



Research article



International nurse education research collaboration during the COVID-19 pandemic: Researchers' perspectives

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ABSTRACT

Background: International research collaborations in nurse are increasing. However, collaborations in international nurse education research are limited compared to clinical nurse studies. This paper presents the experiences of seven investigators of a multi-country study while conducting collaborative research among nurse students across five continents.

Objective: This paper aims to describe the experiences and challenges of conducting an international nurse education research and to propose recommendations to enhance these collaborative research experiences.

Methods: Narrative perspectives from nurse educators on the international nurse collaborative experience were described in this discussion paper.

Results: International collaboration in nurse education research was a positive and enriching experience. While several challenges were experienced by the collaborators, the presence of facilitating factors, benefits of collaboration, and opportunities for personal and professional growth and development outweighed the challenges. Team leader attributes, active engagement, commitment, genuine interest, and cultural sensitivity are essential in creating a successful international nurse research project.

Conclusion: International collaborative nurse research fosters expansion of nurse knowledge through sharing of expertise and development of culturally diverse perspectives.

1. Introduction

Knowledge development and research dissemination are essential in building nurse science and advancing nurse as a profession (Sigma Theta Tau International [STTI], 2003). Collaborative nurse research promotes educational exchange and development of multiple perspectives and solutions to address issues relevant to nurse. Such collaborations can occur on multiple levels; between individual researchers and among organizations and institutions. Globally, the scope of nurse research has grown and evolved into interdisciplinary, multi-country collaborations. From 2011 to 2015, 43 % of published research in nurse involved international collaborations (Rikken, 2016). However, most of the

collaborative studies focused on clinical nurse research. There is paucity of literature on researchers' experiences in international collaborations in conducting nurse education research.

The coronavirus disease-2019 (COVID-19) pandemic brought logistical and methodological challenges in conducting research. Due to health-related and public safety concerns, limited face-to-face interactions paved the way for technology and use of virtual platforms to become the main source of communication, collaboration, and implementation of the research process. From collaborative conceptualization of the research process to actual data collection, researchers during the pandemic had to shift their research focus and methods, thus creating a new experience for conducting research.

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This paper discusses the collaboration experiences of a group of seven international nurse education researchers from five continents consisting of seven countries - Chile, Greece, Indonesia, Nigeria, the Philippines, South Africa, and the United States of America (U.S.A.). It presents the challenges encountered during the conceptualization and implementation of our collaborative research within the context of the COVID-19 pandemic, as well as lessons learned, and recommendations to further enhance the conduct of international collaboration in nurse education research. In our research, we assessed the knowledge and attitudes on LGBTQIA+ health among nurse students internationally.

2. Background

An increase in international research collaborations was seen in recent years (Wai-Chan, 2017). The World Health Organization (WHO) advocates for international nurse research collaboration as a means to enhance knowledge development and to foster the exchange of expertise across national borders. Moreover, the International Council of Nurses (ICN) promotes international nurse research collaborations to promote evidence-based practice in addressing healthcare and nurse-related issues across countries (STTI, 2003). International collaborations in nurse education research have the potential to help achieve the three impacts of nurse: improve health outcomes, gender equality, and more robust economies (All-Party Parliamentary Group on Global Health, 2016).

The COVID-19 pandemic set a new stage for conducting research, both locally and internationally. While health-related social restrictions due to the pandemic limited face-to-face interactions for data collection, the pandemic opened opportunities for research collaborations and use of electronic and online research methods through increased use of social media and virtual platforms. International collaborations were enhanced through these virtual platforms. Methodologically, researchers had to learn online data collection techniques, such as conducting virtual interviews and electronic surveys.

Engaging in international nurse research collaborations offers several advantages. Exchange in knowledge, expertise, and experience among collaborators provide multiple perspectives and innovations in a local issue that has global implications (Bueno and Gallani, 2016; Gronkjar and Rasmussen, 2020; Tankersley, 2022). It has a positive impact on knowledge and research productivity of individual researchers and institutions (Downing et al., 2021; Tankersley, 2022; Wai-Chan, 2017). Well-designed research collaborations can provide evidence-based data to stakeholders for policy formulation that impact nurse and patient outcomes (Bueno and Gallani, 2016). Further, international collaborations increase the quality of research outputs and promote globalization of nurse education, research, and practice (Nkimbeng et al., 2021; Tankersley, 2022).

Challenges and barriers to international research collaboration also exist. Language barriers among collaborators, issues with intellectual copyright, conflict of interest, academic freedom, and differences in local contexts on the research topic were identified challenges in international research collaborations (STTI, 2003; Wai-Chan, 2017). Funding, time differences among international collaborators, cultural and geopolitical differences, and regulations affecting research protocols can be obstacles to international research collaborations (Tankersley, 2022).

