Research in Social and Administrative Pharmacy 13 (2017) 892–895

Contents lists available at ScienceDirect

Research in Social and Administrative Pharmacy

journal homepage: www.rsap.org

# Implementing primary care pharmacist services: Go upstream in the world of value-based payment models

Marie A. Smith

*University of Connecticut School of Pharmacy, 69 N. Eagleville Rd – UNIT 3092, Storrs, CT 06269-3092, United States*

ARTICLE INFO

*Article history:*
Received 8 August 2016
Received in revised form
7 December 2016
Accepted 7 December 2016

ABSTRACT

There is a shift by payers and health plans away from volume-based payments toward value-based payments that are linked to clinical quality, clinical practice improvement activities, and certified electronic health records technology. These alternative payment programs include fee-for-service with performance-based incentives, advanced payments for care management, shared savings, and population-based payments.

Alternative payment programs that focus on clinical quality and practice improvements are founded on patient-centered care principles and based on team-based care delivery. There will be opportunities to expand primary care teams to address chronic care management, care transitions, and high-risk populations – all of which present medication optimization and management challenges that can be delegated to pharmacists working closely with primary care clinicians.

This commentary will discuss implementation considerations for pharmacist services, standardized documentation of medication-related problems, and "upstream" pharmacist interventions (closest to the point of care) that align with alternative payment models.



Both public (e.g., Medicare and some Medicaid) and commercial health plans are actively pursuing new payment models for primary care providers. These payment models are moving away from the traditional fee-for-service payments toward value-based payments that are based on clinical quality, clinical practice improvement activities, and certified electronic health records (EHR) technology. Some new payment model examples are the use of fee-for-service with performance-based incentives, advanced payments for care management, shared savings, and population-based payments.[1]

Alternative payment programs that focus on clinical quality and practice improvements are founded on patient-centered care principles and based on team-based care delivery. Such programs offer opportunities to proactively identify or prevent medication-related problems (MRPs), resolve existing MRPs, and to address the Triple Aim of achieving better care, healthier people, and smarter spending.[2] With the introduction of alternative payment models, there will be opportunities to expand primary care teams to address medication management challenges that can be delegated to pharmacists working closely with primary care clinicians.

Successful implementation of pharmacist-provided medication management services in primary care practices should be based on the value of pharmacists' unique clinical skills and team-based practice contributions that are aligned with new payment models. This commentary will discuss pharmacist services implementation considerations, standardized documentation of MRPs, and "upstream" pharmacist interventions (closest to the point of care) that align with alternative payment models.

## 1. Primary care pharmacist services implementation considerations

When pharmacists are integrated with primary care teams, they develop sustained partnerships with patients and their families, as well as with other health care providers. These ongoing relationships allow pharmacists to focus on patient-specific prescribing options, actual medication use at home, pharmacotherapy management and monitoring, and follow-up on the achievement of desired medication outcomes. In particular, pharmacists can work with high-risk patients, who use many health care services, and account for a large proportion of total health care costs.

Primary care practices that integrate pharmacists as team members can optimize implementation processes by considering:

*E-mail address:* marie.smith@uconn.edu.

http://dx.doi.org/10.1016/j.sapharm.2016.12.012
1551-7411/

(1) pharmacist integration options, (2) medication management services that align with patient population and practice needs, (and 3) patient selection priorities.[3]

### 1.1. Pharmacist integration

There are several mechanisms to integrate pharmacists with primary care teams. Pharmacists may be employed on the staff of large group practices or those practices that are affiliated with integrated delivery systems. In this model, the practice site pays the salary of the employed pharmacist. Another model is an embedded pharmacist in primary care practices through a co-funded partnership between the practice and a health system or pharmacy school. A shared resource contractual agreement is an approach where the pharmacist provides medication management services for multiple practices that share the costs of the pharmacist. The shared resource approach may benefit smaller practices that may not be able to support a full time pharmacist. With the growth of remote access to electronic medical records, we may see the emergence of a virtual team pharmacist model where the pharmacist is not co-located in the primary care practice and communication with the primary care team may be used for e-consultations or patient interactions through interactive video (telemedicine) or via telephone. This virtual team model may be a practical approach for pharmacists in more rural areas.

