

Population Health Management

VOLUME 19

SUPPLEMENT 2

SEPTEMBER 2016

IMPROVING HEALTH OUTCOMES FOR PATIENTS WITH DEPRESSION: A POPULATION HEALTH IMPERATIVE. REPORT ON AN EXPERT PANEL MEETING

Janice L. Clarke, RN, Alexis Skoufalos, EdD, Alice Medalia, PhD, and A. Mark Fendrick, MD

Editorial: A Call to Action: <i>David B. Nash, MD, MBA</i>	S-2
Overview: Depression and the Population Health Imperative	S-3
Promoting Awareness of the Issues and Opportunities for Improvement	S-5
Cognitive Dysfunction in Affective Disorders	S-5
Critical Role of Employers in Improving Health Outcomes for Employees with Depression	S-6
Closing the Behavioral Health Professional and Process Gaps	S-6
Achieving the Triple Aim for Patients with Depressive Disorders	S-6
Improving the Experience of Care for Patients with Depression	S-6
Improving Quality of Care and Health Outcomes for Patients with Depression	S-7
Changing the Cost of Care Discussion from <i>How Much</i> to <i>How Well</i>	S-8
Panel Insights and Recommendations	S-9
Conclusion	S-10

Population Health Management Supplement Policy

Population Health Management publishes supplements that (a) discuss new technologies, theories, and/or practice, and (b) serve as enduring materials to disseminate information from conferences and special meetings. Supplements that discuss new technologies, theories, and/or practices are subject to peer review.

Acknowledgment

The expert panel meeting and supplement were supported by Takeda Pharmaceuticals, USA, Inc. and Lundbeck, LLC. Takeda Pharmaceuticals and Lundbeck were not involved in the preparation of the manuscript. The content and opinions expressed herein are solely those of the expert participants.

Improving Health Outcomes for Patients with Depression: A Population Health Imperative. Report on an Expert Panel Meeting

Janice L. Clarke, RN,¹ Alexis Skoufalos, EdD,¹ Alice Medalia, PhD,² and A. Mark Fendrick, MD³

Editorial

A Call to Action

David B. Nash, MD, MBA

Our knowledge of physical ailments is growing exponentially and innovative treatments continue to advance at breakneck speed. In comparison, behavioral health disorders seem to be shrouded in mystery; the science is still evolving and commonly prescribed treatments are often ineffective. This is the case even though mental disorders now top the list of the most costly conditions in the United States.¹

As an internist, I'm aware that some of my patients with chronic conditions also have symptoms of depression. Nevertheless, I was astonished to learn that up to one-quarter of primary care office visits involve depression and that, despite a lack of appropriate training, primary care providers deliver half of all behavioral health services in the United States. Given the dearth of behavioral health specialists – especially in non-urban areas – this should not have come as such a surprise.

A closer inspection of our health care system reveals that the historical separation of physical and behavioral health care compromises care and intensifies problems for patients with serious mental illness in several ways:

- Separate facilities and locations for physical and behavioral health care impede easy access to treatment.
- Separate funding streams for physical and behavioral health services create financial barriers to appropriate care.
- Difficulty in sharing information and expertise across the separate systems hinders effective care coordination.
- The tendency of clinicians to focus on specific physical or behavioral symptoms and disorders rather than on the person experiencing the problem leads to suboptimal outcomes.²

With health reforms taking effect, the health system is evolving in positive ways. First, we are beginning a slow but deliberate transformation from segregated to integrated behavioral health services. Secondly, we are entering a new era in which “value” will supplant volume and the conversation is shifting from *how much* we spend to *how well* we spend resources for these services.

As a discipline, population health is at the confluence of changes that are taking place across the health care landscape. Holistic by nature, it recognizes and incorporates social and environmental factors that have a profound effect on overall health and well-being. A population framework seems an ideal vehicle for optimizing the care of patients and understanding where behavioral health fits in the broader context of the Triple Aim.

