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Editorial

Clinical Simulation in Nursing

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Progress in the Quest to Improve Patient Safety through Simulation

The bicentenary of Florence Nightingale's birth is, without doubt, a momentous year for nurses and midwives. However, When the World Health Assembly designated 2020 as the International Year of the Nurse and Midwife, few could have predicted how the year would unfold. Around the world, hundreds of thousands of nurses and midwives, called by the same sense of duty as Nightingale's army nurses, are working at the front line, fighting an unseen enemy, often in makeshift hospitals and repurposed wards. Behind the scenes, nurses are following Nightingale's example and using statistical modelling to respond to the rapidly unfolding pandemic, investigating the impact of clinical interventions designed to reduce mortality, and advocating for access to infection control resources to protect staff and improve patient safety.

Across the globe, educators and academics have designed simulation scenarios to prepare for and respond to outbreaks of COVID-19. With educational institutions closing and many clinical placements cancelled, faculty have rapidly designed, deployed and shared virtual and screen-based simulations to ensure that students can continue to engage in authentic and meaningful learning experiences using online approaches. The need to rationalize and re-allocate education resources and efforts has resulted in re-priorization of curriculum content, asking 'what learning do students actually need to know now and what learning can be postponed?' For many, this has meant a focus on maintaining safety for both nursing students and patients.

Since the landmark 'To err is human' report (2000) and the later World Health Organization (2006) report, patient safety has become a global priority. In the wake of these reports, simulation was increasingly seen as a panacea and a way of improving patient safety. To date, although studies suggest that some progress has been made, demonstration of improvements in patient outcomes has been limited, with some types of errors proving more amenable to simulation-based learning than others (Zendejas, Brydges, Wang, & Cook, 2012). In a scoping review we conducted in 2018 to explore the extent to which simulation-based education addresses contemporary patient safety priorities (Seaton et al., 2018), it became apparent that evidence for the impact of simulation on safety outcomes was scarce and the hoped for outcomes of simulation may not be commensurate with the significant investment that has been made. Indeed, the review identified only 15 papers that met the inclusion criteria and those that did focused primarily on preventing and controlling health-care associated infections, medication safety, clinical hand-over/handoff, and recognizing and responding to clinical deterioration. However, the point should be made that a lack of unequivocal evidence does not necessarily indicate that simulation has little impact on patient safety, but instead, that there is a dearth of rigorous studies.

Therefore, it is encouraging in this Special Edition of Clinical Simulation in Nursing, to be able to present a diverse range of quality simulation papers that demonstrate that simulation can improve patient outcomes. These studies have employed different methodologies and were undertaken across a range of different contexts and countries.

Recognizing the relationship between communication skills and patient outcomes, we have included articles examining the impact of simulations targeting patient advocacy, assertive communication and 'speaking up' against incivility. Other articles focus particularly on the impact of simulations on vulnerable groups such as minority populations, neonates, older people, and those with an intellectual disability. Responding to deteriorating patients and the use of simulation to improve cardiopulmonary resuscitation skills also feature in this edition.

In 1860, Nightingale said 'Were there none who were discontented with what they have, the world would never reach anything better.' This edition of the journal illustrates how the quest to improve patient safety has contributed to simulation reaching greater heights of scholarship, and it provides a snapshot of the progress towards the provision of evidence-based simulation to improve clinical outcomes. The quality of patient care is critically important and healthcare professionals have a responsibility to ensure all patients receive safe care. Likewise, education providers have the responsibility to ensure that graduates emerge from programs of study with the skills and knowledge to practice safety. The papers in this issue provide insights into designing responsive curricula, however, there remains a need for more high-quality research in order to inform the development of quality educational innovations.

Finally, as an editorial team, we offer our thanks to nurses, midwives and other healthcare clinicians, wherever they are and whatever role they play, and we would like to pay our respects to those who have sacrificed their lives to keep patients safe from the consequences of COVID-19.

> Tracy Levett-Jones, RN, PhD, MEd & Work, DipAppSc(Nursing) Professor Professor of Nursing Education Head of School University of Technology Sydney School of Nursing & Midwifery Ultimo, New South Wales 2007, Australia E-mail address: tracy.levett-jones@uts.edu.au

Fiona Bogossian, RN, RM, DipAppSci(NEd), BAppSci(N) with distinction, MPH, PhD, SFHEA, FACM Professor

Churchill Fellow Professor of Practice Education in Health University of the Sunshine Coast School of Nursing Midwifery and Paramedicine Queensland 4556, Australia

Simon Cooper, RN, BA (Hons), MEd, PhD, FHEA Professor Associate Dean Research Federation University Australia School of Nursing and Health Professions Gippsland Campus Churchill, Victoria, Australia

Michelle Kelly, RN, BSc, MN, PhD Associate Professor Simulation Lead - School of Nursing, Midwifery & Paramedicine, Curtin University

> Lisa McKenna, RN, PhD, MEdSt, RN, RM Professor Professor and Head School of Nursing and Midwifery La Trobe University Bundoora, Victoria 3086, Australia

Philippa Seaton, RN, PhD, MA(Hons), BA (Nursing & Education) Associate Professor Associate Professor and Director Centre for Postgraduate Nursing Studies University of Otago Christchurch 8140, New Zealand

References

Nightingale, F. (1860). English Nurse: Cassandra: an Essay pt. 2.

- Seaton, P., Levett-Jones, T., Cant, R., Cooper, S., Kelly, M., McKenna, L., ..., & Bogossian, F. (2018). Exploring the extent to which simulationbased education addresses contemporary patient safety priorities: A scoping review. *Collegian*, 26, 194-204. https://doi.org/10.1016/j.colegn.2018.04.006.
- World Health Organization. (2008). World Alliance for Patient Safety Progress Report 2006-2007. World Health Organization. Retrieved from https://apps.who.int/iris/handle/10665/75169.
- Zendejas, B., Brydges, R., Wang, A., & Cook, D. (2012). Patient outcomes in simulation-based medical education: A systematic review. *Journal of General Internal Medicine*, 28(8), 1078-1089. https://doi.org/10.1007/ s11606-012-2264-5.