

2016

Increasing Naloxone Distribution in VT Emergency Departments

Olivia M. Harris
UVM College of Medicine

Follow this and additional works at: <http://scholarworks.uvm.edu/fmclerk>



Part of the [Medical Education Commons](#), and the [Primary Care Commons](#)

Recommended Citation

Harris, Olivia M., "Increasing Naloxone Distribution in VT Emergency Departments" (2016). *Family Medicine Clerkship Student Projects*. Book 123.
<http://scholarworks.uvm.edu/fmclerk/123>

This Book is brought to you for free and open access by the College of Medicine at ScholarWorks @ UVM. It has been accepted for inclusion in Family Medicine Clerkship Student Projects by an authorized administrator of ScholarWorks @ UVM. For more information, please contact donna.omalley@uvm.edu.

Increasing Naloxone Distribution in VT Emergency Departments

Stowe Family Practice

Olivia Harris

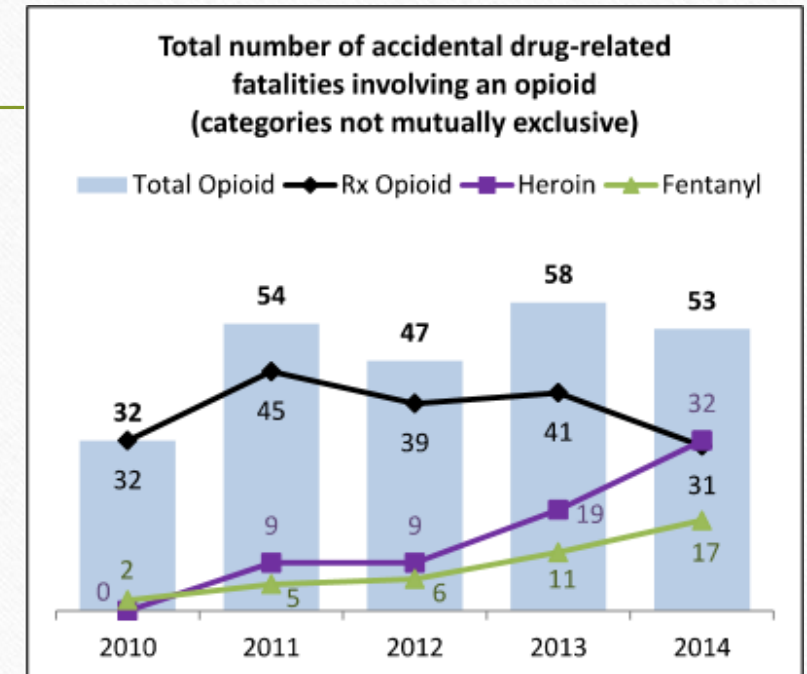
Family Medicine (12.14.2014 – 1.22.2015)

Mentor: Dr. Katherine Marvin MD

The Problem:

- Drug overdose was the leading cause of injury death in 2013 (CDC)

- Deaths involving opioids have risen dramatically over the last 5 years in Vermont
 - Deaths from heroin doubled from 2012 to 2013 ¹
 - 50+ Vermonters die from opioid overdose each year ¹
- Preliminary data shows that between January-September of 2015, there were already 55 deaths involving an opioid in VT ¹



The Problem:

- It is critical that physicians be aware of, and address this problem:
 - “Approximately two-thirds of individuals with addiction will see a primary care or urgent care physician every six months, and many others are regularly examined by other medical specialists.”²

- Despite the availability of Naloxone (Narcan), an opioid receptor antagonist which effectively and safely reverses the detrimental effects of opioids, Emergency Department physicians in Vermont are not distributing Naloxone kits to all overdose patients
- Physician apprehension to prescribing Naloxone involves:
 - lack of awareness³,
 - negative attitudes towards drug users³,
 - belief that distributing Naloxone will increase drug use³, and
 - fear of liability

A price to pay

- “Drug misuse and abuse caused about 2.5 million emergency department (ED) visits in 2011.”⁴
-
- “Among those ED visits, 420,040 visits were related to opioid analgesics.”⁴
 - “In the United States, prescription opioid abuse costs were about \$55.7 billion in 2007. Of this amount, 46% was attributable to workplace costs (e.g., lost productivity), 45% to healthcare costs (e.g., abuse treatment), and 9% to criminal justice costs.”⁴

Community Perspective

Brief interviews were conducted with two ED physicians, and with participants at a VT Medically Assisted Treatment (MAT) learning collaborative:

- An ED physician from Copley Hospital in Stowe, VT endorses a commonly held belief that prescribing Naloxone to patients with overdose in the ED enables them to continue using, and to use more opioids
- Conversely, a physician from Treatment Associates states that,
 - **“Anyone who is not participating in the Narcan movement is a victim of bias against those with the disease of addiction. Addiction should be treated the same as any other disease, like hypertension or diabetes.”**