This will not be an easy task. It will take focused, well-coordinated efforts; for example:

- Long-term institutional care issues must be resolved.
- The National Academy of Medicine (formerly the Institute of Medicine) must develop and adopt measures focused on health outcomes in addition to processes.
- The behavioral health community must become a more active agent of positive change.

The expert panel meeting on which this supplement is based left me with no doubt that a new call to action is imperative. The time is right for all stakeholders – consumers, the health care industry, and legislators – to act and put forward a new agenda for behavioral health and an integrated vision of the US health care system.

Introduction

Today, millions of Americans are diagnosed with major depressive disorder, a condition that seriously impairs functional ability and frequently compromises physical health. The burden of this pervasive illness is high and the

¹Jefferson College of Population Health, Philadelphia, PA

²Columbia University, New York, NY

³University of Michigan, Center for Value-Based Design, Ann Arbor, MI

associated consequences have a negative impact, not only for patients, but also their family members, employers, and communities.

Progress toward full implementation of the Affordable Care Act (ACA) has served as the impetus for transformative change across the US health care system. Once segregated and subjected to carve-outs and benefit limitations, behavioral health (BH) services are being integrated into the full continuum of care. Now that their organizations are held accountable for reducing costs, increasing access, and improving health outcomes, health system leaders are working to better understand the needs of the patient populations they serve. Although there are high expectations for improvement in clinical outcomes, new delivery paradigms such as Accountable Care Organizations (ACOs) and patient-centered medical homes (PCMHs) are typically ill-equipped to provide BH services.

The quality of all health care is impacted by systemic issues, and all stakeholders must be positioned to share information and resources to serve the populations for whom they are responsible and accountable. Understanding the various issues and challenges from diverse perspectives—patients and patient advocates, physical and mental health professionals, community service agencies, payers, policy makers—is key to developing an effective strategy for improving the US mental health system model.

On November 3, 2015, the Jefferson College of Population Health, Takeda Pharmaceuticals, and Lundbeck LLC convened a multidisciplinary expert panel (Table 1) to explore the critical issues and articulate potential solutions for improving individual patient and population health outcomes for depressive disorders. The following report synthesizes the panelists' presentations, discussions, and recommendations. Critical issues and value-based solutions are listed in Table 2.

Overview: Depression and the Population Health Imperative

The World Health Organization recognizes major depression as the leading cause of disability globally and ranks it fourth among the leading causes of global disease burden.³

The impact of this reality on societies is profound; productive years lost to disability from depression are 3 times greater than from diabetes, 8 times greater than from heart disease, and 40 times greater than from cancer.⁴

Mental illness is a major driver of health care costs in the United States, where 1 in 4 people struggle with a BH or substance abuse problem at some point in their lives.⁵ Virtually no family is untouched.

Approximately 14.8 million Americans live with major depression, and a closer look at its prevalence reveals an especially disturbing picture:

- It is the leading BH diagnosis in the United States⁶ and is relatively common in primary care settings where it occurs in approximately 10% of patients.⁷
- It is very expensive, evidenced by 50%-100% higher direct health care costs and indirect costs related to lost productivity.⁸
- It is deadly, accounting for more than 30,000 suicides per year.⁹

TABLE 1. PANEL PARTICIPANTS (* = PRESENTER)

