



ePALS Webinar

"Get the Medications Right"

New Report Explores
Comprehensive Medication Management (CMM)
and Identifies Barriers, Opportunities and Lessons for
Advocates

Principal Investigator:

Terry McInnis, MD, MPH, CPE, FACOEM

President- Blue Thorn Inc.

Email: tamcinnis@bluethorninc.com

December 15, 2016



Patients Best Describe the Problem - One that a CMM Process Could Solve

Testimony of Stephanie Dempsey - Volunteer for the American Heart Association Before the Senate Committee on Finance Chronic Illness: Addressing Patients' Unmet Needs- Dirksen Senate Office Building, Room 215 July 15, 2014

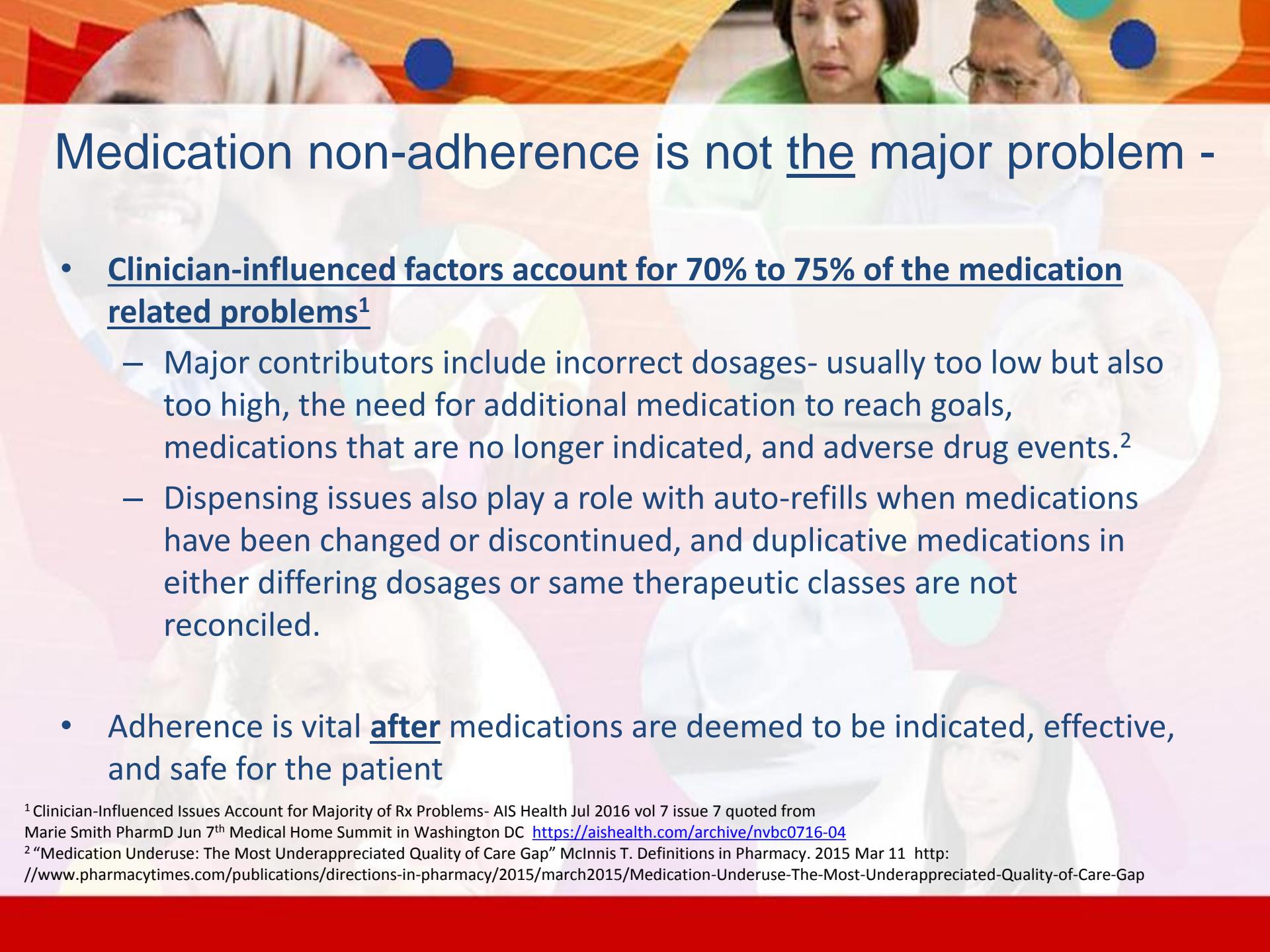
"Although my doctors are all well-intentioned, they often don't talk with each other or share information about my care. This ultimately leaves me to be my own health care coordinator.

To give you an example, my Lupus disorder keeps my body in a constant state of inflammation for which one of my specialists prescribed a medication to reduce that symptom.

Unfortunately that medication can cause seizures. He did not remember my seizure disorder and the medicine caused me to have an increase of seizures.

After a visit with my neurologist, he took me off the medication, knowing the seizure side effect. Getting this resolved took days, countless phone calls and much persistence on my part.

Issues like this happen frequently and although I consider myself an educated person, navigating this maze is very difficult and exhausting. But it is my life at stake and I do not have a choice but to be engaged."

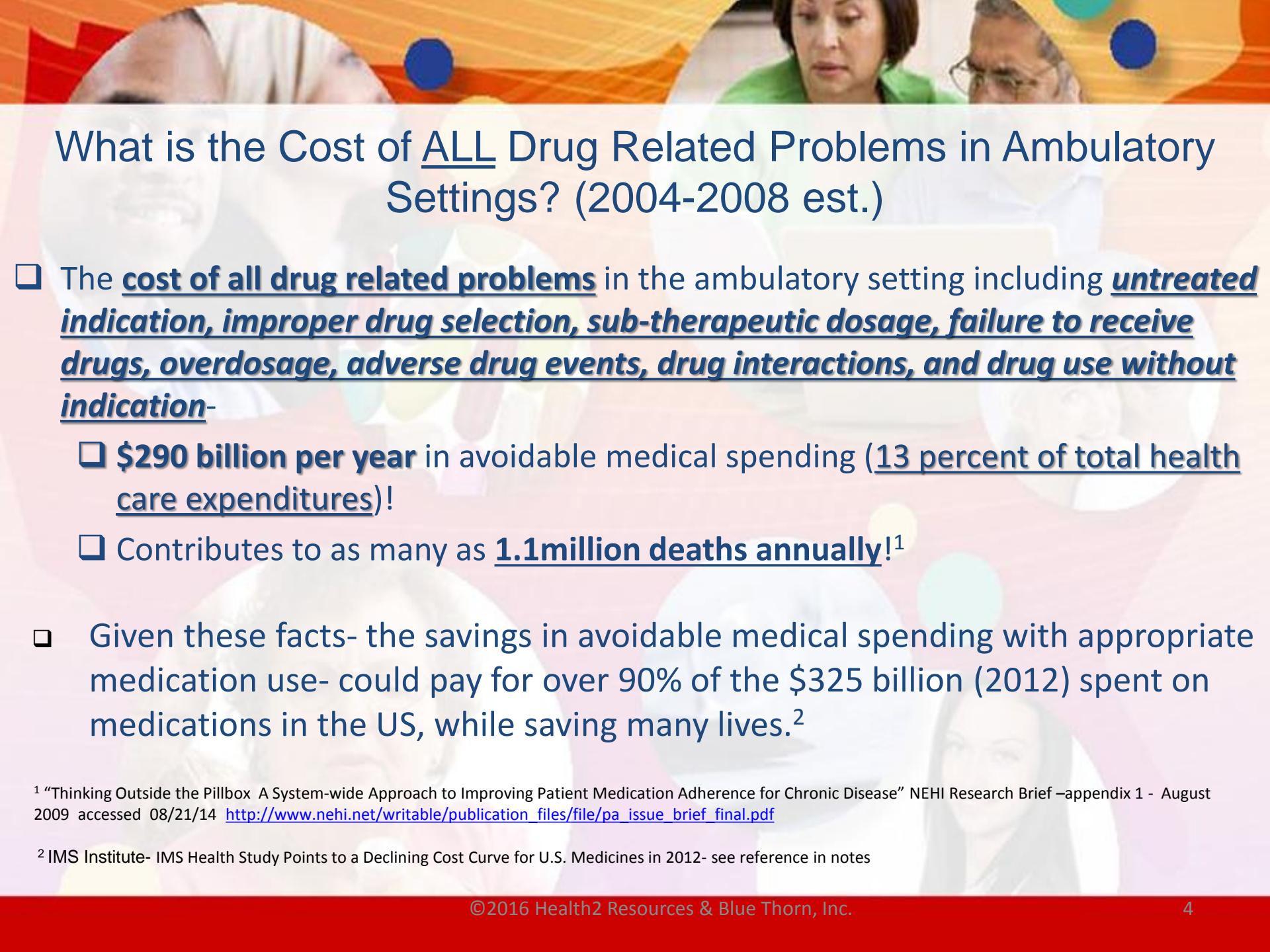


Medication non-adherence is not the major problem -

- Clinician-influenced factors account for 70% to 75% of the medication related problems¹
 - Major contributors include incorrect dosages- usually too low but also too high, the need for additional medication to reach goals, medications that are no longer indicated, and adverse drug events.²
 - Dispensing issues also play a role with auto-refills when medications have been changed or discontinued, and duplicative medications in either differing dosages or same therapeutic classes are not reconciled.
- Adherence is vital after medications are deemed to be indicated, effective, and safe for the patient

