  

***Nurse Practitioner Essential Skills***

Virtual Simulation Experience–

Facilitator Guide



Concussion Management

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**except where otherwise noted**

## Project Team

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**Actors**

We would like to acknowledge the important contribution of all the actors who took part in this project. Due to the sensitive nature of the content of the virtual simulations we will not be publishing the names of the actors. We would also like to stress that the opinions expressed by the actors in the virtual simulations does not reflect their own personal opinions.

**\*\*\*To protect the safety of the actors it is not permitted to extract, manipulate, or repost any video clips from the virtual simulations, as permission to use the actors’ images are only valid within the context of the virtual simulation package as created by the project team\*\*\***

## Land Acknowledgement

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| The recording of this scenario was completed at Ryerson University in Toronto, Ontario. Toronto is in the 'Dish With One Spoon Territory’.  The Dish With One Spoon is a treaty between the Anishinaabe, Mississaugas and Haudenosaunee that bound them to share the territory and protect the land. Subsequent Indigenous Nations and peoples, Europeans and all newcomers have been invited into this treaty in the spirit of peace, friendship and respect. |

## Funding Acknowledgement

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| This project was made possible with funding by the Government of Ontario and through eCampus Ontario’s support of the Virtual Learning Strategy. |

To learn more about the Virtual Learning Strategy visit: <https://vls.ecampusontario.ca>

## Collaborator Acknowledgement

This virtual simulation was developed in collaboration with the **Canadian Alliance of Nurse Educators using Simulation (CAN-Sim)** using the CAN-Sim virtual simulation design process.

A red and white logo

Description automatically generated with low confidence

To learn more about CAN-Sim visit: <http://can-sim.ca/>

## Learning Objectives

**By the end of this virtual simulation experience, learners will be able to:**

1. To assess a head injury in a pediatric patient to determine the diagnosis and the severity of the injury
2. To determine the need for neuro-imaging in a pediatric patient with a head injury to determine the need for neurosurgical intervention
3. To recognize red flags in a pediatric patient with a head injury to determine the need for transfer to the emergency department
4. To provide evidenced-based concussion management education to patient and family to optimize outcomes
5. To develop an appropriate follow up plan for a pediatric patient with a head injury to ensure provision of additional support if needed

## Pre-Simulation Preparation

**Case Summary**

Jamie, a 10-year-old girl was hit in the head by a ball at school during recess. Mom was called by the school. No loss of consciousness occurred but Jamie is complaining of a headache and some nausea/dizziness.

Past Medical History: healthy, immunizations up to date, no medications.

Child needs medical clearance to return to school so mom takes Jamie to see the NP in the urgent after-hours clinic.

**Suggested Pre-Readings**

* Canadian Guideline on Concussion in Sport – Parachute guidelines - <https://parachute.ca/en/professional-resource/concussion-collection/canadian-guideline-on-concussion-in-sport/>
* Concussions Ontario – Standards for post-concussion care - <https://concussionsontario.org/healthcareprofessionals/standards/>
* Concussion Awareness Training tool- Medical Professional course - https://cattonline.com/medical-professional-course/

## Pre-Briefing

**Delivery Methods**

The prebriefing for a virtual simulation can be delivered in different ways:

1. Synchronous in-person
2. Synchronous virtual
3. Asynchronous virtual
4. Written
5. Hybrid

**General components of a Pre-briefing Script for Virtual Simulations**

1. **Orientation:** 
   1. Review of learning outcomes
   2. Review of scenario/case summary
   3. Review of guidelines/models/frameworks relevant to the simulation
   4. Instructions for completing the virtual simulation experience
2. **Psychological safety:**
   1. Rules of conduct for completing simulations in groups (if applicable) including fiction contract and confidentiality
   2. Rules of conduct for debriefing (in-person or virtually)
   3. List of wellness resources for students experiencing distress

**Components of Prebriefing for NP Essential Skills Virtual Simulation Experiences**

Each of the virtual simulations highlights one of several evidence-based models, frameworks or strategies related to addressing racial microaggressions in clinical settings. Each experience does not cover all the possibilities and is meant to give learners options that they can choose to apply in their own practice. Thus, **there are no true “correct” or “incorrect” responses to the clinical decision points**. Our goal is to empower learners by providing examples of how to respond to different microaggressions in the clinical setting.

