End of Life Care Order Set Development in an Integrated Health Care System

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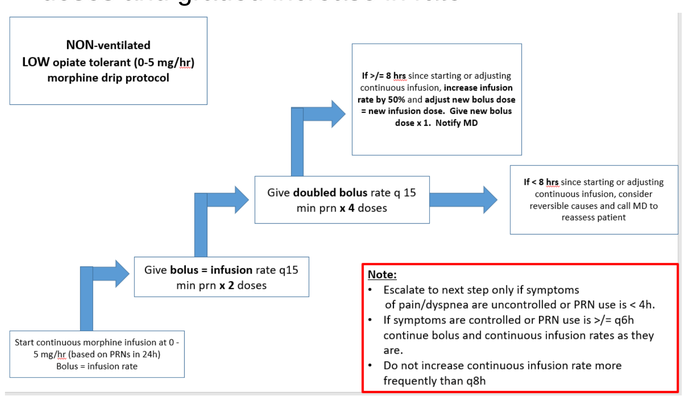
INTRODUCTION

Optimizing inpatient end-of-life (EOL) care is best practice, though variability in how clinicians provide care can detract from quality. Prior to the development of the comfort care/EOL order set, the Kaiser Permanente Southern California region only had an ICU order set which was suboptimal for non-intubated patients. This provided an opportunity for quality improvement and standardization of end-of-life care in these patients.

BACKGROUND

2016: Hospitalists and palliative care teams inquired about improving the existing ICU EOL order set – which was mainly meant for *palliative extubations*, and not comfort care orders. Examples of optimization include:

- "**Narcotics**" → **Opioids** (due to studies indicating higher negative connotation in patient groups)
- Opioid drip rate doubling if pain not relieved → focus on increasing bolus doses and graded increase in rate



DESIGN

An interdisciplinary group of hospitalists, bioethics consultants, palliative medicine specialists, pharmacists and an electronic medical record (EMR) expert reviewed evidence, expert reviews, and feedback from multiple stakeholders (such as nursing peer groups). Goals included:

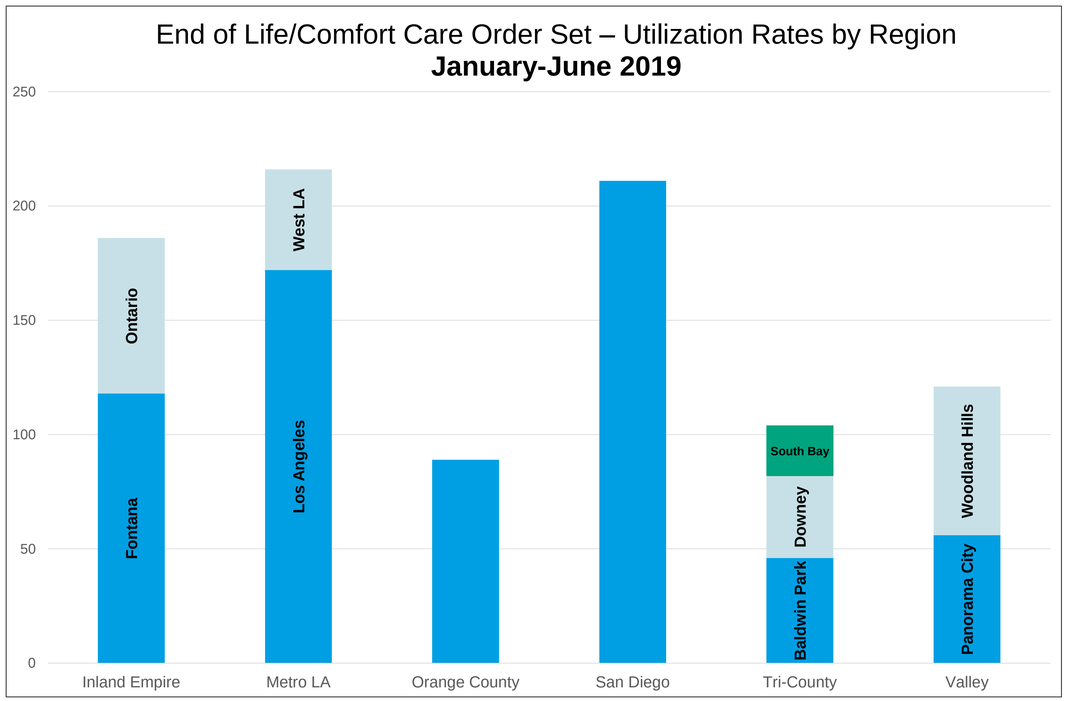
- Forming reasonable opioid titration protocols which are pharmacokinetically based
- Order protocols which aligned nursing and inpatient pharmacist capabilities
- Systematically categorizing medications and non-pharmacologic methods to treat EOL symptoms such as dyspnea, respiratory secretions, delirium, nausea, constipation, and fever.

RESULTS

Feedback from key committees and the interdisciplinary group was continually utilized in iterative revisions.

August 2018: Our comfort care order set was introduced throughout KP Southern California. Front line clinicians were introduced via e-mail/meetings; usage results for the region are detailed below.

The order set shifted away from rapid opioid increases and rather on titrating infusion **every 8 hours** as needed to avoid excessive dosing and adverse effects such as hyperalgesia. Our order set has integrated education rational opioid use, nursing orders for comfort measures, and collaboration with other services like Social Work and Chaplain Services.



CONCLUSION

Development of a new order set based on addressing gaps in clinical knowledge, application of opioid pharmacology, and input from multiple stakeholders has proven effective within an integrated health care system. We hope to contribute more evidence to this much needed question on standardizing end-of-life pathways, as a validated order set can be replicated across other similar health care systems. While standardized order sets will likely decrease clinical variability, skilled clinical judgement is still necessary to develop the most appropriate, individualized treatment plan for each patient. Thus, continuous opioid infusions and best practices for comfort care measures can continue to be utilized in the best manner possible.

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