Martin D. Cheattle, PhD Director, Behavioral Medicine, PENN Pain Medicine Center Director, Pain and Chemical Dependency Research at the Center for Studies of Addiction University of Pennsylvania Philadelphia, PA
A. Mark Fendrick, MD * (Topic: Reducing the Per Capita Cost of Care) Professor of Internal Medicine, School of Medicine Professor of Health Management and Policy, School of Public Health University of Michigan Ann Arbor, MI
Susan B. Frampton, PhD * (Topic: Health Reform – Patient and Family Perspective) President, Planetree Derby, CT
Lynne R. Kornblatt, LLM, JD, RN Chief Human Resources Officer Einstein Healthcare Network Philadelphia, PA
Alice Medalia, PhD * (Topic: Cognitive Deficit in Affective Disorders) Clinical Director of Cognitive Health Services, New York State Office of Mental Health Professor of Medical Psychology, Department of Psychiatry and Director of Psychiatric Rehabilitation Services, Columbia University New York, NY
Garrett E. Moran, PhD * (Topic: Critical Issues and Quality Gaps) Vice President and Associate Director, Westat, Inc. Director, Academy for the Integration of Behavioral Health and Primary Care, Agency for Healthcare Research and Quality Rockville, MD
David W. Oslin, MD * (Topic: Innovative Approaches-Collaborative Care) Professor of Psychiatry Corporal Michael J. Crescenz Veterans Affairs Medical Center and the University of Pennsylvania Philadelphia, PA
Stephen J. Paolucci, MD Chief Medical Officer, Geisinger Bloomsburg Hospital Chairman of Psychiatry, Geisinger Medical Center Danville, PA
Barry W. Rovner, MD Professor of Psychiatry, Neurology and Ophthalmology Thomas Jefferson University Philadelphia, PA
Byron C. Scott, MD, MBA * (Topic: Employer Perspective) Associate Chief Medical Officer Truven Health Analytics Chicago, IL
Michael J. Vergare, MD Senior Vice President of Academic Affairs Thomas Jefferson University Philadelphia, PA

TABLE 2. CRITICAL ISSUES AND POTENTIAL SOLUTIONS

<i>Critical Issues</i>	<i>Potential Solutions</i>
<u>Fragmentation</u> General fragmentation in clinical systems and care delivery settings Separate reimbursement structures for physical and behavioral health (BH) services Separation of physical and BH services and claims by health insurers	<u>Integration</u> Multistakeholder approaches Integrated care delivery systems Value-based health insurance designs
<u>Knowledge Gaps</u> BH clinical knowledge and process gaps, particularly among primary care providers (PCPs) Lack of understanding of BH among employers Lack of patient/family understanding of BH conditions and involvement in care decisions	<u>Education</u> Assure that PCPs receive strong foundation courses in BH (eg, screening for depression and cognition problems) Educate employers to recognize signs of depression in employees and provide services when needed Educate patients, their families and caregivers about BH conditions and treatment alternatives
<u>Barriers to patient access</u> Insufficient BH specialty providers Inadequate distribution of BH specialists	<u>Accessibility</u> Increase the number and broaden the distribution of BH specialty clinicians

Untreated or inadequately treated BH conditions are major drivers of suicide. In 2011 alone, US statistics reveal that there was 1 suicide every 14 minutes; this translates to 41,149 deaths – more deaths than from homicides or motor vehicle accidents.¹⁰ A large percentage of suicides are associated with people suffering from a combination of chronic pain and depression. Clearly, these tragedies might be prevented by better access to the right care at the right time. However, despite major scientific breakthroughs, technological and therapeutic advances and steady improvement in the quality of care for physical health problems, care for BH disorders in the United States continues to be shockingly inadequate. Several complex, interrelated issues raise serious concerns:

Provider-related issues

Sixty percent of individuals suffering with BH conditions receive no care at all and, of those who do receive care, only 20% are seen by a trained mental health professional. In fact, two thirds of primary care providers (PCPs) report poor access to referrals for BH services (including psychotherapy, cognitive behavior therapy or individual/group/family counseling) for their patients.

- *Typical Care Setting* - Most patients receive BH treatment in primary care settings. Although PCPs deliver up to half of all BH services in the United States,¹¹ most lack the appropriate training and diagnostic expertise to recognize and/or effectively treat comorbid BH problems.¹² Consequently, they deliver even minimally adequate BH care only 12.7% of the time¹³; and of the 30 million patients who receive a prescription for a psychiatric medication in a primary care setting, only 25% improve.¹²
- *Current Outcomes of Care* - The evidence shows that “usual care” for depression is woefully ineffective. Research findings reveal that treatment response rates

range from 26%-63% and remission rates range from 11%-47%.^{14,15,16} Under clinical trial conditions, 55%-65% of patients showed improvement with an average of 12.7 psychotherapy sessions; however, a study conducted under real-world conditions revealed that 30% of patients stop treatment after the first session, 15%-25% “improve” and only 5%-10% “recover”¹⁷ (Table 3).