¹ Clinician-Influenced Issues Account for Majority of Rx Problems- AIS Health Jul 2016 vol 7 issue 7 quoted from Marie Smith PharmD Jun 7th Medical Home Summit in Washington DC <https://aishealth.com/archive/nvbc0716-04>

² "Medication Underuse: The Most Underappreciated Quality of Care Gap" McInnis T. Definitions in Pharmacy. 2015 Mar 11 http://www.pharmacytimes.com/publications/directions-in-pharmacy/2015/march2015/Medication-Underuse-The-Most-Underappreciated-Quality-of-Care-Gap



What is the Cost of ALL Drug Related Problems in Ambulatory Settings? (2004-2008 est.)

- The cost of all drug related problems in the ambulatory setting including untreated indication, improper drug selection, sub-therapeutic dosage, failure to receive drugs, overdosage, adverse drug events, drug interactions, and drug use without indication-
 - **\$290 billion per year** in avoidable medical spending (13 percent of total health care expenditures)!
 - Contributes to as many as 1.1million deaths annually!¹
- Given these facts- the savings in avoidable medical spending with appropriate medication use- could pay for over 90% of the \$325 billion (2012) spent on medications in the US, while saving many lives.²

¹ "Thinking Outside the Pillbox A System-wide Approach to Improving Patient Medication Adherence for Chronic Disease" NEHI Research Brief –appendix 1 - August 2009 accessed 08/21/14 http://www.nehi.net/writable/publication_files/file/pa_issue_brief_final.pdf

² IMS Institute- IMS Health Study Points to a Declining Cost Curve for U.S. Medicines in 2012- see reference in notes

Progression of Clinical Pharmacy Service Intensity and Coordinated Medication Management

Pt. Drug Education	Drug Regimen Review	Adherence Persistence	Problem Intervention	Advanced Disease state MTM	Comprehensive Medication Management
--------------------	---------------------	-----------------------	----------------------	----------------------------	-------------------------------------

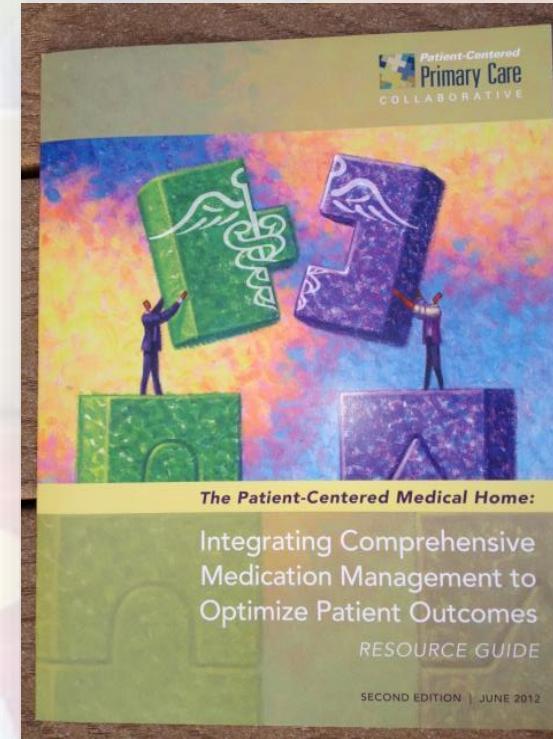


- Minimal focus
- Drug-centric
- Triage-minded
- Short term
- Instantaneous
- Episodic

- Multi-focused
- Patient-centric
- Multi-relationship
- Repetitive/reiterative
- Accountability
- Full Scope(Drug/Patient/Disease)

Defining CMM

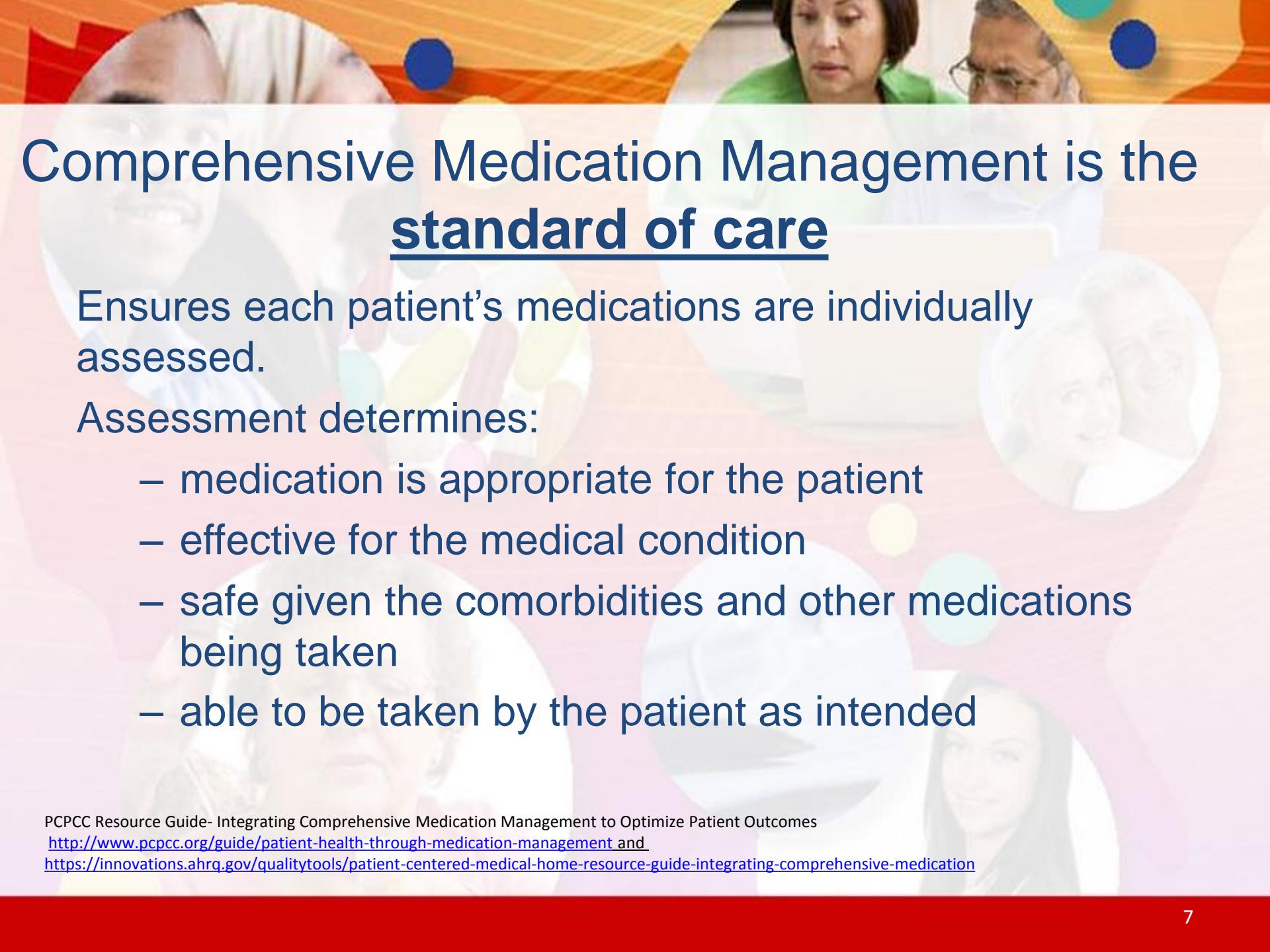
The Patient-Centered Primary Care Collaborative (PCPCC) Defines Comprehensive Medication Management (CMM)



Integrating Comprehensive Medication Management to Optimize Patient Outcomes.
Resource Guide

<http://www.pcpcc.org/guide/patient-health-through-medication-management>

<https://innovations.ahrq.gov/qualitytools/patient-centered-medical-home-resource-guide-integrating-comprehensive-medication>