**For more information about Prebriefing and establishing psychological safety during a virtual simulation please see the following publications**

Dale-Tam, J., Thompson, K., & Dale, L. (2021). **Creating psychological safety during a virtual simulation session**. *Clinical Simulation in Nursing, 57*, 14-17. <https://doi.org/10.1016/j.ecns.2021.01.017>

INACSL Standards Committee, McDermott, D.S., Ludlow, J., Horsley, E., & Meakim, C. (2021). **Healthcare Simulation Standards of Best Practice Prebriefing: Preparation and briefing.** *Clinical Simulation in Nursing, 58*, 9-13. <https://doi.org/10.1016/j.ecns.2021.08.008>

## Virtual Simulation Experience

**Link to access Concussion Management:**

## <https://www.can-sim.ca/games/npconcussione1/story_html5.html>

## Debriefing & Reflection

**Reflective Questions for Asynchronous Self-Debrief:**

1. How would you rate your confidence using the PCARN decision rules in primary care?
2. You are a new graduate nurse practitioner working in primary care, how would you describe your comfort managing a concussion in a pediatric patient?
3. What red flags in a pediatric head injury would warrant immediate transfer to an emergency department?
4. What if this patient has had multiple concussions, how would this change the management?
5. How do you manage post-concussion syndrome?
6. Did you feel adequately prepared for this scenario?

**For additional information and guidance on debriefing virtual simulations please see the following publications:**

Atthill, S., Witmer, D., Luctkar-Flude, M., & Tyerman, J. (2021). Exploring the impact of a **virtual asynchronous debriefing method** following a virtual simulation game to support clinical decision making. *Clinical Simulation in Nursing, 50*, 10-18. <https://doi.org/10.1016/j.ecns.2020.06.008>

Goldsworthy, S., Goodhand, K., Baron, S., Button, D., Hunter, S., McNeill, L., Budden, F., McIntosh, A., Kay, C., Fasken, L. (2022). **Co-debriefing virtual simulations**: An international perspective. *Clinical Simulation in Nursing, 63*, 1-4. <https://doi.org/10.1016/j.ecns.2021.10.007>

Goldsworthy, S., & Verkuyl, M. (2021). **Facilitated virtual synchronous debriefing**: A practical approach. *Clinical Simulation in Nursing, 59*, 81-84. <https://doi.org/10.1016/j.ecns.2021.06.002>

Harder, N., Lemoine, J., Chernomas, W., & Osachuk, T. (2021). Developing a **trauma-informed psychologically safe debriefing framework** for emotionally stressful simulation events. *Clinical Simulation in Nursing, 51*, 1-9. <https://doi.org/10.1016/j.ecns.2020.11.007>

Luctkar-Flude, M., Tyerman, J., Verkuyl, M., Goldsworthy, S., Harder, N., Wilson-Keates, B., Kruizinga, J., & Gumapac, N. (2021). **Effectiveness of debriefing methods for virtual simulation**: A systematic review. *Clinical Simulation in Nursing, 57*, 18-30. <https://doi.org/10.1016/j.ecns.2021.04.009>

Verkuyl, M., Atack, L., McCulloch, T., Lui, L., Betts, L., Lapum, J.L., Hughes, M., Mastrilli, P. & Romaniuk, D. (2018). **Comparison of Debriefing Methods Following a Virtual Simulation**: An Experiment. *Clinical Simulation in Nursing*. <https://doi.org/10.1016/j.ecns.2018.03.002>

Verkuyl, M., MacKenna, V., & St. Amant. (2021). Using **self-debrief** after a virtual simulation: The process. *Clinical Simulation in Nursing, 57*, 48-52. <https://doi.org/10.1016/j.ecns.2021.04.016>