced their adaptation as newly qualified nurses negatively (Schmitt & Schiffman, 2019). In addition, the original goal of the 5 + 2 program was primarily to alleviate the nursing shortage in hospital clinical settings. However, the findings highlighted that the nursing shortage and related scheduling inflexibilities were problems that interfered with participants earning their degrees (Sabio, 2019).

As noted by the participants, the administrators are key to ensuring that program students receive appropriate support in hospital settings. The privileges and obligations of 5 + 2 program students should be formally clarified within the hospital organization and specifically explained to the coworkers and head nurses responsible for working with these students. The nurse managers and administrators should be advised to actively listen to their nursing employees’ needs and provide 5 + 2 program students with recognition, flexible scheduling, emotional support, and reasonable salaries and work-related benefits (Sabio, 2019).

**Study Limitations**

The experiences of 12 students enrolled in the 5 + 2 program of a university in central Taiwan and its cooperating hospitals were qualitatively examined in this study. In light of the withdrawal of two participants and the absence of a number of participants from each group meeting, the number of participants may have been inadequate to confirm data saturation. In addition, the participants’ experiences may have been affected by differences in scale, manpower, welfare, and policy and administrative strategies among the hospitals. Thus, the findings may not be representative of 5 + 2 program student experiences at other universities and hospitals in Taiwan. In this qualitative study, the data were collected over a period of 3 years. Although we tried to organize convenient times and places for group meetings, not every participant was present at all of the group meetings, and two participants dropped out of the program. Finally, the timing of the focus group meetings was not consistent in the study, which may be a potential limitation, as student experiences may be affected by seasonal variabilities that influence outcomes.
Conclusions
This study was designed to explore the experiences of students enrolled in the academic–hospital partnership (5 + 2) nursing program. The qualitative study approach used five group meetings with the participants over 3 years to shed light on their program participation experiences. The findings increase our understanding of participants’ motivation for enrolling in the 5 + 2 program, their concerns and difficulties during the decision-making process, their worries about future adaptation, and their desire for more information in the first year. For the 5 + 2 program students who participated in this study, the second year of the study, when they began studying and working at the same time, appeared to be the most challenging. Their workloads, interpersonal relationships, confusion about role perception, dissatisfaction with salary and benefits, and other factors caused stress. In fact, the participants wondered repeatedly if joining the program had been the correct decision. School faculties and administrators at both 5-year colleges and universities should arrange professional career guidance for their students. Moreover, administrators should be aware of and address key student issues, including adaptability, worries, and need for help in the hospital, especially early in their second year. Furthermore, the administrators of participating hospitals should listen to student concerns and provide appropriate assistance and support in a timely manner.

Although this study was conducted in the context of the nursing education system in Taiwan, the findings of this study may be helpful for Asian countries where academic degrees are also valued highly. The 5 + 2 nursing program, which employs school–hospital cooperation to provide students with the opportunity to pursue degrees and engage in nursing work at the same time, may be considered as a strategy for channeling students into positions at hospitals to help alleviate nursing shortages in clinical settings. Furthermore, the difficulties, the stresses associated with each stage of the 5 + 2 nursing program, and the suggestions for school faculties and hospital administrators highlighted in this study provide a comprehensive reference to policymakers and program designers to help improve the student experience in academic–hospital partnership nursing programs.

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References
Çamveren, H., Arslan Yürümezoğlu, H., & Kocaman, G. (2020). Why do young nurses leave their organization? A qualitative descriptive study. International Nursing Review, 67(4), 519–528. https://doi.org/10.1111/inr.12633
Chang, T.-F., Chen, C.-K., Jhao, J.-C., & Tseng, L.-P. (2017). A study of demographic traits and intention of practice among college nursing students. The case of two 5-year junior colleges of nursing in southern Taiwan. Leadership Nursing, 18(2), 38–52. https://doi.org/10.29494/LN.201706_18(2).0004 (Original work published in Chinese)
Connolly, M., Browne, F., Regan, G., & Ryder, M. (2020). Stakeholder perceptions of curriculum design, development and delivery for continuing e-learning for nurses. British Journal of Nursing, 29(17), 1016–1022. https://doi.org/10.12968/bjön.2020.29.17.1016
Hennink, M. M., Kaiser, B. N., & Weber, M. B. (2019). What influences saturation? Estimating sample sizes in focus group research. Qualitative Health Research, 29(10), 1483–1496. https://doi.org/10.1177/1049732318812692
Hsu, H. L., Chang, H. Y., Chang, S. J., & Kuo, C. L. (2015). The exploration of clinical employment intention among different nursing systems of graduating nursing students in Taiwan. Macau Journal of Nursing, 14(2), 32–39. (Original work published in Chinese)
Jacob, A., Vafeas, C., Stoneman, L., & Jacob, E. (2020). Rural dialysis nurses’ experiences with challenging patients: A thematic qualitative analysis. Renal Society of Australasia Journal, 16(1), 13–19. https://doi.org/10.33235/rsaj.16.1.13-19
Lin, C.-C., Tseng, T.-H., Shiau, S.-J., Wang, S.-Y., Lu, M.-S., & Chung, U.-L. (2008). Nursing education for professional manpower in Taiwan: 2002–2006. The Journal of Health Science, 52(1), 145–158. https://doi.org/10.6563/TJHS.2008.10(3).1 (Original work published in Chinese)
Mills, J., Chamberlain-Salaun, J., Harrison, H., Yates, K., & O’Shea, A. (2016). Retaining early career registered nurses: A case study. BMC Nursing, 15, Article No. 57. https://doi.org/10.1186/s12912-016-0177-z
Ministry of Education. (2020). The statistics of nursing graduates 2019. https://stats.moe.gov.tw/bcode/ (Original work published in Chinese)
Nyumba, T. O., Wilson, K., Derrick, C. J., & Mukherjee, N. (2018). The use of focus group discussion methodology: Insights from two decades of application in conservation. Methods in Ecology and Evolution, 9(1), 20–32. https://doi.org/10.1111/2041-210X.12860
Okogbaa, J., Allen, R. E., & Sarpong, D. F. (2020). Time spent at work and its impact on the academic performance of pharmacy
Sabio, C. (2019). Associate degree nursing students’ perceived barriers to baccalaureate nursing education and intentions to enroll in a baccalaureate-only nursing environment. *Teaching and Learning in Nursing, 14*(1), 9–14. https://doi.org/10.1016/j.teln.2018.08.004

Schmitt, C. A., & Schiffman, R. (2019). Perceived needs and coping resources of newly hired nurses. *SAGE Open Medicine, 7*, 2050312119833216. https://doi.org/10.1177/2050312119833216

Stahl, N. A., & King, J. R. (2020). Expanding approaches for research: Understanding and using trustworthiness in qualitative research. *Journal of Developmental Education, 44*(1), 26–29. https://search.proquest.com/scholarly-journals/expanding-approaches-research-understanding-using/docview/2467348904/se-2?accountid=10434