- *Supply of BH Professionals* - A significant barrier to access exists because of a dire shortage of BH professionals; nation-wide, there is only 51% of the needed

TABLE 3. HOW EFFECTIVE IS “USUAL CARE” FOR DEPRESSION?

<i>Population</i>	<i>Response rate (%)</i>	<i>Remission rate (%)</i>
Research Studies		
Clinical trials (antidepressant efficacy studies) (Thase ME, et al, <i>J Clin Psych</i> 2005;66:974–981)	63%	47%
STAR-D: initial treatment (effectiveness study) (Trivedi et al, <i>Am J Psychiatry</i> 2006;163:28–40)	47%	33%
Real World		
Private practice psychiatry (Katzelnick D et al, <i>Psych Services</i> 2011;62:929–935)	36%	18%
Public sector mental health outpatients (Rush AJ et al, <i>Biol Psych</i> 2004;56:46–53)	26%	11%

STAR-D=sequenced treatment alternatives to relieve depression.

capacity.¹⁸ BH professionals are generally concentrated in large urban areas, and more than half of the counties in the U.S. do not have a single practicing BH professional.¹⁹ Also, far too many BH professionals are not available to patients covered under Medicare or Medicaid insurance largely because of low reimbursement rates. Typically, any access for these patients is limited to inexperienced and/or poorly trained providers, further compromising their ability to receive appropriate care. Conventional wisdom holds that only the very wealthy or the very poor can afford BH.

People with serious mental illnesses tend to die many years younger than their counterparts without these conditions. Because the interface between physical health care providers and BH specialists is generally weak, patients with comorbid chronic health problems often receive inadequate treatment.²⁰ Moreover, key population subgroups (eg, elderly, some minorities) may resist being referred to the BH specialty sector for treatment.¹²

Health system-related issues

Historically separate systems for treatment of physical and BH conditions are at the root of many serious problems. For example:

- *Capacity* - Currently, neither system has the capacity to adequately treat depression and other common BH disorders. The BH system is lacking in the number and distribution of providers; PCPs lack the necessary skill set to appropriately screen, diagnose, and treat BH conditions and have difficulty finding BH specialists for referrals.
- *Structural differences* - Physical and BH organizational structures and patient safety cultures differ, and communication among providers in the 2 systems is often lacking or poor at best.
- *Funding and reimbursement* - Separate physical and BH funding streams create significant barriers to access and care coordination. Fee-for-service payment creates the wrong incentives. Importantly, health insurance discrimination related to BH disorders remains a chronic problem that is only beginning to yield to parity and ACA laws.

The current BH delivery system is fraught with problems; for example, the system is not structured for efficient use, and current training practices do not prepare incoming professionals to meet the requirements necessary for treating patients in an integrated system. These inefficiencies are costly. Clinical care accounts for only 20% of health outcomes.²¹ A recent study found that having any BH diagnosis was associated with a 3.5 times higher treatment cost, and that cost savings of \$26-\$46 billion per year could be attained through effective integration of medical and behavioral services.²²

In summary, there are multiple issues and quality gaps in urgent need of solutions. Because of the historical separation of BH and general medical/primary care systems, neither system has sufficient capacity to treat patients who present with BH conditions. Segregated funding and insurance discrimination make it difficult to pay for and coordinate care. The stigma associated with BH conditions and discrimination against those with BH problems results in

reluctance to seek treatment, particularly in specialty care settings.²³ Nationwide, there are shortages and inefficient allocation/distribution of BH professionals, and inadequate or nonexistent electronic BH records and registries make it difficult to coordinate and manage the care of populations with BH conditions.

