Avera ePharmacy

Avera Health – Sioux Falls, SD

Background
Beginning in 1993, Avera Health offered eConsult services to rural, frontier and critical access hospitals that were part of the Avera Health system. Ten years later, eCARE expanded to provide eICU care. In addition, Avera eCARE delivered 24/7 access to a wide range of medical specialists and referrals to specialty care for a growing number of underserved populations and communities. In 2009, Avera eCARE launched eEmergency and ePharmacy for all of Avera's rural hospitals. Additional funding from the Helmsley Charitable Trust and other sources allowed expansion to more than 200 facilities across eight states and the ability to serve partners outside Avera Health. By 2012, eCARE services were available for long-term care and correctional facilities. Avera eCARE telemedicine professionals work together 24/7/365 in the eHELM, a virtual hospital hub, also created in 2012 with the assistance of the Helmsley Charitable Trust.

Program Overview
Health care systems, hospitals, outpatient clinics, long-term care organizations and correctional facilities take advantage of Avera eCARE to support their onsite staff members and services; deliver fast response to patients' health needs, including urgent and critical care; help avoid unnecessary transfers; reduce patient travel time and expense by improving care for residents where they live; and coordinate referrals to additional medical specialists.

Since ePharmacy launched in 2009 staff have provided remote, around-the-clock pharmacy coverage for more than 744,000 patients across 70 sites. No matter the size or location of a facility, a hospital can ensure medication safety for its patients 24/7/365 by partnering with ePharmacy. They gain access to licensed and hospital-trained pharmacists for real-time, first-dose order reviews and instant consultations on medication-related issues or concerns.

ePharmacy pharmacists work together in a centralized telemedicine hub, so they're available all day and all night. They collaborate with a participating hospital's current pharmacy and/or professional staff to assist with complex situations and ensure that patients receive the most effective medications.

Here's how it works:

1. The ePharmacy team works with a participating hospital's staff to learn their medication-related processes and integrate ePharmacy services into their workflow.

2. The team implements and integrates the necessary software and hardware into hospital systems to allow the team to receive and prioritize real-time orders. ePharmacy staff work right in the hospital's electronic medical record as a seamless part of their care team.

3. All new prescriptions are placed in the queue at the centralized virtual hospital hub where licensed and experienced hospital pharmacists receive and review medication orders 24/7/365.

4. ePharmacy staff provide the hospital's prescriber or nursing staff with recommendations on preparation, administration and safe use. They carefully watch for drug interactions and duplicate orders to ensure that patients get the precise medication they need.

5. Beyond real-time medication review, the participating hospital receives ongoing monitoring of medication therapy the entire time a patient stays with them.

6. In addition, hospital staff can call on ePharmacy staff at any time – even in the middle of the night – to consult on medication-related issues or concerns.

The ePharmacy team supplies monthly reporting, ongoing education and recommendations to continually improve processes and delivery of care.

Impact
The ePharmacy program helps participating hospitals comply with medication regulations from The Joint Commission and federal and state governments; reduce the risks of medication errors; offer the option of offloading daytime order review from their pharmacists, allowing them to focus on medication reconciliation, patient counseling and patient rounds with providers; deliver the most effective medications for each patient; stay up-to-date with current evidence-based medication practices; receive support for the move toward bedside medication verification, electronic medication administration records and computerized physician order entry; and gain access to the ePharmacy workflow/order management software.

Results for the past 12 months include 10,000 interventions, 5,500 avoided adverse drug events, $13 million cost savings from avoided adverse drug events, and a 17-minute average turnaround time.

Lessons Learned
ePharmacy had to learn to work with smaller, rural hospitals early on. Successful integration required that ePharmacy leaders support the rural hospital with a wide variety of pharmacy-related projects, including support EMR module installations, automated dispensing integration, and development of pharmacy policies. Over several years, ePharmacy built a toolkit of best practices and templates for supporting these smaller facilities in ramping up their in-house pharmacy efforts.

Future Goals
ePharmacy has ongoing goals for program growth within the region. This includes working with existing customers to identify needs beyond order review for inpatients. It also includes supporting other Avera eCARE service lines in their clinical expansion efforts. Pharmacists are being more and more recognized for their important role in medication safety and efficacy across the continuum, from clinics, to hospitals, and long-term care. Future plans will explore opportunities to leverage pharmacists via telemedicine in these additional care settings.

Contact: Deanna Larson
Chief Executive Officer, Avera eCARE
Telephone: 605-322-4723
Email: deanna.larson@avera.org