

Roper Saint Francis Prevents Medication Errors and Saves Thousands of Staff Hours with iatricSystems™ Integration Services



OBJECTIVE: Roper Saint Francis Healthcare needed to integrate its new MEDHOST Emergency Department Information System (EDIS) with inpatient systems from Allscripts. Key goals were to provide ED and inpatient staff with all relevant information needed to deliver care while keeping records synchronized and up to date regardless of where services were delivered. This would require sharing information between systems that don't normally interact with each other.

SITUATION: Roper St. Francis Healthcare is a private, non-profit health system serving the Charleston, South Carolina region and anchored by three full-service hospitals: Roper Hospital, Bon Secours St. Francis Hospital, and the new Roper St. Francis Mount Pleasant Hospital. When Roper Saint Francis replaced its outdated ED system with a MEDHOST EDIS in its three hospitals, the new system needed to share data with multiple inpatient systems from Allscripts including the Horizon Clinicals® inpatient charting system, the STAR inpatient registration system, and Horizon Meds Manager™.

SOLUTION: iatricSystems™ Integration Services created a number of interfaces that allow information to flow seamlessly between the MEDHOST EDIS and Allscripts inpatient systems. Required data from inpatient systems is now instantly available within the EDIS when treating patients in the ED, and information captured when registering, treating, and discharging patients using the EDIS is reflected back to the inpatient systems in real time.

RESULTS: The integrated solution saves Roper Saint Francis an estimated 5,000 hours of staff time annually, which was previously spent searching for information required for patient care. Electronic information sharing between the EDIS and inpatient systems also eliminates the risk of medication errors when patients are admitted from the ED. Other benefits include automatic updating of patient records across multiple systems, improved data collection for Meaningful Use compliance, and happier physicians and nurses because the information they need is now at their fingertips.

"We couldn't have achieved this degree of integration between MEDHOST and Allscripts without the expertise of iatricSystems™."

– Joy Huntington
Clinical Nurse Specialist
Roper Saint Francis Healthcare



When Roper Saint Francis Healthcare replaced their outdated ED system with a new Emergency Department Information System (EDIS) from MEDHOST, they knew it was an opportunity to automate key processes that previously had to be handled manually. They relied on iatricSystems to create interfaces that allow critical information to flow between their new EDIS and inpatient systems from Allscripts, saving time and making life easier for hospital staff while providing a safer environment for patients. “We were moving to a system that made our ED users happy on the front end, but we needed some unique back end interfaces to make it work,” says Joy Huntington, Clinical Nurse Specialist at Roper Saint Francis Healthcare.

When registering patients in the ED: iatricSystems created an Enhanced ADT interface that extracts patient allergy and home medication information from Horizon Clinicals (Roper Saint Francis’ inpatient charting system), attaches it to an ADT message from Allscripts STAR (their inpatient registration system) and delivers the enhanced message to the MEDHOST EDIS in real time. “Doctors and nurses on the front lines caring for patients now have the information they need, in front of them when they need it,” says Wanda Brockmeyer, Service Line Director for Emergency Services. “We’re easily saving 15 minutes per patient that we previously spent looking up records in other systems or making phone calls for information from previous visits.” With 20,000 ED visits per year, that’s a savings of 5,000 hours of staff time annually, as well as faster service for ED patients.

When admitting patients from the ED: When patients receive medication in the ED, another iatricSystems interface documents the administration of meds in Horizon Clinicals. “The interface prevents duplicate doses of medications — including some very serious medications — as well as missed doses and confusion about timing,” Joy adds. “Now when a floor nurse pulls up the record, she can see what medication the patient received in the ED. Before we were blind to it, and there was a lot of guesswork and phone calls to get verification. iatricSystems eliminates the uncertainty, and the risk of medication errors that comes with it.”

For updating patient profiles and complying with Meaningful Use: iatricSystems built an interface that captures answers to patient history questions collected during every ED visit (allergies, vital signs, home meds, tobacco and alcohol use, infectious disease status, etc.) and automatically updates the patient profile in Horizon Clinicals. These are Core Measures required for Meaningful Use compliance, and tracked in ED Horizon Clinicals as the “source of truth” at Roper Saint Francis. “When we asked those questions in the ED, they were documented in the record but that information didn’t always follow the patient upstairs,” Wanda observes. “The MEDHOST and Horizon Clinicals integration shares that information automatically so we don’t have to ask the questions again, or get dinged for not having information that we actually have.”

For discharging patients from the ED: Another iatricSystems interface automatically sends discharge information from MEDHOST to STAR so when the EDIS sends a patient home, STAR also sends the patient home. ED staff no longer have to document the same information twice, including grappling with a system (STAR) that they don’t normally use.

“When we started, none of us had the appreciation for interfaces that we have now,” Wanda says. ED and inpatient caregivers now have instant access to the information they need thanks to seamless integration behind the scenes. “We couldn’t have achieved this degree of integration between MEDHOST and Allscripts without the expertise of iatricSystems,” Jill adds.

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