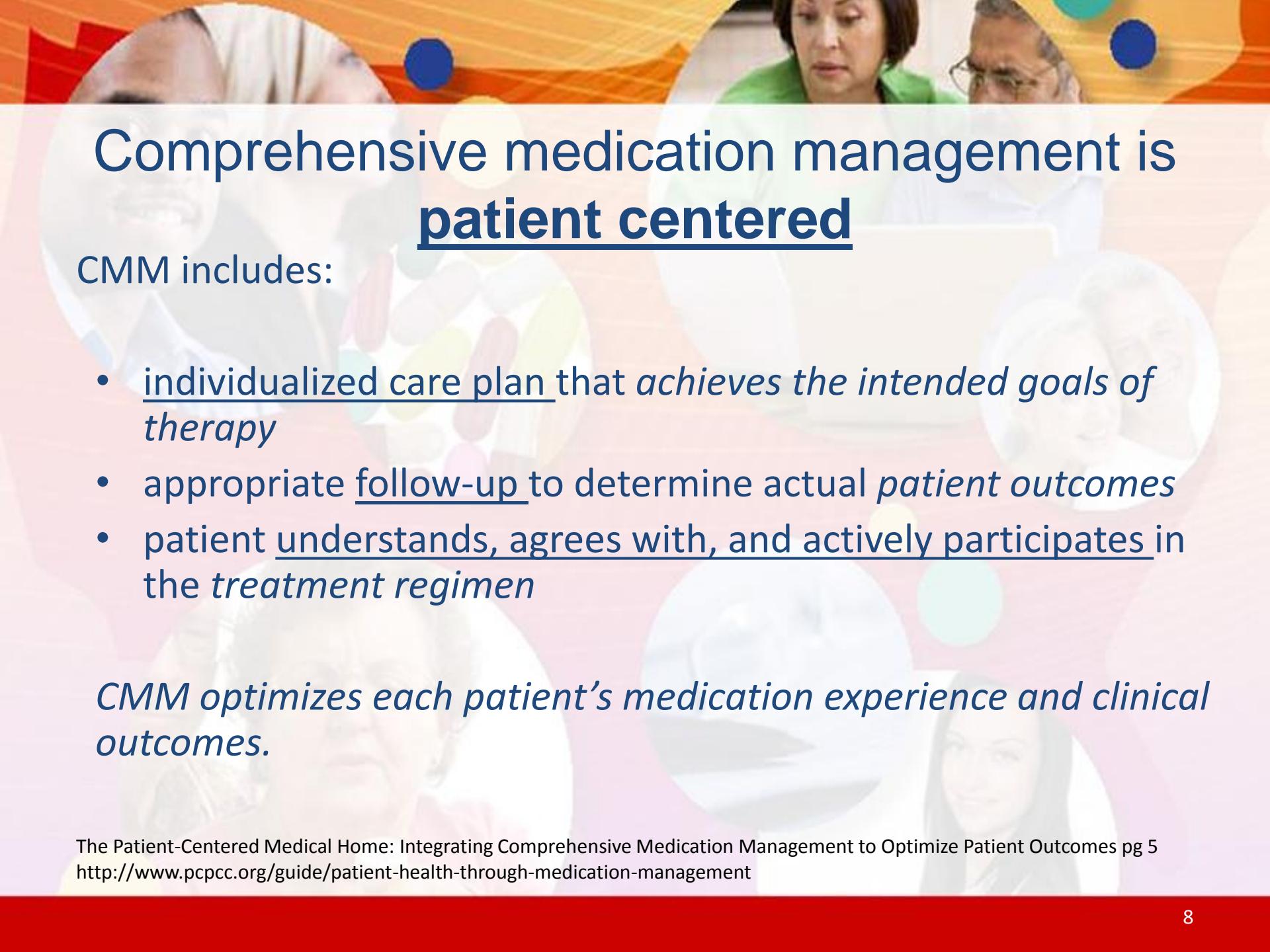


Comprehensive Medication Management is the standard of care

Ensures each patient's medications are individually assessed.

Assessment determines:

- medication is appropriate for the patient
- effective for the medical condition
- safe given the comorbidities and other medications being taken
- able to be taken by the patient as intended



Comprehensive medication management is patient centered

CMM includes:

- individualized care plan that *achieves the intended goals of therapy*
- appropriate follow-up to determine actual *patient outcomes*
- patient understands, agrees with, and actively participates in the *treatment regimen*

CMM optimizes each patient's medication experience and clinical outcomes.

Comprehensive Medication Management in the PCMH/ACO

Clinical Pharmacist/ Pharmacotherapy Manager

Medication experience revealed,
drug therapy problems identified,
therapeutic recommendations made



Clinical goals of therapy are
determined and medication
recommendations are considered

Patient



Patient understands her
medications and participates
in a care plan to improve health

Appropriate, Effective,
Safe, and Adherent
Medication Use!

Physicians/Providers – PCMH team

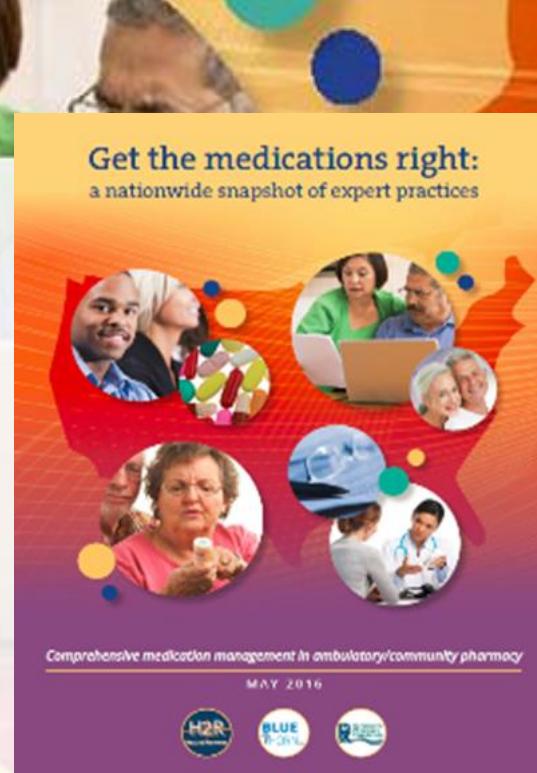


Common goals of therapy serve
to drive efficiencies and improve
effectiveness while decreasing costs

“Get the Medications Right”

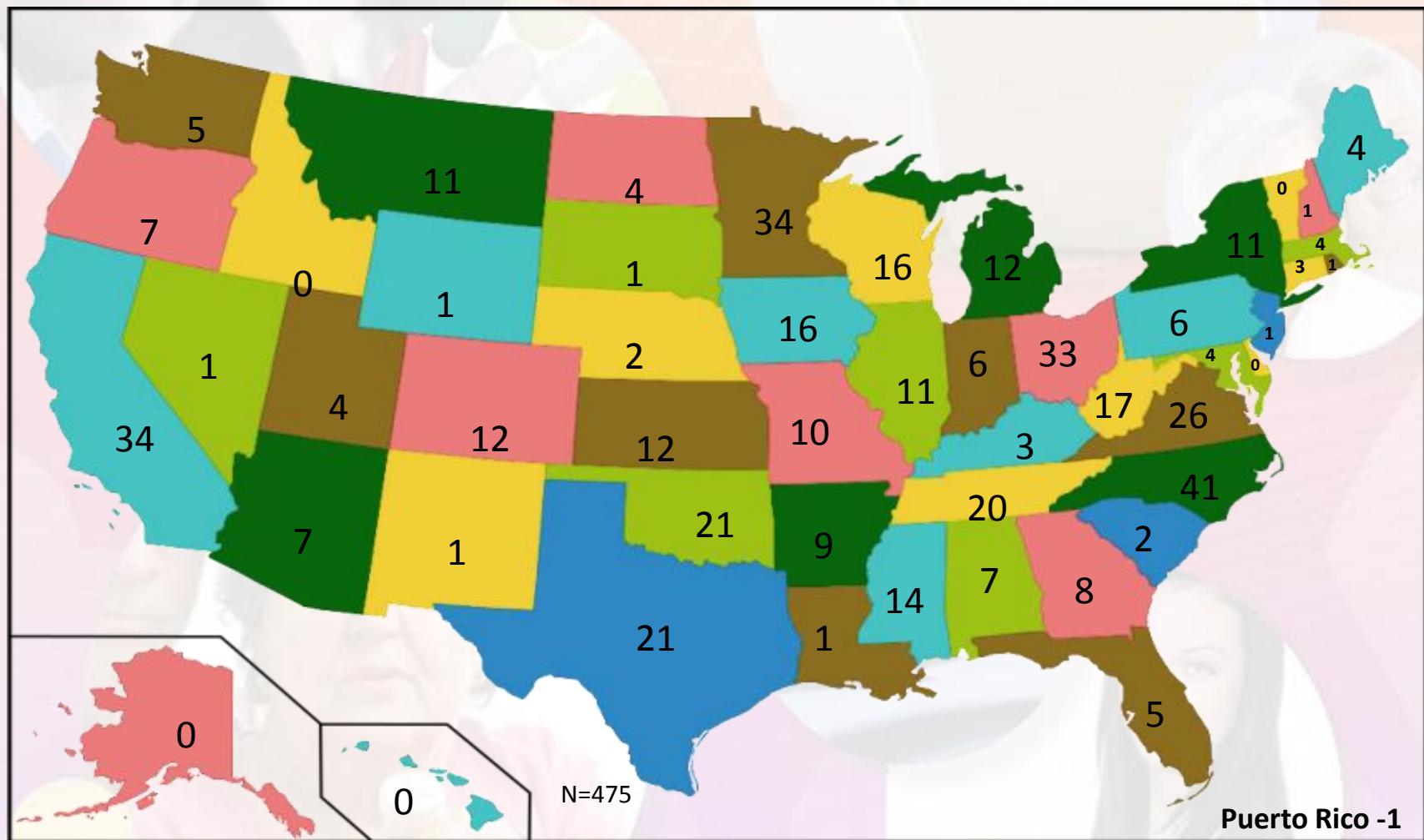
A nationwide snapshot of expert CMM practices:

