

21 (O-D2) Needs Assessment Tool for Global Emergency Medicine Residency Curriculum Modification

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Objectives: The purpose of this study is to design a curriculum modification needs assessment tool for global emergency medicine (EM) training programs. We sought to quantify program-wide confidence in the residents' ability to manage core clinical scenarios and perform key procedures to identify opportunities for improvement and innovation within the residency curriculum.

Background: In 2010, the Vanderbilt University Department of Emergency Medicine established the first EM residency program at the Georgetown Public Hospital Corporation (GPHC) in the Republic of Guyana. The program has since graduated 18 trainees and transformed emergency care in Guyana. Our goal was to conduct a needs assessment to identify opportunities for improvement and innovation in the GPHC EM residency curriculum. We sought to evaluate perceived instructional needs and quantify program-wide confidence in the residents' ability to manage core clinical scenarios and perform key procedures.

Methods: We developed a curricular needs assessment survey based on the 2019 American Board of Emergency Medicine Model of the Clinical Practice of EM. Participants anonymously rated their confidence in GPHC residents managing 62 clinical scenarios and performing 29 procedures on a 5-point Likert scale. Mean Likert scores were compared between resident and faculty cohorts to identify clinical

scenarios and procedures showing agreement in low confidence or disagreement in the level of confidence in the residents' ability.

Results: A total of 35 participants completed the assessment (9 GPHC residents, 15 GPHC faculty, and 11 Vanderbilt faculty) for a 97% response rate. Clinical scenarios with agreement of low confidence were shoulder dystocia, breech delivery, and adrenal insufficiency. Procedures with agreement of low confidence were cricothyrotomy, lateral canthotomy, and resuscitative hysterotomy. Clinical scenarios with disagreement in confidence were aortic dissection, postpartum hemorrhage, and trauma in pregnancy. Procedures with disagreement in confidence were neonatal resuscitation, pediatric resuscitation, and pediatric endotracheal intubation.

Conclusion: Our needs assessment identified areas of emphasis for curriculum development in the GPHC EM residency. Future directions include determining the optimal educational strategies for addressing the clinical scenarios and procedures identified as deserving particular attention. This needs assessment tool holds promise for curriculum evaluation for other global EM training programs.

References: Beeson MS, Ankel F, Bhat R, et al. The 2019 model of the clinical practice of emergency medicine. *J Emerg Med.* 2020;59(1):96-120. doi: 10.1016/j.jemermed.2020.03.018. Osen H, Osen H, Chang D, et al. Validation of the World Health Organization tool for situational analysis to assess emergency and essential surgical care at district hospitals in Ghana. *World J Surg.* 2011;35(3):500-504. doi: 10.1007/s00268-010-0918-1. Shilkofski N, Crichlow A, Rice J, et al. A standardized needs assessment tool to inform the curriculum development process for pediatric resuscitation simulation-based education in resource-limited settings. *Front Pediatr.* 2018;6:37. doi: 10.3389/fped.2018.00037.