Community Perspective

- A physician working in UVMHC Emergency Department agrees that Naloxone kits need to be distributed to any patient who comes to the ED with an overdose. When asked about why this is not occurring, Dr. Clauss responded that some physicians may not be aware of this option, some of these patients leave prematurely before the kit can be provided, and that many patients are given information about where they can get free Naloxone kits in the community
- However, an RN involved in the MAT at Stowe Family Practice, feels that Naloxone kits need to be provided at the time of the ED visit rather than redirecting patients to community resources due to the unreliability of this patient population, lack of transportation, and lack of accessible community resources in many areas of Vermont



Methodology & Intervention

- **Methodology:**

- A literature review was performed to explore:
 - attitudes of physicians regarding Naloxone prescription, and to assess the validity of commonly held beliefs among this population
 - The effectiveness of distributing Naloxone kits to patients with opioid overdose in regard to prevention of future overdose, safety, and cost-effectiveness
- Investigation of whether physicians at the UVMHC Emergency Department are prescribing Naloxone kits
 - Sought help in performing a PRISM search to assess how many patients were treated for an overdose in the last 6 months
 - Contacted a pharmacist at UVMHC to collect data on the number of kits prescribed

- **Intervention:**

- After compiling the data found in the literature review, an informational pamphlet was developed to be distributed among emergency department physicians with the hope of increasing awareness and ultimately increasing the distribution of Naloxone kits in this setting

Results & Response Data

- Evidence in the literature shows that:
 - Overdose deaths are significantly reduced in areas where Naloxone distribution programs have been implemented ⁵

 - Providing Naloxone “does not encourage opiate users to increase their drug consumption, nor does it increase the likelihood that they will harm themselves or those around them.” ³
 - Participation in Naloxone distribution programs reduces the use of opioids and increases users' desire to seek addiction treatment. ⁶
 - Naloxone has no psychoactive effects or potential for abuse, and studies have indicated “extremely low rates of adverse events in numerous pilot studies of distribution” ⁶
- In addition, legal changes have been made to protect physicians who prescribe Naloxone, described in Act 75 in Vermont (<http://www.vtmd.org/act-75-prescription-drug-abuse-prevention-and-monitoring-implementation-timeline>)

Results and Response Data

- A basic PRISM search using “heroin overdose” and “opiate overdose” as discharge diagnoses showed 43 patients between 6/1/2015 – 11/30/2015
- UVMMC Pharmacy distributed 17 Naloxone kits during this same time period

Evaluation of Effectiveness & Limitations

- Evaluating effectiveness:
 - Another PRISM search with an accompanying evaluation of the number of Naloxone kits distributed at UVMMC should be performed 6 months following the distribution of the information packets to determine whether the number of kits more closely matches the number of patients treated for an opioid overdose
- Limitations of this project include:
 - Short period of time within which to complete the project
 - Difficulty capturing the real number of patients treated for overdose at UVMMC due to variation in discharge diagnoses used

Future Projects

- Future projects may aim to:
-

- Gain a better understanding of physicians' attitudes in Vermont Emergency Departments regarding the prescription of Naloxone kits through personal interviews, survey's/questionnaires, etc.
- Develop a separate information pamphlet for patients regarding the safety and efficacy of Naloxone kits in preventing overdose fatalities from opiates
- Broaden the distribution of information packets to include primary care physicians as well as other emergency departments in Vermont

References:

- 1) Data Brief: Vermont Drug-Related Fatalities 2010-2014. Vermont Department of Health. http://healthvermont.gov/research/documents/databrief_drug_related_fatalities.pdf
- 2) Beletsky, L., Ruthazer, R, Macalino, G, Rich, J, Tan, L, Burris, S. Physicians' Knowledge of and Willingness to Prescribe Naloxone to Reverse Accidental Opiate Overdose: Challenges and Opportunities. J Urban Health. Jan. 2007. 84(1): 126-136.
- 3) Bazazi, A, Zaller, N, Fu, J, Rich, J. Preventing Opiate Overdose Deaths: Examining Objections to Take-Home Naloxone. J Health Care Poor Underserved. Nov 2010; 21 (4): 1109-1113.
- 4) Injury Prevention & Control: Prescription Drug Overdose. Centers for Disease Control and Prevention. <http://www.cdc.gov/drugoverdose/data/overdose.html>
- 5) Walley, A, Xuan, Z, Hackman, H, Simkin, M, Sorensen-Alawad, A. Opioid Overdose Rates and Implementation of Overdose Education and Nasal Naloxone Distribution in Massachusetts: Interrupted Time Series Analysis. BMJ Jan 2013. 346:f174.
- 6) Kim, D, Irwin, K, Khoshnood, K. Expanded Access to Naloxone: Options for Critical Response to the Epidemic of Opioid Overdose Mortality. Am J Public Health. March 2009; 99(3): 402-407