- National Survey to identify high performing CMM practices in ambulatory/community settings
- Included 15 diverse practices that represented best-in-class CMM-level ambulatory/community service and integration into Accountable Care Organizations /Patient-centered Medical Homes/coordinated care teams
- Examined the enabling factors (and barriers to success) which inform best-in-class integration, engagement, and spread of these CMM services

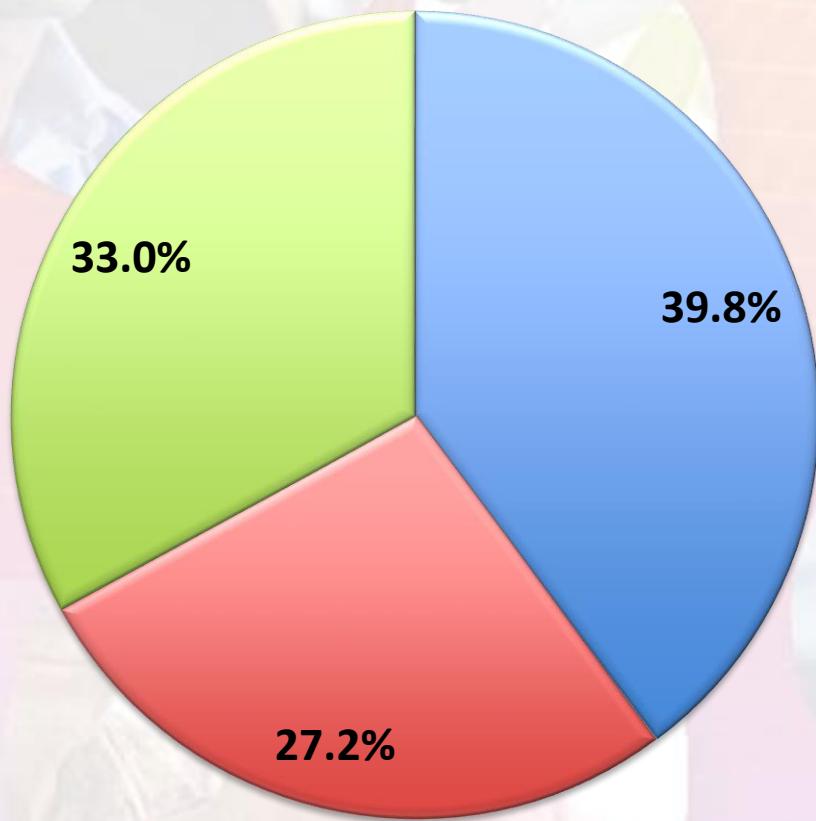


Finding: CMM is effective, replicable and scalable and will transform the role of pharmacists.

States represented by those who completed the MI-AMMP™ and gave geographic information



Q16: Do you deliver CMM services as part of your practice? (all complete responses)



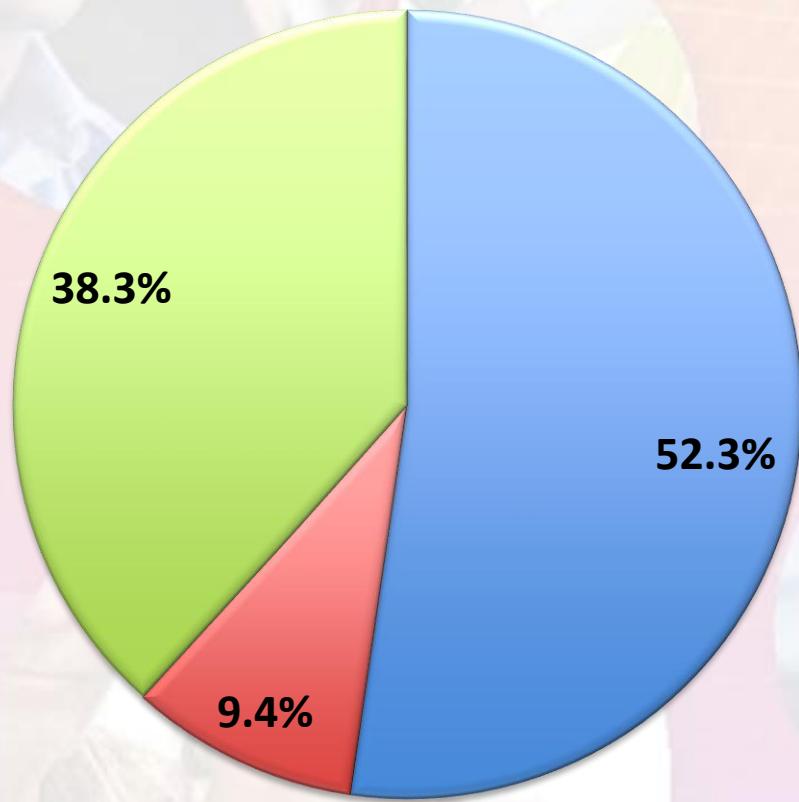
Complete responses,
N=470

Yes

No, we are delivering only
Part D MTM CMRs
currently (no DS MTM
services)

No. We are currently
delivering only disease
state (DS MTM) services
like diabetes, HTN, INR,
pain management, etc.
(This may also include
basic Part D CMRs.)

Q17: Do you plan to deliver CMM services in the next 12 months? (all complete responses) (branch logic answered from those delivering DS MTM)

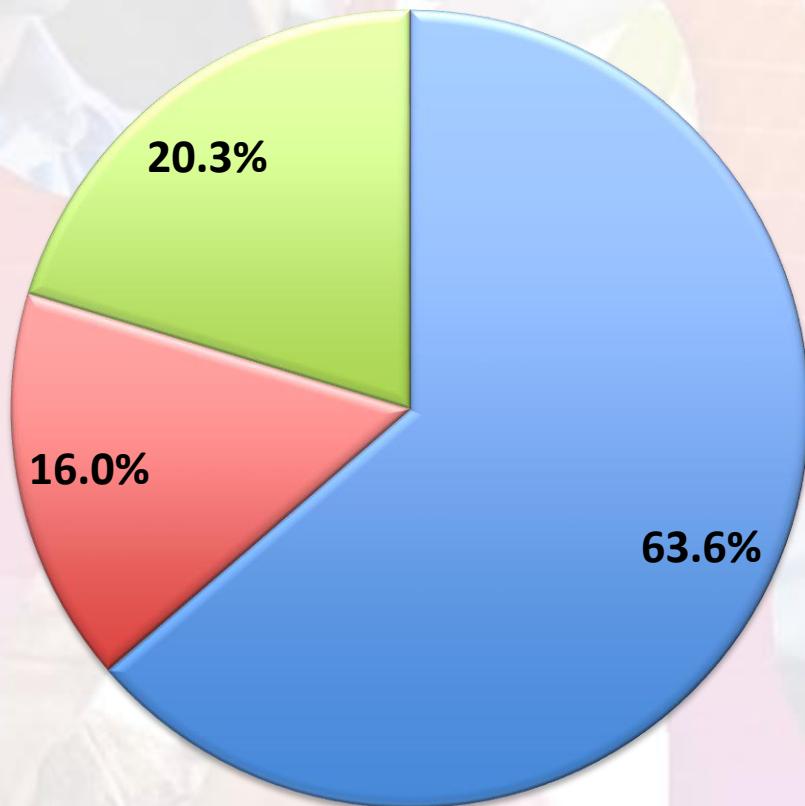


Complete responses,
N=128

- Yes; we are in the process of developing partnerships with physicians and payers and the infrastructure to support the practice.
- No, but we believe this is a priority and growth area for us as more providers recognize the value we bring. We are eager to see CPF and pharmacist organizations move to further support these clinical services
- No. We don't see this as relevant or a priority for us. The barriers are too great and Part D CMRs or DS MTM services are probably all we can support

Q18: Do you plan to deliver disease state MTMs and/or CMM services in the next 12 months?

