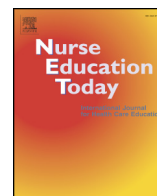




Contents lists available at ScienceDirect

Nurse Education Today

journal homepage: www.elsevier.com/nedt

Capturing readiness to learn and collaboration as explored with an interprofessional simulation scenario: A mixed-methods research study

Kelly L. Rossler^{a,*}, Laura P. Kimble^{b,1}

^a Louise Herrington School of Nursing of Baylor University, 3700 Worth Street, Dallas, TX 75246, USA

^b Piedmont Healthcare Endowed Chair in Nursing, Georgia Baptist College of Nursing of Mercer University, 3001 Mercer University Drive, Atlanta, GA 30341, USA

ARTICLE INFO

Article history:

Accepted 21 August 2015
Available online xxx

Keywords:

Simulation
Interprofessional education
Collaboration
Readiness to learn
Pre-licensure
Mixed-methods

SUMMARY

Background: Didactic lecture does not lend itself to teaching interprofessional collaboration. High-fidelity human patient simulation with a focus on clinical situations/scenarios is highly conducive to interprofessional education. Consequently, a need for research supporting the incorporation of interprofessional education with high-fidelity patient simulation based technology exists.

Objectives: The purpose of this study was to explore readiness for interprofessional learning and collaboration among pre-licensure health professions students participating in an interprofessional education human patient simulation experience.

Methods: Using a mixed methods convergent parallel design, a sample of 53 pre-licensure health professions students enrolled in nursing, respiratory therapy, health administration, and physical therapy programs within a college of health professions participated in high-fidelity human patient simulation experiences. Perceptions of interprofessional learning and collaboration were measured with the revised Readiness for Interprofessional Learning Scale (RIPLS) and the Health Professional Collaboration Scale (HPCS). Focus groups were conducted during the simulation post-briefing to obtain qualitative data. Statistical analysis included non-parametric, inferential statistics. Qualitative data were analyzed using a phenomenological approach.

Results: Pre- and post-RIPLS demonstrated pre-licensure health professions students reported significantly more positive attitudes about readiness for interprofessional learning post-simulation in the areas of team work and collaboration, negative professional identity, and positive professional identity. Post-simulation HPCS revealed pre-licensure nursing and health administration groups reported greater health collaboration during simulation than physical therapy students. Qualitative analysis yielded three themes: “exposure to experiential learning,” “acquisition of interactional relationships,” and “presence of chronology in role preparation.” Quantitative and qualitative data converged around the finding that physical therapy students had less positive perceptions of the experience because they viewed physical therapy practice as occurring one-on-one rather than in groups.

Conclusion: Findings support that pre-licensure students are ready to engage in interprofessional education through exposure to an experiential format such as high-fidelity human patient simulation.

© 2015 Elsevier Ltd. All rights reserved.

Didactic lecture formats continue to be the conventional medium used in educating undergraduate health professions students (Banfield et al., 2012; Smith et al., 2012); however, the growing complexity of health care warrants the need to effectively engage with all members of the health care team. Educators must find better ways to prepare students for professional practice. Interprofessional collaboration supports nursing students making the transition to professional practice by gaining greater competency in engaging with the health care team, which has the potential to yield better patient outcomes (American Association of Colleges of Nursing, 2008, p. 22;

Stein-Parbury & Liaschenko, 2007). However, the didactic lecture does not lend itself to teaching interprofessional collaboration. High-fidelity human patient simulation with a focus on clinical situations/scenarios is highly conducive to interprofessional education. Consequently, a need for research supporting the incorporation of interprofessional education with high-fidelity patient simulation based technology has been identified by multiple researchers, interprofessional collaborative partners, and practice initiatives (Institute for Healthcare Improvement, 2012; Interprofessional Education Collaborative Expert Panel, 2011; Patel et al., 2012; Titzer et al., 2011). A student enrolled in any type of health professions' program of study needs to successfully complete program-specific requirements as well as gain a license or other required documentation to enter into the professional practice setting. When enrolled in individual programs of study, these pre-licensure students are not guaranteed exposure to interprofessional or collaborative

* Corresponding author. Tel.: +1 214 818 7981 (Office); fax: +1 214 820 3375.

E-mail addresses: Kelly_Rossler@baylor.edu (K.L. Rossler), Kimble_LP@Mercer.edu (L.P. Kimble).

¹ Tel.: +1 678 547 6781 (Office); fax: +1 678 547 6777.

education pertaining to other practice disciplines. The purpose of this mixed-methods study was to explore readiness for interprofessional learning and collaboration among pre-licensure health professions students participating in an interprofessional education human patient simulation experience. Specifically, the research questions were:

1. Do perceptions of readiness to learn among pre-licensure students enrolled in a health professions program of study change following an interprofessional education simulation experience?
2. Are there differences among health professions pre-licensure students in perceptions of readiness to learn and collaboration following an interprofessional education simulation experience?
3. What are the pre-licensure health professions student participants' perceptions of the interprofessional education simulation experience?
4. To what extent do the quantitative and qualitative results converge?

