

Reported to the Board of Trustees  
March 11, 2009

Report on the Quality of Healthcare Provided at the  
University of Illinois Medical Center at Chicago  
to  
University of Illinois Board of Trustees  
March 2009

The Medical Center engages in numerous dynamic programs to improve quality and safety of care across the organization. This report briefly describes the overall framework to continuously evaluate and improve patient care outcomes across the entire Medical Center, and highlights in more detail the success of interdisciplinary medical center teams involved with national “pay for performance” measures targeted and published by the Joint Commission, CMS (Center for Medicare and Medicaid Services), and other health care payers.

The key quality initiatives which more broadly engage physicians, nurses, administrators, other clinicians, plus safety, quality, and computer information experts, include-

- Departmental quality improvement programs with defined QI plans, indicators, and reporting (21 Clinical Services plus 22 Hospital and Ambulatory Operational areas)
- Medical Staff & Hospital Committees with quality and safety charges that report to Medical Staff Executive Committee and Executive Staff Leadership
- ICU Intensive Care Unit Quality Improvement Teams
- Managed Care quality/incentive program
- Core Measure Quality Improvement Teams (National quality alliance with financial incentives for participation)
- National Patient Safety Goal Teams
- Tracer Teams and Safety Walk-Arounds to identify current practice and policy issues with front line care providers

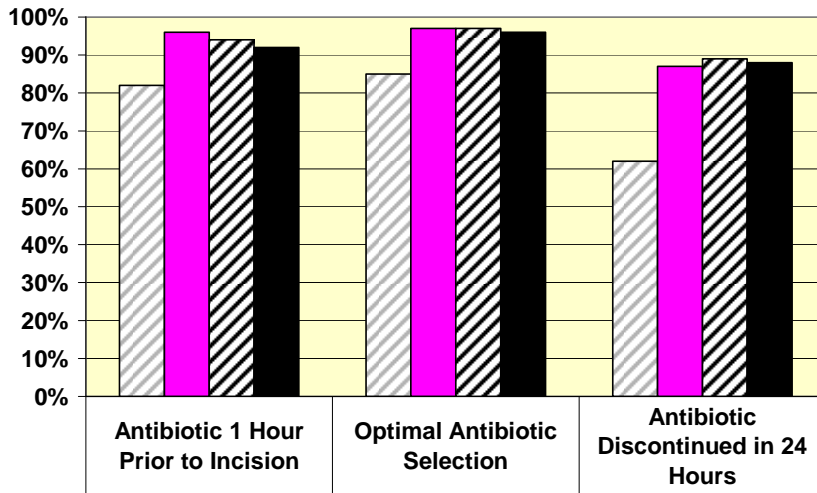
The remainder of this report will highlight the work of the Core Measure Teams, who have implemented significant redesign of patient care delivery to meet and exceed national benchmarks:

**Stroke QI Team:**

This team has achieved certification from the Joint Commission as a center of excellence in primary stroke care. All quality measures are at a sustained level of 90-100% compliance except for dysphagia screening, and to address this a standardized bedside protocol has been established which is improving results. A phone survey of stroke patients and caregivers identified some additional areas to focus on regarding patient education at discharge, and these enhancements have been successfully put into place. In addition the team implemented a Stroke Code Pager system of “C-V-A” to assemble the response team as soon as a stroke patient arrives in the emergency room.

**Surgical Care Improvement (SCIP) Team:**

**Surgical Care Improvement Project**



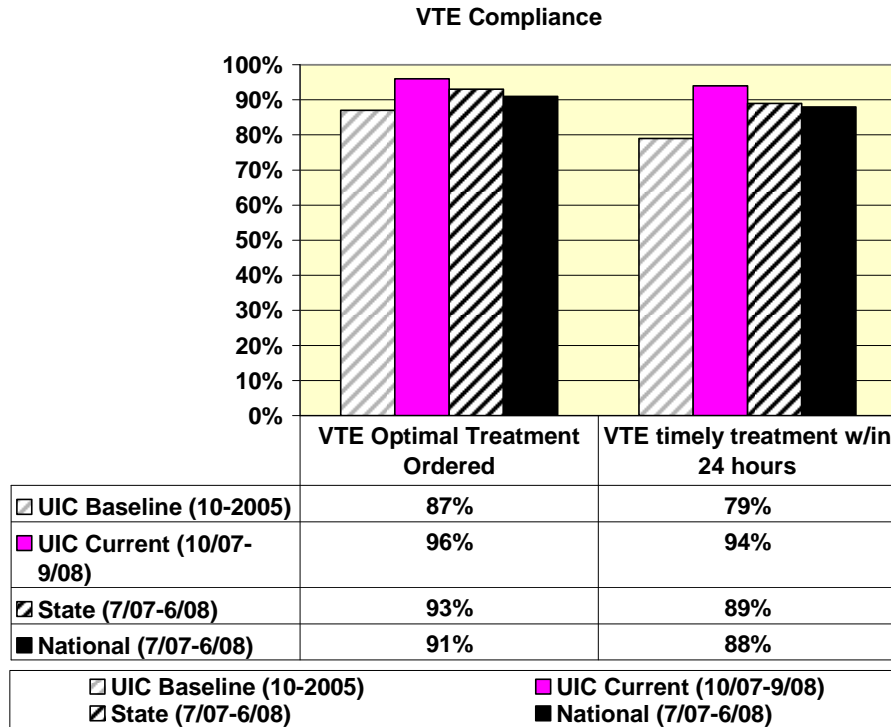
UIC Baseline (10-2005)	82%	85%	62%
UIC Current (10/07-9/08)	96%	97%	87%
State (7/07-6/08)	94%	97%	89%
National (7/07-6/08)	92%	96%	88%

