Mental Health and Addictions Emergency Department Diversion Strategies



City of Greater Sudbury Emergency Services Committee October 23, 2019

Melissa Roney, A/Deputy Chief Dr. Jason Prpic, Medical Director, HSNCPC



Diversion

- Historically Paramedics transport patients to the hospital only
- Diversion is a pilot program where Sudbury Paramedics offer alternate destination(s) that are more appropriate
- Diversion model ensures the Right Patient accesses the Right Care at the Right Time
- Worked with HSN on strategies to mitigate overcrowding in the hospital emergency department





Background

- Many multiple caller patients transported by ambulance to the Emergency Department leave without being seen
- Intoxicated patients are not suitable to place in the waiting room
- 2012 Greater Sudbury Police Services transport program to HSN Cedar Street Crisis



Background

Developed in collaboration with HSN Mental Health and Addiction Services.

Emergency Health Services Branch approval to trial a pilot program for transporting patients to alternate locations.

Support for various aspects of program development

- Medical Director Dr. Jason Prpic
- HSN
- Behavioural Supports Ontario
- CMHA
- NE-LHIN



Off-Site Hospital Resources

HSN Crisis Intervention Services are available - Monday to Sunday 08:30-22:00

HSN Mobile Crisis Intervention Services are available - Monday to Sunday 10:00-20:30

Withdrawal Management Services available - always available



Goal

To implement a safe diversion protocol to allow patients to access alternative care models without transportation to the Emergency Department.





The reDirect Study – Criteria

Mental Health and Addictions Transport and Triage Protocol

*PHEW score : Prehospital Early Warning Score

- Non urgent
- No ALS clinical interventions
- Adults who consent





The reDirect Study – Method

- Analysis of patients presenting to Paramedic Services with intoxication or psychiatric issues.
- Study outcomes include protocol compliance and protocol safety.
- Data was taken from ambulance call reports, hospital records and discharge forms from alternative facilities.



The reDirect Study





The reDirect Study – Outcomes

Study Outcomes	Diverted (N=158)
Protocol Non-Compliance	49% (77/158)
Diversion Failure	25% (40/158)
Patient Morbidity	6% (9/158)



The reDirect Study – Conclusions

- Non-compliance rate due to lack of documented temperature and blood glucose.
- No negative outcomes in the diverted patients.
- Only 9 hospital admissions for related issues.
- Broader implementation could reduce ED volumes and improve quality of care while reducing ambulance offload delays.



Next Steps – Ministry of Health Approval

"As part of our government's plan to modernize emergency health services in Ontario, we will empower paramedics to improve the already great care they provide in communities across the province."

"This includes the ability to safely and responsibly determine if there is a more appropriate care setting for patients to receive treatment other than an emergency department, such as a mental health crisis center."



Next Steps – Broaden Uptake

- Amended electronic ambulance call report diversion form to better capture data to drive system improvements.
- Previously no method to track patient refusals, facility refusals and why.
- Diversion medical directive updates are currently under review.



Next Steps – Proposed changes to legislation

A proposal to amend regulations under the Ambulance Act and Health Insurance Act will provide select 911 patients with alternative care options for prehospital care other than transport to the emergency department.



Next Steps – Proposed changes to legislation

New models of care to include:

- ED Diversion
- Treat and refer to other health care providers
- Treating and releasing patients on-scene
- Referral low acuity 911 patients to appropriate care in the community





Next Steps – Alternate Destinations

- Targeting collaborations with non-urgent health care providers.
- Diversion of medically stable and appropriate patients to these out of hospital health care providers.
- Avoiding transport of patients unnecessarily to the Emergency Department.









INTRODUCTION

Patients with mental health or addiction issues are not always best served in the emergency department. Health Sciences North Centre for Prehospital Care (HSN CPC) and Greater Sudbury Paramedic Services (GSPS) evaluated the pilot implementation of the "Mental Health and Addiction Triage and Transport Protocol". This is the first Ontario diversion protocol that allows paramedics to transport intoxicated or mental health patients to an alternative facility, bypassing the emergency department. Our aim was to implement a safe diversion protocol to allow patients to access more appropriate service without transportation to the emergency department.

METHOD

A retrospective analysis was conducted on patients presenting to EMS with intoxication or psychiatric issues. Study outcomes were protocol compliance, determined through missed protocol opportunities, noncompliance, and diversion failure (presentation to ED within 48 hours of appropriate diversion); and protocol safety, determined through patient morbidity (hospital admission within 48 hours of diversion) and mortality. Data was abstracted from EMS reports, hospital records, and discharge forms from alternative facilities. Data was analyzed qualitatively and quantitatively.



From June 1st, 2015 to May 31st, 2016 GSPS responded to 1376 calls for mental health or intoxicated patients. 241 (17.5%) met diversion criteria, 158(12.9%) patients were diverted and 83(4.6%) met diversion criteria but were transported to the ED. Of the diverted patients 9(5.6%) presented to the ED <48 hours later and were admitted. Of the 158 diversions, 113 (72%) were transported to Withdrawal Management Services (WMS) and 45 (28%) were taken to Crisis Intervention (CI). There was protocol noncompliance in 77 cases, 69(89.6%) were due to incomplete recording of vital signs; 8 (10.3%) were direct protocol violations of being transferred with vital signs outside the acceptable range.

STUDY OUTCOMES

Study Outcomes	Diverted (N=158)
Protocol Non-Compliance	49% (77/158)
Diversion Failure	25% (40/158)
Patient Morbidity	6% (9/158)

CONCLUSION

High non-compliance rate is attributed mostly to the absence of documented temperature and blood glucose. There were no deaths in the diverted patients. There were 9 hospital admissions for related issues. (1 WMS, 8 CI) Broader implementation of this protocol could further reduce ED volumes of patients and improve quality of care.

CRITERIA



* PHEW: Prehospital Early Warning Score

Mental Health and Addiction Triage and Transport Protocol has the potential to safely divert **1** in **6** patients to alternate destinations.

Thank you

