

Allscripts Elective Smoothing

Predictive Analytics for Operational Efficiency

Inpatient elective procedures are a major driver of revenue and consume critical resources. The majority of surgical volume is typically elective, meaning perioperative leaders exercise significant control over patient demand for beds. Unfortunately, shaping the elective schedule to balance the needs and preferences of surgeons, staff and patients is a daunting task.

The Allscripts Elective Smoothing module baselines the impact of the surgical schedule on operations and provides a platform for testing realistic demand-shaping scenarios to improve patient care, increase surgical throughput and optimize bed resources.

Allscripts Elective Smoothing is part of the Allscripts Predictive Analytics suite, powered by Hospital IQ's cloud-based predictive analytics platform. Hospital IQ's data-driven solutions empower hospital leaders to optimize efficiency by systematically aligning resources – such as staff, operating rooms and inpatient beds – with actual and predicted patient flow. Other modules include Staff Planning, Capacity Planning, Census Forecasting and Surgical Planning.

SEE OPPORTUNITIES BASED ON EXISTING DATA

Allscripts Elective Smoothing quickly consumes data from Sunrise Surgical Care and other systems to bring data to life in heat maps, run charts and other compelling visualizations. These charts shine a light on key areas of opportunity, such as rejections due to variability in surgical scheduling. No manual data entry is required.

MONITOR AND IMPROVE QUALITY OF CARE

Allscripts Elective Smoothing continuously monitors how operational efficiencies affect patient quality indicators—including length of stay and readmissions within 30 days—using statistical methods such as the t-test and Fisher's exact test. The results are presented by level of care in an easy-to-read table with drilldowns into patient details for context.

DESIGN "WHAT IF" SCENARIOS

Harnessing the power of the Allscripts Elective Smoothing simulation engine is as simple as dragging and dropping surgical demand. Allscripts Elective Smoothing takes care of the rest—ensuring accurate predictions by accounting for existing surgical demand, length of stay variability and many other factors. For more robust scenarios, it also can predict the impact of changes to a block schedule, including everything from tweaks to a complete overhaul.

SEE THE CLINICAL AND FINANCIAL IMPACTS OF POTENTIAL CHANGES

Allscripts Elective Smoothing provides unparalleled insight into the effects of changes—before they are made. Surgeons and staff can, within seconds, visualize changes to arrivals, patient census, reject rate and other key metrics. To ensure accurate predictions, the cloud-based "what if" engine accounts for existing patient demands, block scheduling patterns, capacity constraints, length of stay variability and other factors.

Predictive Analytics Modules

- Surgical Planning
- Staff Planning
- Capacity Planning
- Census Forecasting
- **Elective Smoothing**

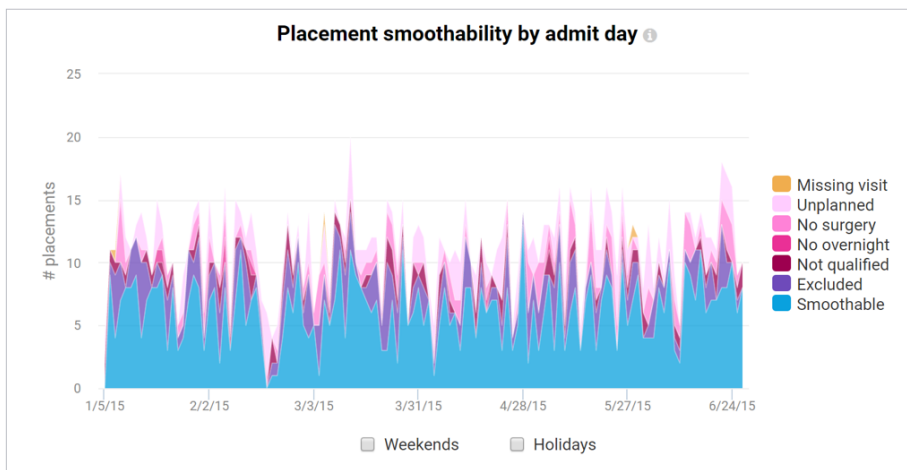
Overview

- Isolates and analyzes elective inpatient volume and its impact on nursing units
- Formulates operational improvements by simulating the impact of block and volume changes on inpatient census
- Operationalizes patient flow improvement strategies and monitors performance through expected versus actual patient census reports
- Calculates the ROI of potential changes in advance of implementation Improves patient satisfaction and outcomes
- Yields more predictable patient-to-nurse ratios

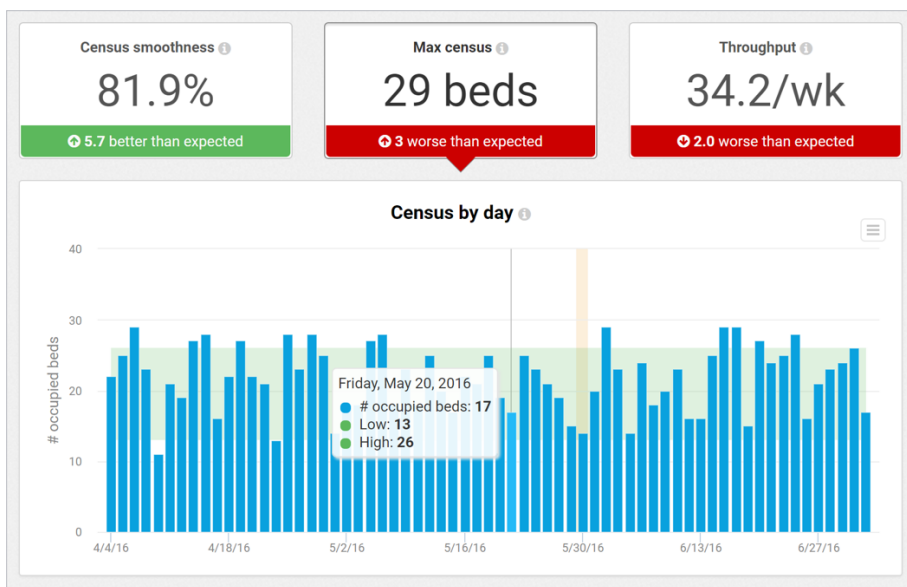
Allscripts Elective Smoothing

TRACK PERFORMANCE TO PLAN

Allscripts Elective Smoothing provides a full closed-loop system to facilitate continuous improvement. Upon implementation, changes are tracked and visualized in weekly progress reports. For full context, historical, actual and expected performance data appear on the same charts. Staff can easily monitor key metrics against targets and quickly understand causes associated with any deviations from expected performance, while reaping the benefits of reduced variability at their own pace.



Elective Smoothing – Smoothability Chart
Describes the arrival pattern of volume into inpatient units



Elective Smoothing Reports
Actual vs. expected reports track progress towards operationalized elective smoothing plans