



Outpatient Opioid Use in Burn Injuries Following Hospital Discharge: A Single Institution Evaluation



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Introduction

There is a growing concern regarding the unprecedented increase in morbidity and mortality related to the use of opioids. Prescription opioid abuse has been increasing dramatically in recent years. Prescription opioids have been shown to be favorable in perioperative management, however, their impact on chronic usage remains unclear. As an effort to help reduce opioid consumption following hospitalization for burn injuries, we look to evaluate the outpatient opioid consumption following hospital discharge at our institution.



Methods

After IRB approval, we obtained demographics, medical history, inpatient and outpatient opioid usage, treatment, and length of hospital stay of patients admitted with burn injuries who met study inclusion criteria (age ≥ 12 years and no history of opioid abuse prior to hospitalization) from January 1, 2011 to January 1, 2018. Data was analyzed using SAS v9.4.

Results

Our preliminary data included 210 patients with average age of 58 years, 75% non-Hispanic Caucasians and average total burn surface area of 18%. Medical histories observed included: hypertension (40%), diabetes (15%), hyperlipidemia (11%), depression (7%), and bipolar disorder (3%) among many others. 79% of patients had surgical intervention including excision and grafting, of which 32% had autografting procedures. All patients were treated with opioids during hospitalization, which included: fentanyl, hydromorphone, oxycodone-acetaminophen, morphine and oxycodone. 6% of patients had pain management consultation during hospitalization. 79% of patients were discharged with an opioid prescription, of which 21% had their opioid refilled during follow-up. There was no statistically significant difference in discharge opioid prescriptions (79% had surgical intervention versus 76% had no surgical intervention, $p=0.69$) and outpatient opioid prescription refills (17% had surgical intervention versus 17% had no surgical intervention, $p=0.99$) between patients who had surgical intervention for burn injuries versus those who did not.

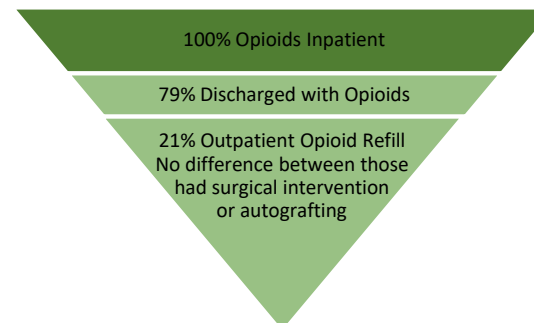


Figure 2. Outpatient Burn Management

Above: 56yoF status post sheet grafting to right upper extremity grease burn .Below: 42yoM s/p wound care to right lower extremity scald burn

Conclusions

This evaluation shows that there is no statistical difference in opioid usage between patients who had surgical intervention and those who did not for their burn injury treatments. Therefore, prescription opioids may not be necessary in postoperative care following hospital discharge.