### 1.2. Patient population and practice needs

When a primary care practice is interested in expanding their team to include a pharmacist, here are some implementation questions that should be considered.

How can medication management services:

- improve practice/provider efficiencies or workflows?
- complement the skills of other health care practitioners?
- enhance the practice's ability to meet care quality or performance measures?
- align with care management or population health programs?

### 1.3. Patient selection

Patients who can benefit most from pharmacist medication management services should not be selected simply based on administrative claims review for highest utilization or costs. Here are some patient selection criteria that should be considered in the implementation process:

- high-risk patients with chronic conditions and multiple co-morbidities
- patients with high-risk medications (e.g., Beer's list for elderly patients, high risk for adverse drug events)
- patients with complex medication regimens who have patterns of difficulty taking medications as intended or are living alone/without caregiver support
- patients who have not achieved a treatment goal for a chronic condition
- patients with care transitions (e.g., moving from a hospital, emergency department, urgent care center, nursing facility, assisted living facility, primary care physician care, home health care, or specialist care to another setting or to the patient's home)
- patients who need to be monitored for treatment outcomes or adverse drug events between primary care office visits
- patients with multiple prescribers (especially if the prescribers do not share patient health information)

## 2. It's all about primary care medication safety

Sometimes, the justification for integrating pharmacist services in primary care settings is the improvement of medication safety. In the US, it is estimated that 4.5 million adverse drug events (ADEs) occur each year, mostly in outpatient office visits.[4] These ADEs are associated with nearly 400,000 hospitalizations per year. Older patients and those that take 6 or more medications are at increased risk. Another study estimated that the rate of ambulatory ADEs may be as much as 4 times that of ADEs detected in a hospital setting.[5] However, this represents only those ADEs that generated a physician office visit. While this data is troubling, we know there are many more preventable ADEs or medication errors that go unnoticed or unreported.

So why do we tolerate the *status quo* and accept preventable ADEs and medication errors as mere accidents or consequences of usual care? Compared to hospital medication safety initiatives, little has been done to improve the use and safety of medications in primary care settings. In a fee-for-service world, there is no incentive or payment mechanism to address medication-related problems (MRPs) as part of preventive care or chronic condition programs. There needs to be a greater focus on the prevention and detection of medication-related problems in primary care practices – especially for patients with chronic diseases and those taking multiple medications.[6]

## 3. Standardizing the classification and documentation of MRPs

As we compare studies that evaluate the implementation of pharmacist-provided medication management services in primary care settings, we need to use a standardized classification of MRPs. For nearly 20 years, the pharmacy profession has had a standardized taxonomy for classifying MRPs.[7] The major categories of MRPs (i.e., appropriateness, effectiveness, safety, and adherence) and related subcategories are outlined in Fig. 1.

This MRP taxonomy was the foundation for the development of over 300 pharmacy-specific medication management SNOMED codes (i.e., a standardized coding terminology) by the Pharmacy Health Information Technology Collaborative.[8] SNOMED codes serve as universal languages for software systems and allow proprietary EHR vendors to incorporate standard data codes into their product. The US National Library of Medicine has approved the medication management SNOMED codes for pharmacists to use when documenting their services.

Ensuring that pharmacists establish the same clinical coding foundation as other health care providers will help ensure the integration of pharmacist medication management services documentation into the EHR and the national health information technology (HIT) interoperable framework.

As we move toward more team- based care delivery modes, it is vital for pharmacists to be able to document their clinical services so that clinical quality and practice improvement reports can be used evaluate pharmacists' contributions to patient care and medication safety.

## 4. Go upstream to address MRPs

Medications are the most common treatment for patients with chronic conditions. Most of the potential MRPs in primary care settings need to be addressed both at the point-of-prescribing and between primary care office visits. Several studies in primary or