Clinical exposure to principles of transport during residency at a small, tertiary care pediatric hospital with a large geographic catchment area

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Purpose: Over half of Newfoundland and Labrador's ~93,000 children reside in a rural setting. 1 As a result, many children present acutely unwell to community hospitals where they require urgent interventions and stabilization prior to transfer to the Janeway Children's Health and Rehabilitation Centre. The Royal College of Physicians and Surgeons of Canada (RCPSC) requires that competent Pediatricians understand the principles, role and logistics of transport of acutely ill infants and children.2 However, little is known about residents' clinical exposure to critically ill patients requiring transport from referring hospitals. **Methods:** We used administrative data to identify all admissions to the Pediatric Intensive Care Unit between January 1 and December 31, 2014. Data were collected on patient age, diagnosis, geographic origin and outcome of admission. **Results:** A total of 154 patients had 184 admissions to PICU. After excluding post-operative, elective, and out-of-province admissions, 125 admissions of critically ill children remained. Approximately half (54.4%) were from St. John's and surrounding area. The remaining 57 admissions were transfers from the following regional health authorities: Eastern Health (22.4%), Western Health (9.6%), Central Health (8.0%), and Labrador-Grenfell (4.8%). The most common diagnoses of transported children were: respiratory distress/failure (42.1%), diabetic ketoacidosis (10.5%), and trauma (10.5%). There were no significant differences between children who required transport and those who did not with respect to age (5.8 years vs 7.3 years, p=0.08), intubation rates (28.1% vs 20.6%, p=0.16), PICU length of stay (5.7 days vs 6.1 days, p=0.44), and mortality (1.8% vs 0%, p=0.14). On average, transports for critically ill pediatric patients occurred once every 6 days, providing ample opportunity for residents to gain clinical exposure to principles of transport medicine. **Conclusions:** Transport of acutely ill infants and children is required for nearly half of all unplanned admissions to PICU at a small, tertiary care pediatric hospital with a large geographic catchment area. The high rate of clinical exposure provides an excellent opportunity to teach residents the principles, role and logistics of transport medicine. **Disclosure Statement:** Ms. Garland and Mr. Young received Summer Undergraduate Research Awards from Memorial University of Newfoundland, 2015.