3. Setting the scene

The initiative for our international collaboration began when one collaborator from the Philippines expressed his intentions to use the research instrument that was developed by a collaborator from the U.S. for a local study. The initial correspondence with the instrument developer sparked an interest for international collaboration, which resulted to invitations for collaborations from Research Gate. A total of eight collaborators with diverse educational experiences, country, cultural, and gender representations expressed interest to become part of

the project. With a common vision of the research team to promote the quality of nurse education and nurse care locally and internationally, this became a binding force for the conceptualization and development of this study over a one-year period.

4. Framework

During the conceptualization and development of the study, we followed the STTI (2003) Honor Society of Nursing Guidelines in conducting international nurse research collaborations, which consist of four phases: collaborative partnership development, research team identification, project implementation, and project evaluation. During the phase of collaborative partnership development, we did the following activities: 1) established a team spirit between the team leader and collaborators, 2) defined the goals, aims, and outcomes of the proposed collaborative project, 3) identified resources needed to complete the project, 4) determined country-specific issues related to the conduct of international research, and 5) defined the roles of the collaborators. The second phase, research team identification, further strengthened the roles of each collaborator who attended regularly scheduled meetings at six- to eight-week intervals to continuously develop and advance the project. Major methodological discussions and adaptation of the collaborative research to each collaborator's culture and context dominated the activities during this phase. After a consensus on modifications on items from the original research instrument was made, we decided to conduct the study in our respective countries independently, then consolidate our aggregate findings. Each collaborator is at a varying stage of the research process in the third phase of project implementation. This is primarily due to institution- and country-specific structures and processes in meeting Institutional Review Board (IRB) requirements as well as addressing methodological concerns. For instance, while one collaborator is translating the English version of the research instrument to Greek, another collaborator is making amendments in the IRB application, while one has already completed data collection. We are currently at this phase of the research process. We will complete the fourth phase STTI guidelines as we will collaboratively evaluate the outcome of the project in the next few months.

5. Experiences

The collaboration was an amazing learning experience for the team members. Composed of a diverse group of researchers, from a PhD student, to an early-career researcher, to mid-career researchers, the active engagement during the virtual meetings fostered learning not only about the process of conducting an international collaborative research project but gaining a deeper understanding of nurse education in different countries. The members met at regular intervals to review progress and make decisions. The focus of the meetings was to provide feedback on the progress of the research proposal submission, feedback from the IRB, the data collection process, and the sample size achieved. This experience provided opportunities for the development of future international collaborations.

The collaboration served as a platform to form a bond of connection via Facebook, following each other careers, building professional and personal bonds, and learning and sharing information, which was the most valuable asset in the group. The group members became part of an international conference and delivered keynotes. The platform for exchange to learn about nurse education in various countries was a further positive.

6. Facilitating factors

6.1. Internal factors

A common interest on the research topic and willingness to collaborate with the team, coupled with the team members' high enthusiasm,

receptiveness to diversity, commitment, and dedication were critical in having a positive international collaborative research experience. The sociability among the members facilitated a high level of engagement, open discussion, and our willingness to learn about structures and processes related to the conduct of international collaborative research, were crucial in advancing the research process.

Moreover, leadership characteristics positively influence attainment of collaborative outcomes. The project leader, a well-known and respected researcher in the world of nurse, was the original developer of the instrument who provided great direction with freedom and openness for adaptability to each participating country's cultural context. The level of willingness to collaborate, create a supportive environment, be an inspiration, and allow for best practices in each country to take priority were essential attributes taken to lead an international team of researchers.

6.2. External factors

Technology contributed to the cohesiveness of the group members as the members were familiar with meeting via Zoom. The group leader provided a detailed plan for the way forward. The members expressed the cultural challenges and acceptance of the research topic in their home country. English was the language of choice, and the group further displayed core elements of trust, mutual respect and good communication during all the meetings.

The existing instrument was a most favorable contributor to expediting the research proposal development and submission process. The instrument was available in English, and researchers had to translate it into their language.

7. Challenges

Participants referred to challenges and opportunities that came across during the international collaboration. Working with people from different countries and different cultural backgrounds were faced with some challenges, both internal and external.

7.1. Internal challenges

Language barrier was the main internal challenge that the collaborators identified. For many of the participants, English was the second language so they had to think, translate, and communicate at the same time. The language barrier has been identified as a major issue in international collaboration from various researchers. Many of the educators and researchers felt insecure about communicating in a foreign language, so language preparation should definitely be implemented (Aichhorn and Puck, 2017; Noonan et al., 2018).

