Enhancing Pediatric Simulation: Integrating Standards, Realism, and Inclusive Learning in Undergraduate Nursing

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Summary of Goals and Objectives

The core objectives of this project were to provide essential updates to our pediatric simulation curriculum by incorporating the INACSL Nursing Simulation Standards, align pediatric nursing simulations with the structure and best practices used in other semester's simulations, enhance student learning by adding realism to scenarios, diversify mannequins and case content to more accurately reflect the communities our students will serve and their own identities as diverse learners, and increase student engagement by structuring the learning experience and providing guided pre-work to help students fully prepare for and benefit form each pediatric simulation. Key goals included revising our existing simulations and creating them using a structured framework designed to guide the development of high-quality simulation scenarios in nursing education, the National League for Nursing (NLN) Simulation Template. This tool ensures that our pediatric simulations are consistent, evidence-based, and aligned with best practices, and it was used to develop and revise our existing pediatric simulations on a common respiratory and neurologic condition in children. The template includes components such as learning objectives, scenario overview, participant roles, pre-briefing and debriefing plans, equipment and environment set up, and evaluation methods (National League for Nursing, 2015). By utilizing this standardized format, I was able to create simulations that are pedagogically sound, measurable in outcomes, and consistent among faculty users. Additional goals were to increase student engagement and learning by structuring the simulation and debriefing, adding features that enhances realism, providing pre-work to help students prepare for success, and diversifying the types of pediatric patients represented by utilizing our new Pediatric HAL mannequin with black skin tone, increasing representation beyond the previously

all-white mannequins and purchasing several infant dolls of different ethnicities to use in our pediatric labs.

Activities Completed

- Shadowed first-semester SON faculty during a simulation to observe structure, format, and delivery of the learning experience
- Engaged in ongoing communication with the SON Simulation Coordinator to guide the design and enhancement of pediatric simulation scenarios
- Revised existing RSV and seizure scenarios using National League for Nursing (NLN)
 Simulation Template and International Nursing Association for Clinical Simulation and Learning (INACSL) standards, a professional organization known for the Healthcare
 Simulation Standards of Best Practice (International Nursing Association for Clinical Simulation and Learning, 2021)
- Developed faculty resources to support simulation delivery, ensure alignment with learning objectives, and promote consistency across facilitators
- Created the RSV scenario in Laerdal software to run efficiently with our existing mannequin and simulation technology
- Traveled to CSU LA for observation and collaboration with other pediatric nursing faculty
- Purchased Chart Flow, an educational EHR tool, to pilot with students during simulation in Fall 2025 after observing its use at CSU, LA
- Developed a new pediatric GI scenario on appendicitis, based on observations from CSU,
 LA, student feedback on needs, and in alignment with existing adult simulations in the

School of Nursing, with plans to incorporate pre-work from the student's Elsevier package

- Updated mannequin-use, simulation environment, moulage, and lab supplies to enhance both realism and representation
- Bonus activity: Completed Gaumard simulator training in Texas, which further supported development of this project

Outcomes and Impact

As a result of this work, several benefits were realized for faculty, the curriculum, and students. Faculty readiness to facilitate pediatric simulations increased through the use of standardized templates and aligned objectives. Simulation delivery also became more consistent across instructors, reducing variability that previously existed in students' learning experience. This work is expected to support increased faculty engagement in simulation-based teaching due to clearer structure and improved realism. Additionally, faculty will now have access to new instructional tools, including structured debriefing guides, observation checklists, prework materials, and updated, evidence-based scenarios. Pediatric simulation activities are now more realistic, inclusive, and aligned with best-practice standards. Finally, student feedback indicated increased confidence, engagement, and satisfaction with pediatric simulation experiences.

Future Plans

This project laid the foundation for future curriculum enhancements in our pediatric courses. Based on student feedback, I am currently finalizing the development of a Parent and Child Communication Skills Day. I have also purchased Chart Flow for student use and plan to

pilot a comparison study in the fall to evaluate its effectiveness as a tool in nursing simulations. Both of these initiatives emerged directly from the work completed on this project.

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References

National League for Nursing. (2015). NLN simulation design template.

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