Patients with a VOC diagnosis during the study periods were selected in each department's database. The primary outcome was to evaluate the hospitalization rate. The rate of oral administration, as well as the opiate administration time from inscription in the ED or arrival in the HOC were also calculated. We estimated that 35 patients per arm would be sufficiently powered to detect at least a 30% rate reduction of admissions, with a power of 80% and a significance of 0.05. **Results:** Over the two periods, a total of 105 patients (49 pre and 56 post) were included from the ED and 62 patients (36 pre and 26 post) from the HOC. Both departments showed a reduction in hospitalization rate: a difference of 48% (95% CI 32, 61) in ED and 38% (95% CI 13, 57) in HOC. Both showed an increase in the rate of oral administration: a difference of 36% (95% CI 19, 50) in ED and 33% (95% CI 8, 53) in HOC. There was a non-significant difference of 10 min (95% CI -10, 25) in the opiate administration time in ED, as opposed to HOC where a significant difference of -45 min (95% CI -71, -6) was found, with both presenting median times over the recommended 60 minutes post implementation. Both settings showed an increase in the percentage of patients without IVs; a difference of 17% (95% CI 4, 30) in ED and 55% (95% CI 72, 31) in HOC. **Conclusion:** This study validates the use of our oral morphine protocol for the treatment of VOC, by showing a significant reduction in hospitalization rates. Although delays remain in our opiate administration time, our protocol decreased the number of painful IV procedures.
Keywords: pain, pediatrics, sickle cell disease

P098

Development and evaluation of a mobile simulation lab with acute care telemedicine support

M.H. Parsons, MD, K. Wadden, BSc, M. Pollard, BSc, A. Dubrowski, PhD, A. Smith, MD; Memorial University, St. John's, NL

Introduction / Innovation Concept: Skillful performance is central to the provision of quality healthcare. Well-organized, deliberate practice with instruction and feedback leads to the best learning and patient outcomes. Professionals in rural/remote locations often face significant challenges in maintaining procedural proficiency and delivering acute care medical services. This is especially important with low-frequency high-stakes procedures. Simulation can play an important role in skills maintenance but limited access to simulation labs and resources in rural areas due to time, cost and distance are often prohibitive. Mobile telesimulation has the potential to facilitate high-quality instruction and overcome these barriers. Our goal is to develop a mobile simulation unit (MSU) that uses acute-care telemedicine mentoring techniques to meet the needs of rural physicians. **Methods:** The MSU design process is a prototype development series with qualitative results from each prototype (A and B) informing design and development of the next. This serves as an assessment of the functionality and set-up of the MSU for housing the simulation equipment/mannequin and providing an acceptable learning environment. The final design (C) will be evaluated for educational effectiveness. Medical students will be taught endotracheal intubation on a mannequin in the MSU under one of 2 conditions. The experimental group will receive instruction, demonstration and feedback from an expert in the telesimulation lab at Memorial University. The control group will receive the same instructions and feedback face-to-face from an expert located in the MSU. Participants will complete a retention test 1 week after the intervention. Performance between the 2 groups will be compared and user satisfaction will be assessed. **Curriculum, Tool, or Material:** The MSU will be a portable, inflatable structure equipped with telecommunication equipment to provide efficient interaction between the rural/remote learner and their instructor at a different site. The design and components of the MSU will facilitate easy transport and deployment for telesimulation in rural/remote areas. A combination of fixed and wearable cameras will facilitate instruction, demonstration and feedback to the learner. **Conclusion:** Mobile telesimulation may play an important role in overcoming the barriers of geography, cost and access to expert instruction. Implications of this research are far reaching and extend beyond healthcare education and training.
Keywords: innovations in EM education, simulation, rural medicine

P099

Development and qualitative evaluation of an emergency medicine simulation book to facilitate the use of simulation for our local EM program

M.H. Parsons, MD; Memorial University, St. John's, NL

Introduction / Innovation Concept: Simulation-based medical education (SBME) has seen increased application in medical education. Emergency medicine (EM) trainees must develop a diverse skill set to smoothly transition to clinical practice and ensure optimal patient outcomes. The competency-based medical education (CBME) framework helps ensure residents develop the required expertise relevant to each of the CanMEDs roles. Simulation is a valuable supplement to hands-on clinical experience and allows skill development in a low-risk setting. The EM Simulation book serves to facilitate the effective application of simulation in our curriculum. **Methods:** A number of resources were compiled to meet the needs of our simulation program within Memorial University of Newfoundland. Personal knowledge/experience of the author and local contacts provide site relevant content. Prior training helped in review and selection of materials on simulation theory and debriefing. Core EM resources were sourced for information on procedural training. Literature review on simulation was used to compile a list of resources and materials for further reading. The development and revision of the manual continues as an iterative process with sequential edits based on review and feedback. Qualitative evaluation of the design and value of this document is planned to get feedback from key stakeholders including learners, faculty and simulation lab staff. **Curriculum, Tool, or Material:** The final product is a 94-page document provided in print and electronic format to the EM residents and several faculty involved in simulation. It introduces residents to our simulation program, provides relevant background information and orients them to this modality of curriculum delivery. Theory and rationale behind SBME is included. Information on the key role of debriefing is highlighted. Several core EM procedural topics are covered with tips on practice station set up. Additional learning resources are noted, including information on case development for potential teachers. **Conclusion:** The simulation book brings together key information to optimize the simulation-based medical education experience for EM residents at Memorial University.
Keywords: innovations in EM education, simulation, residency education

P100

It's more than just Travel CME: an embedded ethnography of a unique emergency medicine conference

R. Penciner, MD, MSc, K. Dainty, PhD; North York General Hospital, Toronto, ON

Introduction: Travel-based continuing medical education (CME) has become a popular format for physicians looking to combine education with travel. However these programs do not usually include shared group activities and when they do, they are often social, sedentary events. Emergency Medicine Update (EMU) Europe is a unique