7.2. External challenges

On the other hand, according to the participants there were various external challenges that should be addressed, such as time differences during the meetings, the nature of the topic specially if the topic is referring issues that are considered taboo in some cultures, such as sexual orientation and preferences. Several methodological issues surfaced in the process of collaboration, such as issues referring to cultural context or suitability of questions or tools, differences in nurse programs, and issues that have to do with statistical measures and procedures. Another challenge that had to be addressed during the international collaboration had to do with the revision of the original instrument that was used. Some of the participants would be unable to make any adjustment after the IRB clearance, so the process of translation, adaptation, and agreement on the instrument should be done consciously. Last but not least, some of the participants raised the issue of connectivity during the meetings (technical issues).

According to a recent study conducted by Matthews et al. (2020) in

which collaborative activities and barriers to international collaboration in eight societies were examined, similar challenges were reported. Time zone, language, and ethical issues were the most frequent barriers reported, while communication and difficulties in communicating effectively via email, phone or video had also been identified.

8. Opportunities

At the same time, various opportunities surfaced through those international collaboration activities, such as expanding the network of collaboration beyond the borders of your country and working with national and global researchers in nurse education. Likewise, this activity enhanced personal and professional growth and supported the internationalization initiatives of the collaborators' respective institutions. On a broader scale, exposure to international collaborative research expanded research in higher education with the country (Davidson and Carpenter, 1979).

The benefits of the international experience of all those involved in multi-country or international research projects must be evaluated in terms of personal development, academic and professional improvement, and cultural development. According to Ingraham and Peterson (2004), personal development includes all the elements that can support self-control, self-confidence and broadening horizons through meeting new people and different cultures. The benefits of the international collaborations and experiences have been highlighted by the Council of the European Union (Caena, 2011), which implemented programs and initiatives that promoted international mobility and international research collaboration under the Erasmus+ and Horizon programs. These collaborations created avenues to be able to offer responsive activities and programs to better meet the needs of individuals, inside and outside Europe.

9. Lessons learned and recommendations

The basis to successful international research collaborations is not just working together for a common goal but sharing the lessons that we learned (Thompson, 2006). We learned that open-mindedness, cultural sensitivity, and adaptability to new ideas and attitudes about other cultures and countries underscored the significance of what we were doing. The topic of LGBT health care is a global issue but was met with resistance in some cultures. For example, in Indonesia the topic of LGBT health care is considered taboo. The country is largely Muslim and Islamic law considers LGBT people as committing major sins since their sexual orientation is contrary to religious and moral norms and God's law (Tahir et al., 2017). Based on cultural and religious beliefs, we understood that the researcher in this country would find it difficult but not impossible to get IRB or ethical approval to conduct their research.

We also found that the delivery method of the nurse student LGBT health care survey did not work as well online when compared to face-to-face delivery in one country. One explanation for this is that nurse students who perceive that they are unprepared to provide care to LGBT individuals may have been reluctant to complete the survey or may be uncomfortable with the topic hence they did not respond online. As a result, the survey will be adapted for online and face-to-face delivery.

As professionals, we expanded our collaborations. We identified additional research opportunities. Several of us presented at an international research conference at the University of Thessaly in Greece, others joined another research collaboration with international nurse education requirements. Working with other research collaborators required us to have a better understanding of the nurse education system and requirements for nurse licensure. The result of that collaboration has resulted in a manuscript under preparation.

The researchers expanded their collaboration to the classroom using the emerging pedagogy of Collaborative Online International Learning (COIL). COIL involves cross-border international education. The COIL experience will involve innovative teaching and learning strategies with

doctoral nurse students at three universities (United States, South Africa, and Nigeria). The collaborators for this project are working on a conference and social media presentation and manuscript. They will assess students' preparedness for the COIL collaboration to restructure the student-faculty learning experiences for effective virtual exchange of future COIL courses. Skagen et al. (2018) and Marcillo and Desilus (2016) reported positive experiences from the COIL collaboration but found challenges around technology.

The result of this collaboration has resulted in lessons learned, expanded research projects, and opportunities that are endless. The collaboration moved from one idea to developing manuscripts, presenting at international conferences, to teaching to improve health care globally. Research, teaching, and learning have become a global enterprise and international collaboration is necessary for the expansion of knowledge (Thompson, 2006).

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CRedit authorship contribution statement

James Montegrigo: Conceptualization, Writing – original draft, Writing – review & editing. **Judith Cornelius:** Writing – review & editing. **Charlene Downing:** Writing – review & editing. **Evangelos C. Fradelos:** Writing – review & editing. **Felipe Machuca-Contreras:** Conceptualization, Writing – review & editing. **Ryan Michael Oduardo:** Writing – review & editing. **Riksa Wibawa Resna:** Writing – review & editing.

Conflict of interest

None.

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