Resident-driven peer simulation curriculum: Pilot project for internal medicine residents

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Purpose: Simulation training is playing an increasingly important role in both undergraduate and postgraduate medical education. High-fidelity simulation encompasses the use of life-sized mannequins with computer-generated vital signs and simulated breathing and heart sounds. This has expanded the scope of simulation for experiential learning, evaluation, and research, especially for training focused on high-risk critical and rare, uncommon events. In this project, first-year internal medicine residents designed and developed simulation scenarios to be implemented into the common internal medicine academic curriculum. Methods: Existing scenario templates used in the simulation laboratory at Memorial University’s medical school were employed to develop novel scenarios. Residents considered requirements for simulation equipment, identified outcomes-based learning objectives, and developed debriefing and background content. Scenarios were designed to include several event stages during which simulation participants make different choices with varied responses and varied progression to subsequent stages. Results: Two scenarios were developed. In both scenarios, high-fidelity human patient simulators required residents to identify, assess, and manage unstable patients and review Advanced Cardiovascular Life Support (ACLS) algorithms. Residents were divided into small groups to participate in these scenarios during dedicated academic time. The program will be evaluated with self-efficacy surveys by the resident-facilitators. Resident-participant satisfaction of experience will be assessed. Conclusions: The implementation of this project is in progress. We will comment on the impact of the introduction of resident-driven and delivered simulation experiences as well as on the sustainability of the internal medicine simulation program and on the feasibility of using this model to foster resident development in the CanMEDS medical scholar role.