Research Brief

Comparing Instructor-Led Versus Student-Led Simulation Facilitation Methods for Novice Nursing Students

Marian Luctkar-Flude, RN, PhD[a],*, Barbara Wilson-Keates, RN, PhD[b],
Jane Tyerman, RN, PhD[c], Monica Larocque, RN, MN[a], Cecilia A. Brown, RN, BNSc[a]

[a]School of Nursing, Queen's University, Kingston, Ontario K7L 3N6, Canada
[b]Faculty of Nursing, Level 3, University of Alberta, Edmonton Clinic Health Academy, Edmonton, Alberta T6G 1C9, Canada
[c]Trent/Fleming School of Nursing, Trent University, Peterborough, Ontario K9J 7B8, Canada

Abstract
Background: Simulation learning outcomes and learner satisfaction may be influenced by the facilitation methods employed. This mixed-methods study explored differences between instructor-led simulation with in-scenario feedback and postscenario debriefing and student-led simulation with postscenario debriefing only.
Methods: Novice nursing students experienced both facilitation methods and completed (a) Health Assessment Educational Modality Evaluation Simulation Subscale, (b) Facilitation Style Preference Survey, and (c) multiple choice quiz, and provided qualitative feedback on what they liked/disliked about each facilitation style.
Results: Novice learners preferred instructor-led to student-led simulation ($p < .001$); there was no association between simulation facilitation methods and knowledge scores. Four main themes emerged: (a) guidance and clarification, (b) avoiding error reinforcement, (c) realism, and (d) collaborative problem solving.
Conclusion: Instructor-led simulation is the preferred facilitation method for novice nursing students; however, a progression from instructor-led to student-led simulation may enhance learning by providing increased autonomy as knowledge and confidence grow.

Background

In our undergraduate nursing program, novice students practice health assessment skills on community volunteers,

standardized patients (SPs), and high-fidelity simulators (HFS). We previously conducted a study that revealed nursing students were satisfied with all three experiential learning modalities; however, they were significantly less satisfied with HFS than SPs (Luctkar-Flude, Wilson-Keates, & Larocque, 2012). The primary differentiating factor involved the facilitation methods each simulation employed. Thus, we designed a follow-up study comparing the effect of these two methods on learning outcomes and learner satisfaction with HFS.

Our study was informed by the *National League for Nursing/Jeffries Simulation Framework* and the International Nursing Association for Clinical Simulation and Learning (INACSL) *Standards of Best Practice for Simulation* (Decker et al., 2013; Franklin et al., 2013; Groom, Henderson, & Sittner, 2014). Facilitation by an instructor before, during, and after simulation is an essential component that helps learners meet learning objectives (Franklin et al., 2013). As there is often confusion and overlap between the terms facilitation, feedback, cueing, and debriefing, we have elected to use definitions recently published in the Society for Simulation in Healthcare's *Healthcare Simulation Dictionary* (Lopreiato et al., 2016) and the *INACSL Standards of Best Practice: Simulation Glossary* (INACSL, 2016) as presented in Figure 1. Based on these definitions, facilitation by instructors during and following the scenario can vary by the amount and timing of cueing and feedback provided to learners. Information provided through cueing prompts learners to progress through the

Key Points
- Facilitation methods influence learner satisfaction with simulation.
- Novice learners preferred within-scenario facilitation with post-scenario debriefing.
- A progression from instructor-led to student-led simulation may enhance learning.

scenario and may be delivered through the equipment, environment, or patient and role characters; whereas, information provided through feedback stimulates learners to reflect on their performance. Cueing typically occurs during the scenario, whereas feedback traditionally occurs following the scenario during the debriefing. Debriefing methods in nursing vary due to lack of consensus on best practice (Neill & Wotton, 2011). According to a report from the First Research Consensus Summit of the Society for Simulation in Healthcare, more research is needed comparing the effect of different debriefing times on the learning process (Raemer et al., 2011).

Facilitation methods or ways to interact with students during and following simulation range from instructor-driven to student-driven simulation (Dubose, Sellinger-Karmel, & Scoloveno, 2010) depending on the amount and timing of the prompting, feedback and debriefing. With purely instructor-driven simulation, instructors remain in the room controlling amount and timing of information provided to students and prompting learners as needed. This style has been referred to as ''in-scenario debriefing,'' ''pause button,'' or ''debriefing on demand'' (Goldsworthy & Graham, 2012; Iglesias, 2011; McMullen et al., 2016). Thus, learners are provided with feedback on their performance during real time. This approach stops the action or slows the scenario, which can help learners process events, reflect on actions, and consider more effective care approaches. Because simulation is a potentially stressful experience, this method can be useful for novices who feel they lack knowledge to proceed (McMullen et al., 2016). Pausing allows instructors to address knowledge gaps at time of occurrence, making connections between theoretical concepts and practical application. The instructor may ''role model'' desired behaviours or ''facilitate'' learning by asking questions to stimulate deeper reflection (Dieckmann, Friis, Lippert, & Ostergaard, 2009). This facilitation style has been employed in our

	SSH Healthcare Simulation Dictionary (Lopreiato et al., 2016)	INACSL Standards of Best Practice: Simulation Glossary (INACSL Standards Committee, 2016)
Facilitation	*Implementation or delivery of simulation activities (modified from the definition of facilitator)*	*A method and strategy that occurs throughout (before, during and after) SBEs in which a person helps to bring about an outcome(s) by providing guidance (Lekalakala-Mokgele & du Rand, 2005).*
Feedback	*An activity where information is relayed back to a learner*	*Information given or dialog between participants, facilitator, simulator or peer with intention of improving the understanding of concepts or aspects of performance (Lekalakala-Mokgele & du Rand, 2005).*
Cueing/Prompting	*To provide information during the simulation that helps the participant progress through the activity to achieve stated objectives (modified from NLN-SIRC, 2013)*	*Information that helps the participant(s) process and progress through the scenario to achieve stated objectives. Cueing comprises two types, conceptual and reality cues, with mode of delivery enacted via equipment, environment, or patient and role characters.*
Debriefing	*To encourage participants' reflective thinking and provide feedback about their performance while various aspects of the completed simulation are discussed*	*A reflective process immediately following the simulation-based experience that is led by a trained facilitator using an evidence-based debriefing model*

Note: SSH=Society for Simulation in Healthcare; INACSL=International Nursing Association for Clinical Simulation and Learning

Figure 1   Selected definitions of key terms.