

## 2015 CDC HA-VTE PREVENTION CHALLENGE CHAMPION



### ORGANIZATION:

Hutchinson Regional Medical Center | Hutchinson, Kansas

### PATIENT POPULATION:

- 6,800 inpatient admissions in 2014; 130 beds
- 3% belong to a racial or ethnic minority
- 17% are enrolled in Medicaid

### BACKGROUND

Hutchinson Regional Medical Center (HRMC) is a non-profit community hospital located in Hutchinson, Kansas. Prior to 2013, HRMC did not routinely assess patients for the risk of developing VTE, and no specific data were collected on in-patients to determine the effectiveness of any VTE prophylaxis efforts. The implementation of the CMS Venous Thromboembolism (VTE) Quality Measures caused HRMC to evaluate the VTE prophylaxis procedures as data revealed that HRMC did not adequately address the VTE prophylaxis needs of every patient and that, of the patients who did develop a VTE while in the hospital, few received VTE prophylaxis prior to developing the VTE.

### OBJECTIVES

- To engage physicians from all disciplines in the development of strategies to ensure that every patient admitted to the hospital had their VTE risk addressed.
- To select a validated risk tool to support clinical VTE prophylaxis decisions.
- To provide the appropriate prophylaxis to every patient.

### METHODS

A VTE taskforce was formed in 2013. This interdisciplinary team included representatives from nursing leadership, staff nurses, education, pharmacy, informatics, and quality management. The subject of VTE risk and prophylaxis was presented to each physician practice committee, and meetings were structured to meet knowledge needs and determine barriers to VTE prophylaxis. There were recurring requests for a nursing-driven risk assessment tool to calculate a VTE risk score for each patient on admission, standardized prophylaxis guidance

for medical patients, and non-pharmacologic prevention strategies.

### **Risk Assessment and Order Sets**

A section on VTE prophylaxis was added to every admission order set in the electronic health record (EHR), thus requiring the provider to assess for risk. This section allowed the admitting provider either to order interventions or select options indicating that prophylaxis wasn't needed.

The taskforce decided that surgical patients and critical care patients would automatically be considered high risk for VTE. After a literature review and evaluation of the evidence, the Padua Risk Assessment Model was selected as the risk assessment tool for medical patients (after adjustment to ensure that patients with active cancer were scored as high risk). The tool was built into the EHR to ensure that each patient's risk score would transmit to the main vital signs screen. Physicians could easily see this score to determine if pharmacological VTE prophylaxis was indicated.

### **Ensuring Use and Availability of Mechanical Prophylaxis**

HRMC also addressed mechanical prophylaxis equipment needs by tracking usage of sequential compression devices (SCDs) for 60 days. It was determined that in order to provide SCDs for every patient in the ICU, in addition to all surgical patients and other high-risk patients, the number of pumps and disposables in stock would need to be increased. Purchasing worked with vendors to ensure a steady supply of pumps and disposables.

### **Education and Awareness to Improve VTE Prevention**

All medical providers and nursing staff were educated on the new risk assessment tool and the interventions. Nurses and CNAs were educated via posters and discussions at staff meetings. The education was also reinforced at the annual skills fairs. The educator and quality management representative attended all physician committee meetings, providing updates on the processes and outcomes, wrote articles for the physician newsletter, and sent physician-specific data to increase awareness of VTE prophylaxis.

## **RESULTS**

The CMS VTE Quality Measures VTE-1, VTE-2 and VTE-6 were used to determine the success of this process improvement.

- Implementation of the Padua Risk Assessment tool to the nursing admission documentation resulted in great improvement of the CMS quality measure scores. The most current data from 3Q 2015 shows a VTE-1 score of 94.2% and a VTE-2 (ICU) score of 100%.
- HRMC has also achieved perfect scores for VTE-6—potentially preventable VTE—for three quarters in 2015. The final Kansas Health Engagement Network 1.0 report from December 9, 2015, noted that HRMC “has a streak of 11 monitoring months with no patient harm events for this measure.”

## **CONCLUSION**

HRMC demonstrated that great process improvements are attainable with creative collaboration. HRMC did not employ hospitalists during this change, so collaboration occurred across many disciplines with many providers. HRMC is proud to state that patient safety remains the focus and the driver of process improvements in the HRMC organization.