(all complete responses) (branch logic from those only doing Part D CMRs (40%))



- Yes; we are in the process of developing partnerships with physicians and payers and the infrastructure to support the practice.
- No, but we believe this is a priority and growth area for us as more providers recognize the value we bring and we are eager to see CPF and pharmacist organizations move to further support these clinical services.
- No. We don't see this as relevant or a priority for us. The barriers are too great and Part D CMR services are probably all we can support.

Complete responses,
N=187



15 diverse practices highlighted in “Get the medications right: a nationwide snapshot of expert practices”

- Goodrich Pharmacy
- Desert Oasis
- HealthPartners
- North Memorial Health Care
- Spectrum Health
- Center for Healthy Hearts
- Eskenazi Health/Midtown Community Mental Health
- Fairview Pharmacy Services
- Hennepin County Medical Center
- Holyoke Health Center
- Middleton Memorial Veterans Hospital
- Ole Health
- RiverStone Health Clinic
- SinfoníaRx
- University of Minnesota Physicians

***CMM is no longer in its infancy –
the move to risk/value-based care is accelerating growth***



What We Found: CMM Improves Clinical Outcomes (Quality Metrics)

We launched a diabetes CMM pilot in 2009. The rate of poorly controlled diabetes dropped significantly, earning a five-star Medicare Advantage rating.- **Desert Oasis**

“We have found patients’ diabetes quality scores/goals are 14 percent higher when they participate in CMM/DS-MTM compared to those who have not met with the pharmacist.”- **North Memorial Health Care**

Published data includes the reduction in blood pressure as durable over the four-year study period, with a mean blood pressure control rate of 68%- exceeding the NCQA mean control rate of 57% for Medicaid- **Center for Healthy Hearts**

What We Found: CMM Pays Off Financially

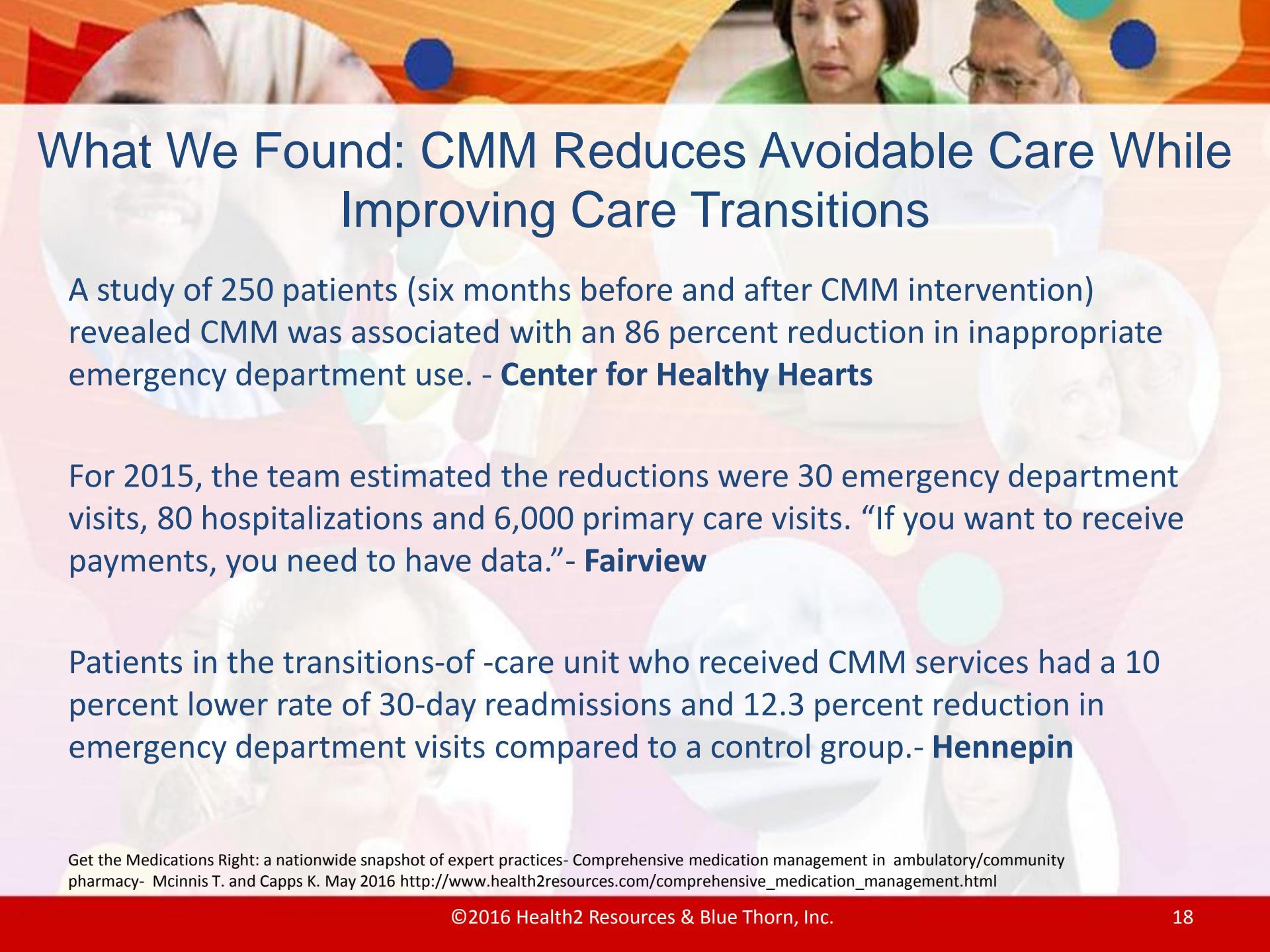
HealthPartners' robust financial analysis uncovered an 11:1 ROI for CMM; this led to the decision to expand it to the entire book of business. This analysis (one year pre/post CMM intervention) found reductions in emergency department visits and inpatient hospitalizations; drug costs remained flat. Those financial outcomes--on top of years of positive clinical outcomes and "rave reviews" from patients-- were "the icing on the cake."

– HealthPartners

"We're at full risk, and we are here because they are counting on us to do better patient management and reduce unnecessary utilization- which is the highest cost of all." - Desert Oasis

**Value-based care requires-
an Integrated Approach to Medication Management for
High-Risk Patient Care Optimization and Overall Cost Reductions**

Get the Medications Right: a nationwide snapshot of expert practices- Comprehensive medication management in ambulatory/community pharmacy- McInnis T. and Capps K. May 2016 http://www.health2resources.com/comprehensive_medication_management.html



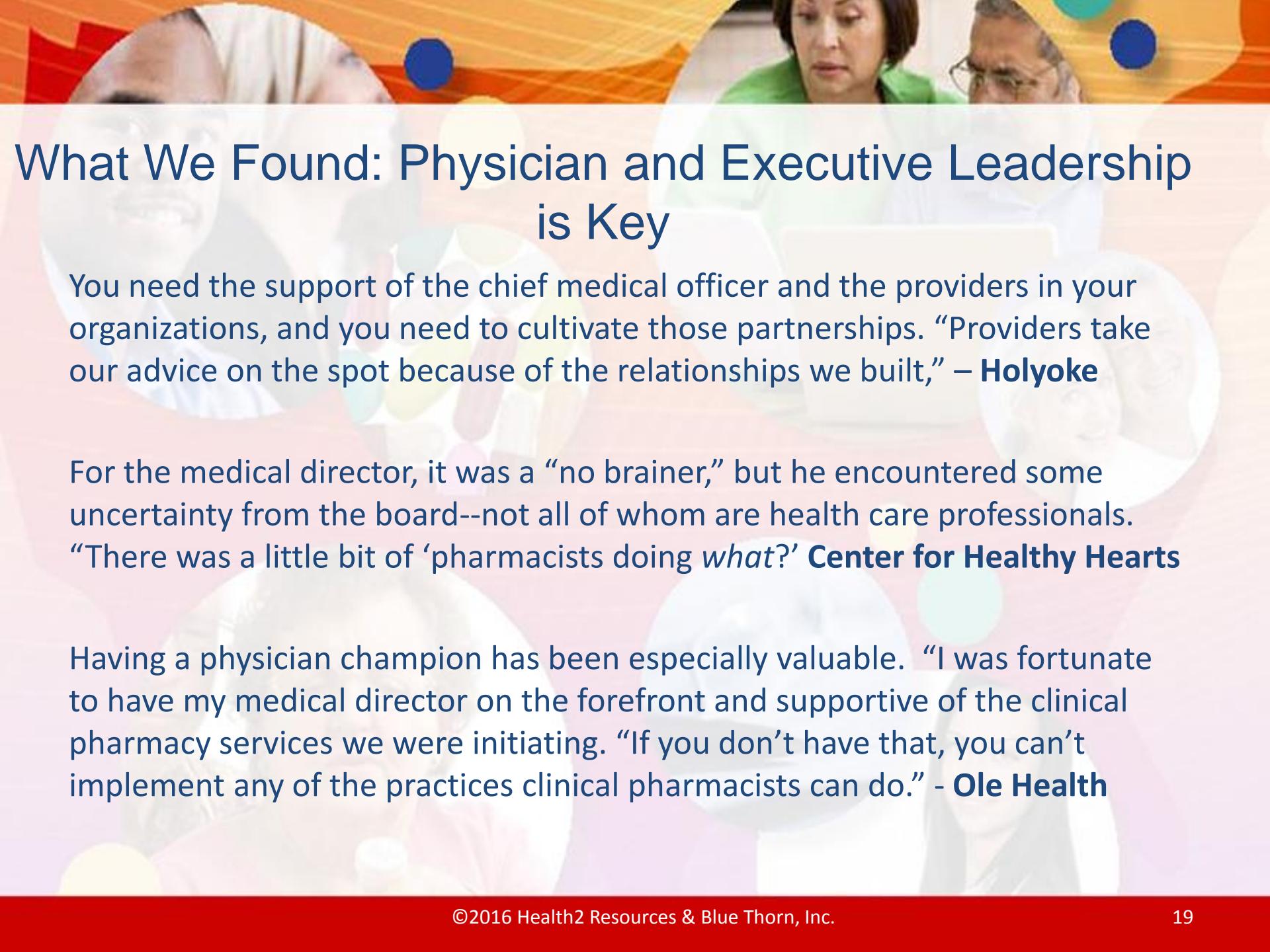
What We Found: CMM Reduces Avoidable Care While Improving Care Transitions

