

St. Luke's Synchronizes Lab and Physician Workflows with iatricSystems™ Physician Office Integration



OBJECTIVE: St. Luke's needed a faster way for physicians in ambulatory practices to order lab work, x-rays, and other hospital services and receive clinical results. They wanted to replace inefficient faxing and the resulting delays with real-time electronic workflows between the many hospitals, clinics, and physicians within their network.

SITUATION: Located in Duluth, Minnesota, St. Luke's is an Integrated Delivery Network (IDN) serving 17 counties in northeastern Minnesota, northwestern Wisconsin, and Michigan's Upper Peninsula. The health network includes a number of physician practices throughout the region (currently 38 practices with 216 physicians). St. Luke's uses MEDITECH as their Healthcare Information System (HCIS) and their ambulatory practices use eClinicalWorks as their ambulatory Electronic Medical Record (EMR) system.

SOLUTION: St. Luke's uses iatricSystems™ Physician Office Integration solution to provide bidirectional interfaces between its MEDITECH and eClinicalWorks (eCW) systems. Doctors submit orders directly from eCW into MEDITECH and receive results back into eCW as part of their workflow. When submitted, orders are automatically placed on a work list to be reviewed and processed when the patient presents at the hospital. This improves workflow and there is also no need to reenter data when the patient transitions from one facility to another.

RESULTS: The Physician Office Integration solution eliminates faxing, inefficiency, and delays, both for physicians and hospital staff. Hospital staff can process orders, and doctors can review results in the format that is familiar to them, without rework. Patients can go anywhere in the St. Luke's system, knowing that caregivers have access to patient records that are consistent and complete.

"I would argue that the biggest benefit of Physician Office Integration is that the interfaces are virtually invisible. iatricSystems has done a great job, and they continue to support us moving forward."

— Clark Averill
Director of
Information Technology
St. Luke's Hospital



St. Luke's is an Integrated Delivery Network (IDN) serving 17 counties in northeastern Minnesota, northwestern Wisconsin, and Michigan's Upper Peninsula. The health network also includes a number of physician practices throughout the region (currently 38 practices with 216 physicians).

St. Luke's faced a challenge familiar to many hospitals: how to exchange patient information with physicians who use different healthcare information systems — in this case between St. Luke's MEDITECH system and the eClinicalWorks EMR systems used by their ambulatory practices. St. Luke's turned to iatricSystems and its Physician Office Integration solution to tie together the two different healthcare systems in real time. Data flows smoothly in both directions, with automated workflows that save time for both practice physicians and hospital staff.

"Many interfaces need to be round trip, and people shouldn't have to do rework when information goes from one system to the other. When we chose Physician Office Integration, it was with those requirements in mind," says Clark Averill, Director of Information Technology at St. Luke's.

Synchronizing Patient Indexes

As Clark explains, the solution is not only saving time, but also improving the delivery of care, starting when a new patient arrives. "We want patients to be able to go anywhere in the St. Luke's network and have their information available. Using Physician Office Integration, we created a bidirectional ADT interface that allows us to do just that." Whether a new patient presents at the hospital or one of the practices, when a new patient record is created in one system, a corresponding record is created in the other. iatricSystems wrote routines that keep the Master Patient Index (MPI) in sync to ensure that caregivers using either system receive information about the right patient.

"When our physicians are looking for clinical information about a patient, they don't have to think about what system they're in," Clark adds. "They can be using either MEDITECH or eClinicalWorks and see virtually the same patient record. That's very difficult to accomplish and iatricSystems was able to pull it off."

Submitting Orders, Managing Them on Arrival, Returning Results

Physicians enter orders and get back results in eCW, staying within their current workflow and using software that is familiar to them. The orders are then transmitted to the iatricSystems Physician Office Integration inbound work list for pending orders. When a patient presents at any St. Luke's lab within the network, department staff go to the iatricSystems work list and pull up the correct patient information. Then the patient's order is entered into MEDITECH for processing. If there are multiple orders listed for the patient, the staff may be able to consolidate tests, eliminating multiple draws and the need for repeat visits. After the test, results are returned to the physician and applied against the original order in eCW.

The Quiet Solution

Physician Office Integration works quietly behind the scenes to improve the delivery of care at St. Luke's. "I would argue that the biggest benefit is that the interfaces are virtually invisible," Clark concludes. "We have more than 200 physicians seeing patients every day, submitting orders and receiving results. If those interfaces weren't running properly, we would hear about it very quickly. iatricSystems has done a great job, and they continue to support us moving forward."

"We couldn't have achieved our goals without iatricSystems in-depth knowledge of MEDITECH and eClinicalWorks. Their programmers and support staff are very well-versed in what we were trying to accomplish."

"We couldn't have achieved our goals without iatricSystems in-depth knowledge of MEDITECH and eClinicalWorks. Their programmers and support staff are very well-versed in what we were trying to accomplish."

— Clark Averill
Director of
Information Technology
St. Luke's Hospital