Interprofessional Education and Readiness to Learn with Simulation Technology

Interprofessional education (IPE) is increasingly recognized as a necessary tool in transforming the education of health care professionals (Frank & Chen, 2010; Institute of Medicine, 2010; King et al., 2012). Specifically, interdisciplinary collaboration is identified as a necessity for improving patient outcomes through competency in performance of clinical skills and patient safety initiatives. An ability to effectively collaborate among health care disciplines in the areas of communication, role identification, team working skills, and conflict resolution are critical components of practice for health care professionals (Poore et al., 2014). Demands from hospital systems for novices entering the health care professions to think critically as fully engaged members of the health care team has led to the need for alternative teaching strategies in health care education (Gore & Schuessler, 2013; McLaughlin, 2010; Norman, 2012; Wellard & Heggen, 2010; Wolfgram & Quinn, 2012; Yanhua & Watson, 2011). Interprofessional education collaborative experiences taught in the educational setting help pre-licensure students to enter the health care setting better prepared to engage in an interdisciplinary environment (Thibault, 2011).

Creating substantial interprofessional collaborative educational experiences within colleges of health professions is challenging. Over the past 10 years, research has demonstrated that interprofessional education can be implemented within nursing education with high-fidelity human patient simulators. Institutional barriers to interprofessional education have been identified as workplace infrastructure, location, teaching in silos, "turf protection," issues with mutual respect, and lack of administrative support and funding (Gore et al., 2012, p. e128). However, student-focused barriers to interprofessional education have not been thoroughly investigated. Specifically, readiness of both pre-licensure and practicing health care professionals to engage in interprofessional education formats.

Academic programs exploring the potential to cross curricular boundaries to develop collaborative teaching experiences would need to examine readiness of the student to engage in such activities. Readiness, also associated with competence, can vary for every student learner (Bandali et al., 2012). Critical elements of readiness have been identified as psychomotor skills specific to discipline, core competency skills, and reflective practice. Even when these critical elements are addressed, student preparedness and readiness to engage in IPE activities can be impacted by knowledge and attitudes toward this type of learning platform (Lamb & Shraiky, 2013). If a student is not ready to engage in IPE, then interactions essential for meaningful collaboration to take place may be lost. Faculty need to consider how to create an interprofessional learning environment promoting characteristics of relationships among professional groups, teamwork, role identification, and a benefit to personal growth, professional practice, and patients. Exploration of the readiness to learn and understanding of how high-fidelity patient

simulation as a teaching methodology can positively enhance interprofessional collaboration among pre-licensure health professions students enrolled in their unique programs of study is necessary.

Theoretical Framework

David A. Kolb offered his experiential learning theory as a new approach incorporating "a holistic integrative perspective on learning that combines experience, perception, cognition, and behavior" to define the nature of what constitutes experiential learning (1984, p. 21). Learning involves human adaptation "whereby knowledge is created through the transformation of experience" (Kolb, 1984, p. 38). The learning process consists of (a) adaptation rather than content; (b) knowledge transformation which was continuously recreated, not acquired; and (c) learning. During experiential learning, knowledge is transformed from an encounter with an experience. A learner transforms from the knowledge gained and from participating in the learning experience set in an environment conducive to learning.

Educating with simulation has offered the capability to promote learning by opening up cognitive processes of students of various learning styles through sociocultural dialogue during communal lived experiences in a safe learning environment (Jeffries, 2007). Simulation also aligns with theories based on constructivism. Interprofessional education affords students from different professions the capacity to come together to learn not only about, but from one another in an active and collaborative manner. Kolb's experiential learning theory supports an active process for interprofessional education whereby those engaged in the process work with one another to gain knowledge of individual health care roles. A learner participating in a simulation activity involving interprofessional education can immerse themselves during the simulation, reflect on transactions which occurred during the simulation experience from multiple perspectives, and integrate knowledge gained to transform their own practices.

Methodology

Design

In this QUAN and QUAL type of methodology, both strands of the quantitative and qualitative processes occurred concurrently and were prioritized equally (Creswell & Plano-Clark, 2011). For the quantitative data, an exploratory, descriptive design was used to explore the readiness of pre-licensure health professions students to participate in an interprofessional simulation, examine if readiness to learn changed after the simulation experience, and evaluate the effectiveness of the simulation experience as a teaching modality.

Qualitative data were collected and analyzed using a descriptive phenomenological approach. The focus of the analysis was on describing the meaning of the experience from the perspective of the health professions' students (Giorgi, 2009). Phenomenology provided a mechanism to examine the "how" and "what" of the individual study participants' experiences of participating in an interprofessional simulation scenario (Creswell, 2007). Quantitative and qualitative findings were merged to address the mixed-methods question.

Setting and Sample

The setting for the research was the simulation laboratory in a college of health professions located in the Southeastern United States. A non-probability, convenience purposive sampling method was used to recruit an interprofessional sample (N = 53) of pre-licensure health professions students. All participants met the following inclusion/exclusion criteria: (1) enrolled in a health professions program of study; (2) having the ability to comprehend, read, and write in English; (3) and being greater than 18 years of age. Students were excluded from participation if they had previously participated in an

Download English Version:

<https://daneshyari.com/en/article/6847744>

Download Persian Version:

<https://daneshyari.com/article/6847744>

[Daneshyari.com](https://daneshyari.com)