A study of 250 patients (six months before and after CMM intervention) revealed CMM was associated with an 86 percent reduction in inappropriate emergency department use. - **Center for Healthy Hearts**

For 2015, the team estimated the reductions were 30 emergency department visits, 80 hospitalizations and 6,000 primary care visits. “If you want to receive payments, you need to have data.”- **Fairview**

Patients in the transitions-of -care unit who received CMM services had a 10 percent lower rate of 30-day readmissions and 12.3 percent reduction in emergency department visits compared to a control group.- **Hennepin**

Get the Medications Right: a nationwide snapshot of expert practices- Comprehensive medication management in ambulatory/community pharmacy- Mcinnis T. and Capps K. May 2016 http://www.health2resources.com/comprehensive_medication_management.html



What We Found: Physician and Executive Leadership is Key

You need the support of the chief medical officer and the providers in your organizations, and you need to cultivate those partnerships. “Providers take our advice on the spot because of the relationships we built,” – **Holyoke**

For the medical director, it was a “no brainer,” but he encountered some uncertainty from the board--not all of whom are health care professionals. “There was a little bit of ‘pharmacists doing what?’ **Center for Healthy Hearts**

Having a physician champion has been especially valuable. “I was fortunate to have my medical director on the forefront and supportive of the clinical pharmacy services we were initiating. “If you don’t have that, you can’t implement any of the practices clinical pharmacists can do.” - **Ole Health**



What We Found: Improves Patient Access and Addresses Physician Workforce Shortage

Being in a primary care shortage area bolsters physician acceptance. Pharmacists work with patients who have chronic conditions--patients who can take up a lot of time. Broadly written collaborative practice agreements, allow pharmacists to adjust medications 95 percent of the time without further physician involvement- greatly enhancing efficiency of the services and physician time.

“Our PCPs are very supportive of pharmacist activities.” - Desert Oasis

CMM services contributed to an astounding 27 percent reduction in primary care workload. This integration of pharmacists into primary care led to significantly opening access in primary care provider schedules. Pharmacists were able to manage the chronic disease patients, leaving appointment spots open for PCPs to see more patients with acute or diagnostic needs. **-WS Middleton Memorial VA**

Increasing Access to Primary Care with Pharmacists a “Gold Status Practice.” **As a result, the VA will be standardizing a ratio of one pharmacist to every three primary care providers across the entire system.**

Get the Medications Right: a nationwide snapshot of expert practices- Comprehensive medication management in ambulatory/community pharmacy- McInnis T. and Capps K. May 2016 http://www.health2resources.com/comprehensive_medication_management.html



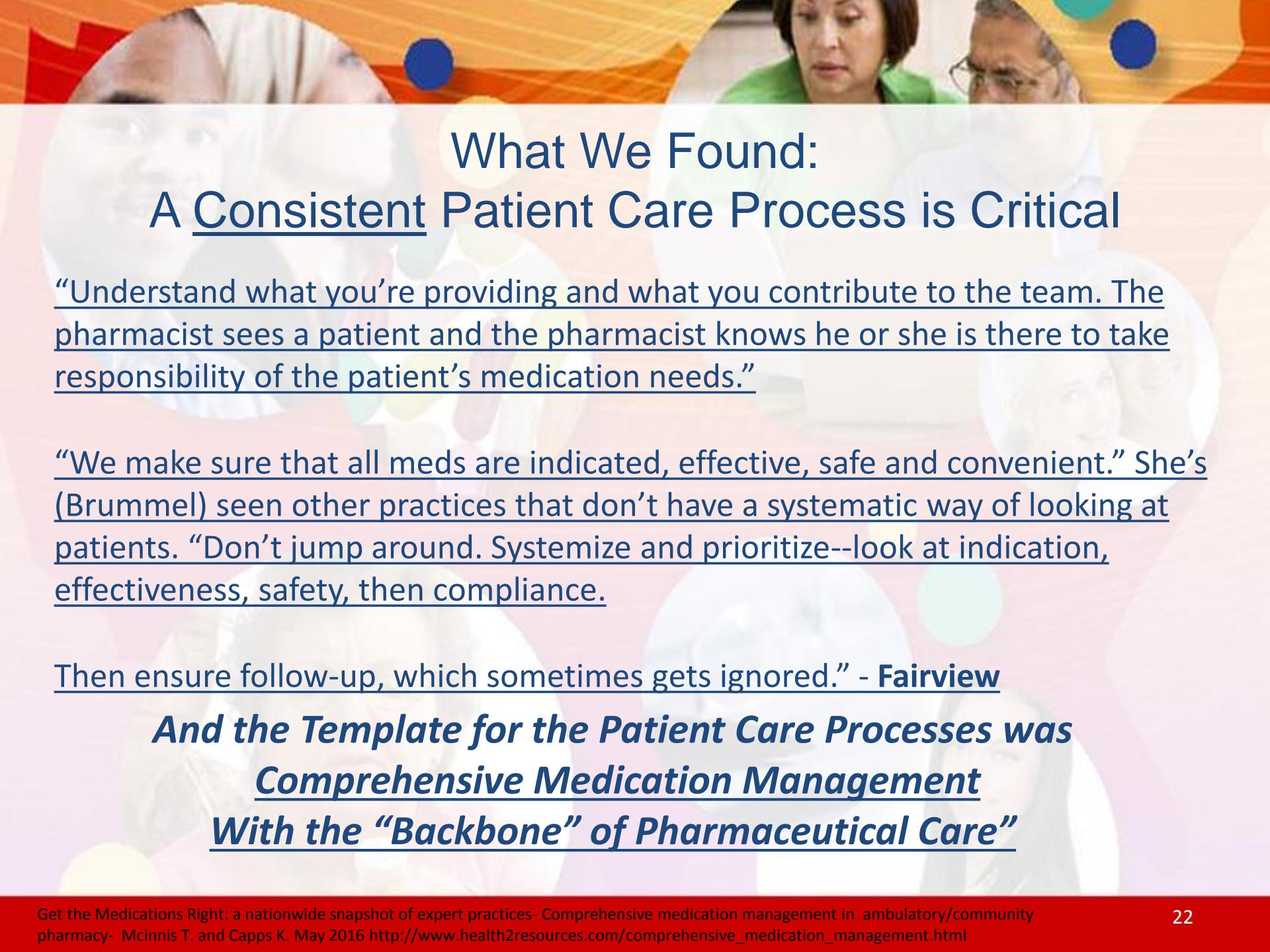
What We Found: A Consistent Patient Care Process is Critical

“You can’t move back and forth between the counter and the exam room. You have to provide undivided attention to your patient and, at the same time, you can’t shortchange order fulfillment workflow; careful scheduling is a must,” - **Goodrich**

Have a consistent pharmacy practice philosophy, “**and that practice philosophy should be CMM.**” Saying you offer medication management “can mean nothing, or it can mean 50 different things.” - **HealthPartners**

“The PCPCC’s resource guide, *Integrating Comprehensive Medication Management to Optimize Patient Outcomes*, serves as a template for CMM services in the context of a patient-centered medical home.” - **Spectrum Health**

“It really goes back to the **CMM model and having a core practice foundation underneath that.**” With 31 sites, each could be delivering a different level and type of care; that would be chaos. **Having the core practice model is critical.**” - **Fairview**



What We Found: A Consistent Patient Care Process is Critical

"Understand what you're providing and what you contribute to the team. The pharmacist sees a patient and the pharmacist knows he or she is there to take responsibility of the patient's medication needs."