UIC Baseline (10-2005)
  UIC Current (10/07-9/08)
  State (7/07-6/08)
  National (7/07-6/08)

This team has done extremely well with multiple initiatives that are proven to prevent infections with surgical procedures. Timely antibiotics improved from 82% to 96%; best choice of effective antibiotics improved from 85% to 97%, and discontinuance of antibiotics when no longer necessary improved from 62% to 87% over the past year, and for the most recent quarter to 92%. These rates meet or exceed state and national benchmark comparisons. Strategies the team initiated include:

- Strong leadership communication from Anesthesia, Infection Control, & Chief of Safety to all Surgical Services and the Operating Room Committee
- Integration of best practice into guidelines, operating room documentation forms, and daily clinical operations
- Feedback to individual surgeons on outliers
- Team education initiatives continuous and targeted
- Use of special gowns that increase patient temperature for colon surgery patients, which is proven to reduce infections
- Replacement of razors with clippers to prep patients prior to surgery

**Anticoagulation/Venous Thrombosis Embolism (VTE/DVT)Team:**



This team has not only improved our care delivery, but also reduced our malpractice risk by designing a proactive electronic medical record tool that requires the admitting physician to perform a screening as any patient is admitted to the hospital. The tool prompts the physician on the risk criteria which might cause a patient to develop a clot in the lungs or veins that can lead to death if unrecognized and treated. The tool also advises the doctor on the best available medication or other treatment. This improved process resulted in a 32% increase in patients receiving medications to prevent an embolism, and a subsequent 16.6% reduction in patients acquiring a VTE embolism. Ongoing audits of timely and optimal prophylactic treatment demonstrate UIC higher than state and national benchmarks (table above).

Following the success of those efforts, the team has expanded and is implementing additional improvements:

- Outpatient guidelines on dosing and monitoring of high risk drugs that patients take at home to prevent VTE, such as warfarin
- Nurse managed protocols to assure continuity of anticoagulation treatment of patients treated in the hospital
- Computer alerts implemented to assure patients on warfarin received an appropriate diet food tray in the hospital

### **Pneumonia QI Team:**

Pneumonia represents the 5<sup>th</sup> leading cause of death in the United States in patients 65 years and older. Rapid diagnosis and antibiotic treatment within six hours of patient arrival in the Emergency Department is the goal. Nationally and at UIC this has been a challenge due to emergency room crowding and the complexity of making this diagnosis. For these reasons, we are pleased to announce that UIC was able to achieve 97% timely antibiotics in the last review, and this exceeded the Illinois hospital comparisons of 75%.

Overall strategies implemented included-

- Redesign of the ED triage protocol and Physician/Nurse triage partnership on high volume days
- Concurrent review of data by emergency room clinicians and managers via computer reports generated from the electronic medical record
- Standing orders per protocol
- Vaccine process triggered by medical record alert to pharmacy

### **Acute Myocardial Infarction and Heart Failure QI Team:**

Due to the improvements implemented by this team, all measures for these two conditions have achieved 90-100% compliance with the exception of documented patient discharge instructions for heart failure. Although close to 100% of patients are receiving written instructions when they leave the hospital, we have found that incomplete coordination between all disciplines results in some inconsistencies of information. A special taskforce on Discharge Coordination was assigned by senior leadership to perform a gap analysis and make recommendations so that this remaining area can be corrected. 100% compliance with advising patients to quit smoking or remain smoke-free, has been an accomplishment the team and medical center is proud of. Although the volume of Acute Myocardial Infarctions (AMI) is low, we are hoping to coordinate with the Chicago Fire Department to support ambulance capability of 12-lead EKG's so that treatment can begin in the ambulance. This is important to reduce heart attack mortality, since the window for treatment is 90 minutes.