Implementing e-Prescribing with Grant Support and MIPPA Incentives: Heritage Valley Health System

by

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On February 16, 2009, Heritage Valley Health System announced that we had received a \$661,500 grant from the \$29 million Highmark Health Information Technology Grant Program, an affiliated unit of Highmark Blue Cross Blue Shield. The Highmark grants are designed to help physicians acquire electronic prescribing technology, part of a larger move to encourage adoption of electronic health records (EHR).

Highmark is one of the first health plans to support a meaningful e-prescribing implementation since the introduction of the recent Medicare Improvements for Patients and Providers Act (MIPPA). The act provides financial incentives to providers (physicians, certified nurse practitioners, physician assistants and other physician extenders) who adopt electronic prescribing, and financial penalties to those who fail to use the technology. While the Medicare incentives are critical to the adoption and ongoing use of e-prescribing, they do not address the upfront cost of technology acquisition and implementation. Highmark's grant program addresses this last remaining obstacle and, as a result, we believe providers, patients and employers in Western Pennsylvania will benefit from the accelerated use of this life-saving technology.

"Our decision to support the ongoing e-health initiatives at Heritage Valley Health System recognizes them as an e-prescribing leader. We feel that Heritage Valley's dedication to e-health initiatives improves quality, saves money and in fact saves lives in Western Pennsylvania," said Dr. Kenneth R. Melani, president and chief executive officer for Highmark.

Heritage Valley earned the grant by virtue of our highly successful e-prescribing initiative, part of our larger EHR program. In 2006, Heritage Valley implemented the Allscripts Enterprise EHR (formerly TouchWorks) and a year later rolled out the e-prescribing functionality of the EHR to 90 of our providers. We very quickly achieved extremely high rates of utilization and are currently processing over 40,000 prescriptions per month electronically. In late February 2009, we issued our 500,000th prescription sent safely and electronically to an area pharmacy. In just the last few weeks we added 30 more providers to the program, bringing the total number of providers prescribing electronically to 120.

"Heritage Valley is really a model for healthcare organizations across the country who want to leverage the power of real-time information to transform the care process and improve their performance," said Allscripts chief executive officer Glen Tullman. "Their integration of Enterprise EHR and its e-prescribing functionality with a state-of-the-art handheld device to ensure physicians have the right information at the right time is proof that the future of healthcare is happening right now."

Heritage Valley's board of directors and management team see the Highmark grant as recognition of our commitment to information technology. "While our healthcare system is neither prominently located nor particularly large by national standards, what sets us apart is our commitment to making information technology a strategic imperative of equal importance to our other imperatives of quality, customer satisfaction, and safety; fiscal responsibility; market expansion and community health; and human resources," said Laura Vassamillet, chairperson of the Heritage Valley Health System Board of Directors. "We embarked on our e-prescribing initiative not because private, state or federal funding was available, but because it was the right thing to do. Simply put, our board was committed to investing in information technology that has been proven to prevent medication errors and improve the patient/customer experience, thus providing our community with the highest possible level of clinical care."

System Overview: One Device, One System

Our system consists of two hospitals – Heritage Valley Beaver with 351 beds, and Heritage Valley Sewickley with 186 beds – several labs and diagnostic facilities, two

surgery centers, rehabilitation and behavioral health centers, plus 4,300 employees and more than 400 affiliated physicians. According to Dave Carleton, chief information officer at Heritage Valley, the strategy from the beginning was to integrate our existing mobile clinical access portal seamlessly with a major vendor's e-prescribing product. "We established this Information Technology objective based on input from our physicians and other providers," said Carleton. "Almost unanimously, they supported a single handheld device that would serve as their interface with the EHR and its integrated e-prescribing functionality."

"We began implementation three years ago just as Wi-Fi and broadband became widely available," Carleton continued. "We developed the Mobile Clinical Access Portal (M-CAP) handheld solution internally, which is now used by 270 of our providers, including all of our primary care physicians. Armed with the handheld device that is interfaced with the EHR, our providers have access to a complete patient history plus three years of lab, pathology, and radiology reports."

Handheld devices are now being equipped with RFID (Radio Frequency Identification) tags and workstations with RFID readers are located throughout our hospital facilities. When one of our providers, during rounds for example, wants to view a new X-ray noted in the EHR on his handheld unit, he simply touches the RFID reader to initiate an automatic log-in and the full screen monitor opens with an expanded view of the EHR information on the small handheld. As a result, the patient's X-ray is immediately available for detailed review. Our providers report that one benefit of the integrated EHR and handheld system is an average reduction of 30 minutes per day in time spent on rounds.

Implementing e-Prescribing

For e-prescribing, we incorporated the complete acute care prescription file into our system and utilized the e-prescribing function built into our EHR. This made complete drug information available to all of our e-prescribing providers. The e-prescribing system significantly improves patient safety by eliminating dosage, usage, handwriting, and prescription errors. As a provider accesses the system, the system presents a medication list. The e-prescribing function displays patient eligibility in real-time,

formulary information specific to the patient's plan, potential drug-drug interaction, and drug-allergy alerts. The individual provider simply accesses all of this information on the handheld screen, right at the point of care, and generates the prescription electronically with the push of a button. Dr. Jeffrey Hein, a family practice physician with the health system who writes over 2,500 e-prescriptions a month, emphasized the safety aspect of e-prescribing. "I used to get all of these calls from the pharmacy. Either they couldn't read the prescription order or the patient had lost the order form. Now, I can't imagine going back to hand writing prescriptions."

The overall system also provides an end-to-end connection for providers to place prescription orders electronically and respond to electronically generated pharmacy-initiated requests for refills. We have enrolled and integrated all local pharmacies into our e-prescribing system.

Achieving Continuity of Care

Thanks to the integrated implementation of our EHR solution, the handheld devices, and e-prescribing, we have achieved "continuity of care" regardless of whether a patient is in acute, long-term, or ambulatory care. Treatment and prescription errors that once occurred as a result of patient information being lost while transitioning between acute, long-term, and ambulatory care have today been nearly eliminated.

Any of our providers can use their handheld device to review a complete census of their acute or long-term care patients, review each patient's treatment plan, issue discharge orders, and e-prescribe the discharge medications, thus maintaining continuity of care as patients transition from one care category to another. Of course, they can also review their office appointment schedule, electronic refill requests, and medical records for their ambulatory patients as well.

Doing What's Right

According to Heritage Valley president and chief executive officer Norm Mitry, we expect our current rate of 40,000 electronic prescriptions per month to jump significantly as new providers come onboard the system. Benefits include a 30-minute reduction in time devoted by our providers to rounds, improved patient care, reduced

prescription errors, and continuity of care between acute, long-term, and ambulatory patients. In addition to the Highmark grant, our EHR and e-prescribing program positions us to qualify for all MIPPA incentives. Mitry emphasized that most importantly, "our Electronic Health Record and e-prescribing program enables the providers in our health system to have the right information at the right time in the right place to provide that most effective and efficient quality care to all of the patients in the communities that we serve – each and every day."