"We make sure that all meds are indicated, effective, safe and convenient." She's (Brummel) seen other practices that don't have a systematic way of looking at patients. "Don't jump around. Systemize and prioritize--look at indication, effectiveness, safety, then compliance.

Then ensure follow-up, which sometimes gets ignored." - Fairview

***And the Template for the Patient Care Processes was
Comprehensive Medication Management
With the "Backbone" of Pharmaceutical Care"***



What We Found: Providers Love It

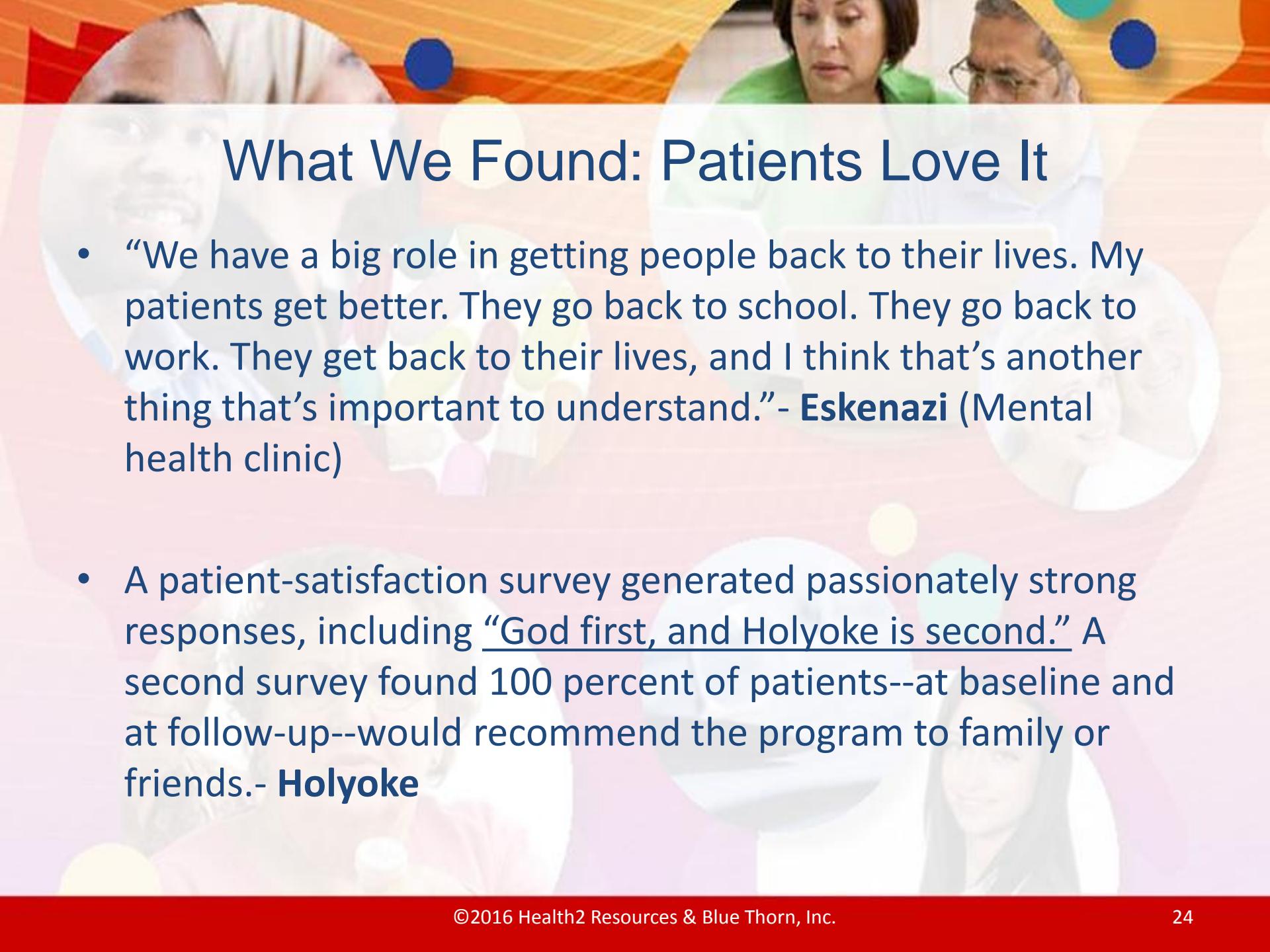
"I can't believe you guys. You would think that I'd be getting used to it by now. [...] The nurses love you guys. The PCPs do, too. "--Jean Montgomery, MD

- WS Middleton Memorial VA

"Basically everyone on the team is functioning at a higher level with pharmacy involvement. [Our pharmacist] brings us the data and we decide which areas to hit when. It's been super helpful in assisting me to identify where the biggest problem areas are for my team."--Erinn Mullan, NP

-WS Middleton Memorial VA

100 percent of providers surveyed agreed or strongly agreed that clinical pharmacy services improved patient care. "Pharmacist services are an essential part of improving outcomes. We see patients every day who are not on the best regimen." - **Riverstone Health Clinic**



What We Found: Patients Love It

- “We have a big role in getting people back to their lives. My patients get better. They go back to school. They go back to work. They get back to their lives, and I think that’s another thing that’s important to understand.”- **Eskenazi** (Mental health clinic)
- A patient-satisfaction survey generated passionately strong responses, including “God first, and Holyoke is second.” A second survey found 100 percent of patients--at baseline and at follow-up--would recommend the program to family or friends.- **Holyoke**



