

CUSTOMER INNOVATION SPOTLIGHT

Magnolia Regional Health Center Finds Prescription Abandonment Contributes to Readmissions



Using Price Transparency and Medication History Tools to Reduce Prescription Abandonment and Improve Medication Adherence

An Initiative to Improve Outcomes for Patients With Congestive Heart Failure

Cost is a major determining factor for patients deciding whether to pick up prescriptions from the pharmacy. When medications are too expensive, patients tend to abandon them regardless of how important they are to their health. In fact, studies have shown that patients are five times more likely to abandon a prescription that costs \$50 versus one that costs \$10.¹ The impact of non-adherence is dire in terms of patient outcomes, with 125,000 avoidable deaths attributed to non-adherence every year.²

What if prescribers and patients could view prescription drug costs and discuss options at the point of care to avoid “sticker shock” at the pharmacy counter? Would patients who are prescribed more affordable medications be more adherent than patients who are prescribed more expensive medications? And could better adherence result in fewer avoidable Emergency Department visits and inpatient readmissions?



Corinth, MS | 200 beds | EHR: MEDITECH

About Magnolia Regional Health Center

This acute care community hospital provides care to patients in Alcorn County and five surrounding counties in northeast Mississippi and three counties in southern Tennessee. The hospital earned the Press Ganey Guardian of Excellence Award and has been recognized four times as one of Healthcare’s Most Wired hospitals. Magnolia Regional Health Center is fully accredited by The Joint Commission and has been serving the community since 1965.

These are the questions that hospitalists, care navigators, and primary care providers at Magnolia Regional Health Center asked as part of an initiative to improve outcomes for congestive heart failure (CHF) patients. Physicians commonly prescribe antithrombotics or anticoagulants for this patient population to prevent cardiac events such as heart attack and stroke, which may result in hospitalizations and readmissions if patients do not adhere to their medication regimen.



“At Magnolia Regional, we believe that **improving medication access will improve patient adherence and outcomes**. Putting patients’ out-of-pocket cost information in front of clinicians at the point of prescribing provides the opportunity to prevent a common barrier that we are largely oblivious to because patients are often reluctant to share concerns over cost-of-care. Enabling providers to initiate that conversation **promotes better rapport, cost-effectiveness, and may ultimately save lives.**”

—Ben Long, M.D.

Hospitalist & Associate Professor of Internal Medicine
Magnolia Regional Medical Center

A 3-Step Process to Understand Medication Adherence

The Magnolia Regional team rolled out a three-step approach to better understand the impact of having drug costs available to physicians and patients at the point of care.

Step 1: Establish a Baseline of Clinical Outcomes

Many studies have shown that lower medication adherence leads to much higher odds of CHF patients being readmitted to the hospital, and that interventions to improve medication adherence reduce readmission rates.³⁻⁵

With this in mind, the first step was to determine the baseline levels of medication adherence by patients who were readmitted versus those who were not readmitted. All 417 patients in the study had been admitted to the hospital with a diagnosis of CHF. Of those patients, 84 (20%) were readmitted to inpatient care and 35 (8%) presented at the Emergency Department (ED) as a recurrent visit but were stabilized and sent home.

Step 2: Determine Which Medications Patients Were Not Filling Consistently

Next, it was important to determine the adherence levels of specific medications by patients who were readmitted versus those who were not readmitted. Antithrombotic or anticoagulant medications are commonly prescribed to CHF patients following a hospitalization because they are very effective,⁶ but some can have incredibly high out-of-pocket costs to patients.⁷

To keep CHF patients out of the hospital, adherence to these medications is critical.⁸ The team theorized that if patients knew their out-of-pocket costs in the exam room, they could ask the provider to switch to a less expensive drug. The lower cost might make them more likely to fill the prescription.

Step 3: Implement New Technology Solutions

To test the impact of price transparency on how well patients adhere to their medication regimens, Magnolia Regional collaborated with DrFirst’s Applied Clinical Research team to gather and analyze medication history data. Then they installed DrFirst’s myBenefitCheckSM into the Real-Time Benefit Check (RTBC) workflow in their MEDITECHTM electronic health record (EHR), which made more prescription benefit information and therapeutic alternatives available during the patient encounter. Next, they used DrFirst’s MedHxSM to gather complete patient medication history so they could track whether patients in the study had filled their prescriptions.



Price Transparency in Healthcare: Avoiding Sticker Shock

With prescription drug prices rising at every turn, patients need price transparency and the ability to discuss options with their doctors during office visits. To address this need, starting January 1, 2023, the Centers for Medicare & Medicaid Services (CMS) will require insurers that offer Medicare Part D health benefits to use an electronic drug cost and health benefit comparison tool that's compatible with at least one electronic health record (EHR) system. The goal is to allow patients to compare the cost of prescription drugs, request a similarly effective option, and better understand what they will need to pay before they are standing at the pharmacy counter.

By reducing the frequency of prescription abandonment due to "sticker shock," a real-time prescription benefit solution in tandem with complete medication history data can help hospitals and health systems address medication adherence challenges in vulnerable patient populations.

Initial Study Results

From July 2020 to September 2021, Magnolia Regional and DrFirst studied medication adherence and prescription fill rates for 417 patients with CHF.

When medications were broken down by drug class, first-fill prescription abandonment for more expensive antithrombotics was higher in readmitted patients (50%) than in non-readmitted patients (35%). Results found little difference in first-fill prescription abandonment for less expensive anticoagulants (31% in readmitted patients versus 32% in non-readmitted patients). Readmitted patients were 10% less adherent to antithrombotic agents, however, and 17% less adherent to anticoagulants than patients who were not readmitted.

By measuring prescription abandonment and adherence for these medications—which are vital to keeping patients out of the hospital—the team validated its assumption: Having price transparency at the point of prescribing and access to prescription fill data can equip hospitalists and care navigator staff with crucial information that could improve care for CHF patients.

"We are dedicated to empowering our providers with innovative solutions that support their ability to provide the highest quality of care to patients," says Brian Davis, CHCIO, Chief Information Officer at Magnolia Regional Medical Center. "myBenefitCheck gives prescribers up-to-the-minute, patient-specific information on drug costs while they are face-to-face with patients, helping to minimize the financial obstacles that keep patients from filling their prescriptions. Then, using MedHx data, we can track fill rates for these patients, pinpoint gaps in adherence, and identify those at risk of readmission."

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