

Trends and characteristics of older people presenting to four emergency departments: a multicentre exploratory cohort study

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Introduction

The majority of older Australians live independently and are self-managing, despite a growing number living with a chronic illness that requires health intervention. People over 65 years comprise 13% of the population, yet they represent more than 35% of hospital presentations and are disproportionately high users of Emergency Department (ED) services. Clinicians face ongoing challenges to improve the care and outcomes for older people.

Background

Traditional ED service delivery may not be suitable for older people who present with multiple, complex and ongoing illnesses. Similarly, ED clinicians often perceive their role to be focused more on immediate and potential life-threatening illnesses which are episodic in nature. Therefore, the needs of older people and their family/carers may not be adequately addressed in the context of an ED presentation.

Aim

To determine the trends and characteristics of older people presenting to four metropolitan ED's.

Method

The findings being presented are part of a program of research exploring pain management practices for older persons with long bone fractures. The study was conducted across four metropolitan ED's of older patients (65years and over) and involved a 12-month randomised medical record audit (n=255).

Results

ED presentations across four ED sites in 2012 numbered 168021, with 44778 (26.6%) patients aged 65 and over. Of the 44778 patients, the average age was 79.1 years (SD 8.54). There were more females 23932 (53.5%) than males 20846 (46.5%). The majority (n=26925; 60.0%) of older persons self-referred to the ED and lived independently. The majority arrived by ambulance (n=18553; 41.4%) and were allocated triage category 3 (n=19,507; 43.65%) or Triage category 4 (n=15,389; 34.43%).

The top five triage symptom presentations involved pain (n=8088; 18.25%), dyspnoea (n=4735; 10.7%), falls (n=4032; 9.1%), other (n=3984; 9.0%), and cardiac (n=2987; 6.7%). The top five system based classification of diagnostic presentations involved musculoskeletal (n=8902; 20.1%), cardiac (n=6704; 15.0%), respiratory (n=4933; 11.0%), neurological (n=4909; 11.0%), gastroenterology (n=4321; 9.7%).

On review of one tertiary hospital database the average vital signs at triage were: Systolic Blood Pressure 143.6mmHg; Heart Rate 83.4 beats/minute; Respiratory Rate 18.5 breaths/minute; Oxygen saturation 97.0%; Tympanic temperature 36.7; and Blood Glucose Level 7.4mmols/litre. The majority presented with a Glasgow Coma Score of 14 or higher.

On average the older person stayed in the ED for 4 hours and 56 minutes (SD 3:28minutes). The average time to be seen was 39 minutes (SD 48 minutes). The majority of older persons were admitted (n=27562; 61.5%), discharged home (n=16256; 36.0%) and did not wait for treatment (n= 8879; 0.02%).

Conclusion

The vast majority of older persons are living independently, although many require admission on arrival to the ED. Many arrived in pain and with musculoskeletal injuries and or conditions. New models of care need to be considered, which may better support self-management and independent living of the older person and the National Emergency Access Targets.