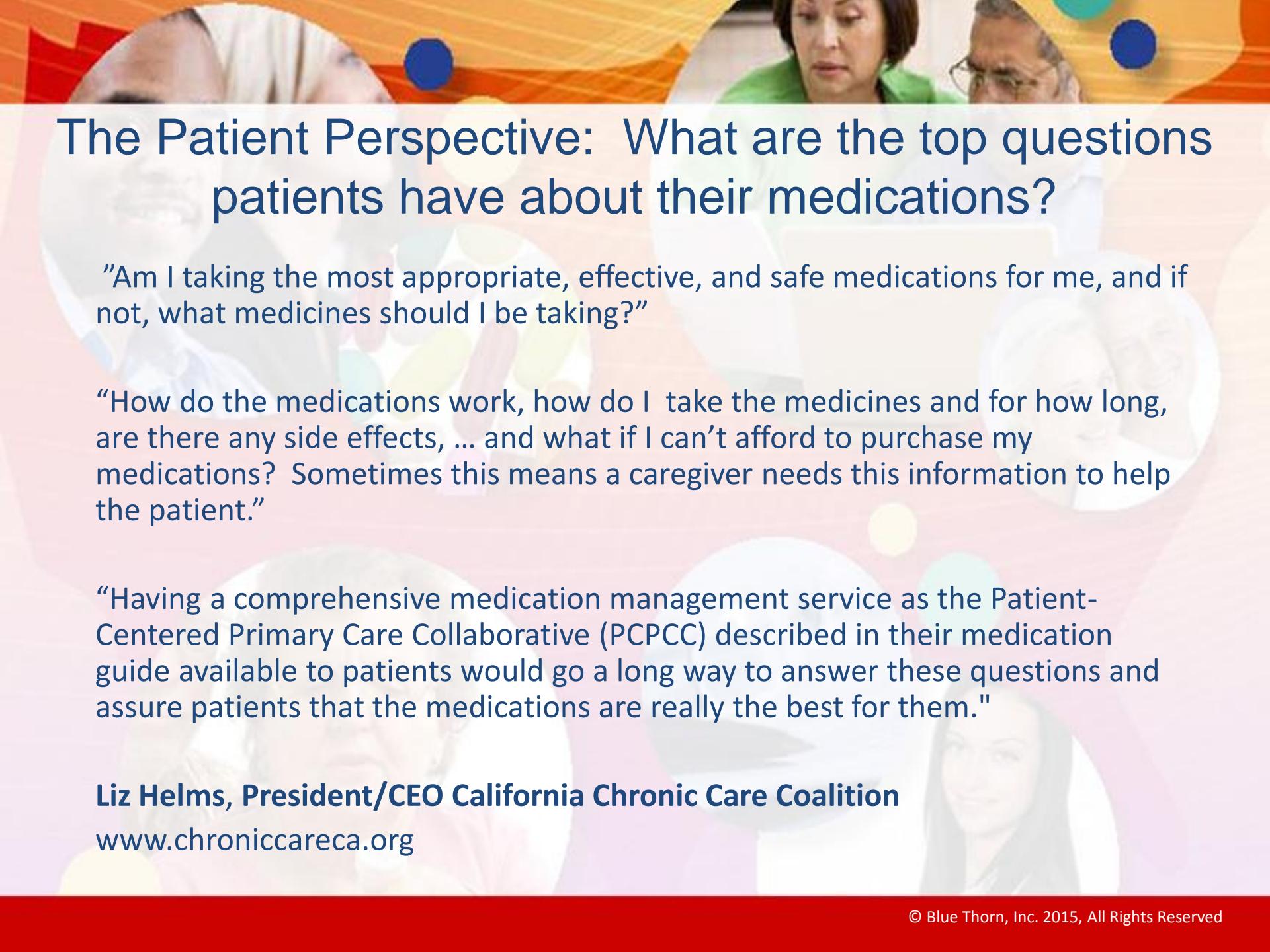
What We Found: Patients Love It

- She sent patient satisfaction surveys to everyone who had a CMM appointment; the responses were overwhelmingly positive. She also began to see more patients from word-of-mouth. “I asked the patients how they heard about us and they said ‘my friend Judy told me’ or ‘my Uncle John said you have to come here.’ I realized people were finding a lot of value in this service.” - **North Memorial**
- “Once we get the patients in, they love the service. By the time they leave, they are happy,” - **Spectrum Health**
- “CMM empowers them to make those decisions (*about their medications*); that’s extremely important. There are a lot of concerns that patients with mental illnesses can’t do that. They can.” - **Eskenazi**



What We Found: It Works

- CMM is no longer in its infancy- the move to risk/value-based care is accelerating growth
- Team-based collaborative practice with strong physician and C-suite leadership is necessary for successful adoption and spread
- CMM services can address the primary care workforce shortage and some specialty shortages by increasing access to care
- CMM significantly improves clinical outcomes and is a key patient engagement strategy
- Population health strategies to target the most complex cases delivers more robust ROI's with lower health care utilization and costs
- CMM maximizes the training and skill of clinical pharmacists
- **Patients** and **providers** are extremely satisfied with CMM services



The Patient Perspective: What are the top questions patients have about their medications?

"Am I taking the most appropriate, effective, and safe medications for me, and if not, what medicines should I be taking?"

"How do the medications work, how do I take the medicines and for how long, are there any side effects, ... and what if I can't afford to purchase my medications? Sometimes this means a caregiver needs this information to help the patient."

"Having a comprehensive medication management service as the Patient-Centered Primary Care Collaborative (PCPCC) described in their medication guide available to patients would go a long way to answer these questions and assure patients that the medications are really the best for them."

Liz Helms, President/CEO California Chronic Care Coalition

www.chroniccareca.org



Patient Advocacy - Policy Top Priorities

Common Issues- 3 Pillars (AAA)

- Access to care
 - Includes medical, social, and behavioral services/products/medications
 - Delivery system and financial alignment in place to support care
- Affordability of care
 - Patient ability to pay for the care/medications received
- Appropriate care
 - Evidence- based medical care
 - Medication use that is effective/safe- Comprehensive Medication Management integration

Move from “Adherence “ to “Appropriate Use” Messaging



PAL Priority - CMM Appropriate Use of Medications- Roadmap to Success

- Make this a priority for your individual organizations
- Work Together
- Find Champions and Support education
 - KOL's- Pharmacist, physician leaders, and patient advocates
 - CA CMM Whitepaper
- Educate and Reach out to others- medical societies, integrated delivery systems, health plans, government, pharmacist organizations, pharmaceutical industry, employers



PAL Policy Priority- CMM Appropriate Use of Medications- Roadmap to Success

- Write and support CMM legislation-
 - Develop strategy for support from key legislators, influencers, government agencies- use your KOL's!
 - Use the PCPCC Guide and the “Get the Medications Right” report as cornerstone references for stakeholders to agree on the definition of CMM and how to implement the services!
 - Why? It requires that services be patient-centered, collaborative, and based on optimizing clinical/patient outcomes
 - Include CMM service provisions for high-risk populations not only in Medicaid, but for state employees, teachers, etc.
 - i.e.- CA Chronic Care Coalition- support for Medi-Cal legislation 2016-17
- Take it to the Nation- support Federal and other State Initiatives through your advocacy groups

Download the report, forecast brief and issue brief by visiting www.health2resources.com

Get the medications right:
a nationwide snapshot of expert practices

Comprehensive medication management in ambulatory/community pharmacy

MAY 2016

H2R
BLUE THORN

PrimaryCare Learning Network™

2016 Health Care Value Forecast:
Payers, purchasers and providers

Get the medications right: Comprehensive medication management and the role of the pharmacist in patient care

FEATURING
Terry McInnis, MD, MPH, FACP, FACP
President, BlueThorn Inc.

Katherine Herring Capps,
President, Health2 Resources

Get the medications right:
a dozen lessons

Health2 Resources Issue Brief

The pharmacist's role is changing, and a new report from Health2 Resources and BlueThorn Inc., *Get the medications right: a nationwide snapshot of expert practices—Comprehensive medication management in ambulatory and community pharmacies*, details this change. It offers a glimpse of how pharmacists, as both medication experts and clinicians, are optimizing medication use and making an impact on the practices and communities they serve.

Terry McInnis, MD, MPH, FACP, FACP, president of BlueThorn Inc., served as principal investigator. Katherine H. Capps, president of Health2 Resources, was project director.

Comprehensive medication management (CMM), a whole patient intervention, seeks to optimize outcomes through the effective and appropriate use of medications. These efforts focus on the patient and the clinical and personal goals of therapy as a baseline for interventions.

CMM defined: "The standard of care that ensures each patient's medications (whether they are prescription, nonprescription, alternative, nutritional, vitamins, or nutritional supplements) are safe, effective, and appropriate to determine that each medication is appropriate for the patient, effective for the medical condition, safe given the comorbidities and other medications being taken, and able to be taken by the patient as intended."

—McInnis T, White E, and Strand L. *The Patient-Centered Medical Home: Integrating Comprehensive Medication Management to Optimize Patient Outcomes*. Patient-Centered Primary Care Collaborative; June 2012

Based on survey¹ responses from more than 600 pharmacist practitioners and program directors. Get the medications right offers an on the ground perspective about delivering CMM services collaboratively in team based care. It also

¹ In total, 98 individual program managers started and 418 completed the initial practice evaluation instrument—the McInnis Index for Advanced Medication Management Practice (AMMP™). From those that completed the survey, 93% of respondents said their practices had adequate processes in place for CMM.

Thank You! Resources-

To contact Terry McInnis MD MPH, CEO and President Blue Thorn, Inc

cell- 864-918-9998 tamcinnis@bluethorninc.com www.bluethorninc.com

Get the Medications Right: a nationwide snapshot of expert practices- Comprehensive medication management in ambulatory/community pharmacy- May 2016- McInnis T. and Capps K. http://www.health2resources.com/comprehensive_medication_management.html

Issue Brief- Get the medications right: a dozen lessons- T. McInnis Jun 2016 http://www.health2resources.com/CMM_issue_brief.html

2016 Health Care Value Forecast: Payers, purchasers and providers- Get the medications right- McInnis T. and Capps K-
http://0101.nccdn.net/1_5/24e/168/1d8/CPF-Forecast-brief-final.pdf

Comprehensive Medication Management Programs: Description, Impacts, and Status in Southern California, 2015 white paper-

<http://www.cdph.ca.gov/programs/cdcb/Documents/CMMWhitePaperCDPH2015Dec23FINALrev.pdf>

Science <http://www.sciencedirect.com/science/article/pii/S1551741116000504>

Full text- <http://www.rsap.org/article/S1551-7411%2816%2900050-4/fulltext>

PCPCC Resource Guide- Integrating Comprehensive Medication Management to Optimize Patient Outcomes 2012

<http://www.pcpcc.org/guide/patient-health-through-medication-management>

“Medication Underuse: The Most Underappreciated Quality-of-Care Gap” – March 2015

<http://www.pharmacytimes.com/publications/Directions-in-Pharmacy/2015/March2015/Medication-Underuse-The-Most-Underappreciated-Quality-of-Care>

Reductions in Medication-Related Hospitalizations in Older Adults with Medication Management by Hospital and Community Pharmacists: A Quasi-Experimental Study- K Pellegrin, T. McInnis, et al, JAGS Oct 2016, <http://onlinelibrary.wiley.com/doi/10.1111/jgs.14518/epdf>

Disclosures: Blue Thorn Inc. CEO and President Dr. Terry McInnis consults with many professional organizations, medical societies, pharmaceutical companies, academia, patient advocacy groups, consulting firms, government, and solution partners including one or more that may be in this presentation.