

provide consent (language barrier, aphasia); and those with any ambulatory impediments. Consenting participants wear the gait trackers for the duration of their stay or for a minimum of 8 hour, and ambulate as normally as they would in their home. Devices were retrieved when the patient was admitted, discharged or, after 8 hours and the steps count was then recorded from an online interface. Our primary feasibility measure is the proportion of eligible patient for which we are able to recover the tracker and record their steps. The primary validation endpoint will be the concordance between steps recorded by the gait tracking device compared to a gold standard manual step count over a fixed distance. We will report proportions with exact binomial 95% confidence intervals (CI) for feasibility and validity endpoints. **Results:** Preliminary data from an initial pilot phase includes 7 participants who wore a gait tracking device during their ED visit. Mean age was 79.7 years (+/-5.76) and 57% were females. Devices were worn by participants and recovered by research staff in all 7 cases (100%, 95% CI: 59 – 100). Data from online interface has been collected from 6 participants (85%, 95% CI: 42 – 99). Mean step count by observer was 86.17 +/- 4 (95% CI 82.2 – 90.2) and 70.3 +/- 4 (95% CI 66-74.3) by gait tracker. **Conclusion:** Our preliminary data suggests that use of gait-tracking devices in the ED is feasible.

**Keywords:** delirium prevention, gait tracking device, mobility

#### P045

##### **Palliative care nurse specialist in the emergency department: a pilot project**

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**Background:** Patients presenting to the Emergency Department (ED) with unmet palliative care needs are often admitted to hospital and this can be a pivotal point in their subsequent health care journey. Literature from the United States supports the integration of palliative care resources in the ED and to our knowledge, this has yet to be done in a Canadian setting. **Aim Statement:** To develop, implement, and evaluate a model to support patients presenting to the ED with unmet palliative care needs. **Measures & Design:** A pilot project was implemented in one campus of the ED at a tertiary care academic center in Ottawa, Ontario. A palliative care nurse specialist was available for consultation with goals to: a) reduce admission to hospital for patients choosing to have a palliative approach to their care; b) increase coordination between ED and community resources; and c) be a resource for ED staff. Referral criteria were developed after systematic review of the literature and in consultation with palliative and emergency medicine experts. **Evaluation/Results:** Over the course of the study period (9 months), 50 referrals were made. The primary reason for referral was for increased community supports. Patient outcomes: 10 patients were discharged to hospice/palliative care units from the ED, 38 patients were discharged home. Of those discharged home, 66% had no returns to ED within 30 days. Qualitative feedback collected via pre and post survey has been extremely supportive from ED health care practitioners and community palliative care providers. **Discussion/Impact:** This ongoing project has led to positive, patient centered outcomes and decreased admission to acute care hospital. Ongoing evaluation will include consideration of Ontario Palliative Care Network quality indicators and cost-analysis to determine impact on health care system.

**Keywords:** palliative care, patient centered care, quality improvement and patient safety

#### P046

##### **Students as first responders: A survey of Canadian campus emergency medical response teams**

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**Introduction:** Canadian post-secondary campuses are densely-populated communities and the first home-away-from-home to many students participating in various academic programs, new social activities, and on-campus athletic activities. The diversity of on-campus activities combined with the high-stress of academic programs results in illness and injury rates that may increase the strain on emergency medical systems. Existing on some campuses for more than 30 years, campus emergency medical response teams (CEMRTs) address the need for a local emergency medical service that can provide first-aid in low-acuity situations and rapid response to high-acuity emergencies. In Canada, many student-run volunteer-responder CEMRTs exist but the range of their service capabilities, operations, and their call-volumes have not been described previously. This study aims to fill this knowledge gap. **Methods:** We surveyed the 30 known campus emergency medical response teams identified through membership in the Canadian Association of Campus Emergency Response Teams. The 32-question survey asked information on their level of training (standard first aid [SFA], first responder [FR], emergency medical responder [EMR]), service operations including call volume, and funding model. This study was approved by the Western University Institutional Review Board. **Results:** Twenty-four teams completed the survey (80%); the majority of which are located in Ontario (70%, 16 teams). One team reported that they are no longer in operation. Eleven teams (48%) have medical directors. Nine teams (39%) reported responding to  $\leq 100$  calls/year, 11 teams (48%) reported 100-500 calls/year, and 3 teams (13%) reported  $>500$  calls/year. Responders of two teams (9%) maintain training at SFA level; 14 teams (61%) have some or all responders with FR training; and 6 teams (26%) have some or all members certified at EMR level. Twenty-one teams (91%) are equipped with AEDs and 19 teams (83%) are equipped with oxygen. Common medications carried include epinephrine (13 teams, 57%), naloxone (12 teams, 52%), and acetylsalicylic acid (9 teams, 39%). **Conclusion:** Canadian post-secondary campuses have highly-active student-run volunteer CEMRTs. Considerable variability in the services provided may reflect the unique needs of the campuses they serve. CEMRTs may reduce low-acuity case demand on local emergency medical response and emergency department services in some communities; their impact on system demand and costs is the subject of future work.

**Keywords:** first responder, pre-hospital care, volunteer

#### P047

##### **Understanding the expert approach to managing frailty in the emergency department**

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**Introduction:** Frailty is a state of vulnerability affecting older adults, and has been associated with adverse events such as increased risk of institutionalization, falls, functional decline, and mortality. Previous research suggests that emergency department (ED) physicians are much less comfortable managing the complex care needs of frail, older adults. The objective of this study was to identify successful