Promoting Awareness of the Issues and Opportunities for Improvement

Although the problems loom large, progress can be made by means of targeted education for health care policy makers, providers, employers, and patients. With increased understanding of BH as a vital component of an individual's health and well-being, emerging solutions will be described in the following sections.

Cognitive dysfunction in affective disorders

Multiple stakeholders (eg, primary care and BH specialist providers, employers, patients and their families) would benefit from education regarding the functional consequences of affective disorders, a set of psychiatric conditions that are also known as mood disorders. The main types of affective disorders are depression, bipolar disorder, and anxiety disorder. Symptoms vary by individual and range from mild to severe, but they typically affect mood. However, diagnostic symptoms account for surprisingly little variance in everyday functional behaviors and contribute poorly to the prediction of the breadth and persistence of functional impairment experienced by individuals with mood disorders.^{24,25,26}

A majority of individuals with major depressive disorder, regardless of age, experience mild to moderate cognitive impairment in several domains, most commonly in executive functions, memory and processing speed. The impairment is most severe in chronic depressive illness, especially when there is associated psychosis. However, even in the absence of psychotic symptoms, 95% of people with unipolar depression have significant cognitive deficits after 8 weeks of antidepressant treatment, even when affective symptoms have remitted.²⁷ In bipolar disorder, significant cognitive impairment often persists during the euthymic state (ie, unrelated to mood). Cognitive deficits in affective disorders are pervasive across multiple cognitive domains and persistent throughout the course of the illness. Not only are they present early in the course of illness but they are highly predictive of functional disability.

Cognition involves attention, memory, processing speed, and executive function (planning and organization). Most jobs require processing speed and divided attention for doing more than 1 task at a time (eg, a waiter must take a customer's order and acknowledge the next customer's wish for a check). Functioning is always impaired for an individual with a cognitive deficit and is often misconstrued by employers as laziness.

Individual underperformance related to a cognitive deficit or dysfunction often occurs in academic settings (eg, failure to grasp course content) and hampers occupational achievement, interpersonal relationships, community participation and independent living (eg, forgetting to pay bills, failure to take medication as directed). In fact, studies reveal

that baseline cognitive functioning in attention, memory, and executive function accounted for more than 25% of variance in work and social functioning even after considering clinical symptoms; hence, cognitive functioning is closely linked to performance in work or school settings.^{28–31}

Typically, most clinicians use mental status exams only to rule out neurologic conditions and other medical issues. It is equally important to ask if a patient has difficulty with attention, memory, organization, and planning in order to rule in cognitive difficulties. Mini-Mental State Exams are readily available, and overall treatment planning for functional recovery must include cognitive training as well as symptom management, medication, stress management, and other aspects.

It is always useful for clinicians to know how the patient's brain is functioning (eg, whether or not a patient with diabetes is able to attend to a medication regime as well as perform his or her job). Mental disorders are chronic conditions that require ongoing care management with multiple visits over time. For a patient with annual visits, a cognitive assessment should be part of each visit. Every care professional can help by meeting each individual where he or she is and by being sensitive to cognitive deficits.

When cognitive dysfunction is present (ie, evidence of functional impairment or assessment reveals a deficit), the therapeutic approach should always include psychoeducation, cognitive remediation and a review of the overall treatment plan.

Critical role of employers in improving health outcomes for employees with depression

Employers have become increasingly concerned by the prevalence of depression among their employees and its effect on their organizations. BH disorders generate billions of dollars in direct and indirect costs for employers every year (eg, employee assistance programs, disability claims, lost productivity, absenteeism, work impairment) and, because depression is a common condition among employees across all sectors, the National Business Group on Health has targeted it for study.

The National Business Group on Health is an organization of Fortune 500 companies and large public sector employers representing large employer perspectives on national health policy issues. In 2014, the organization partnered with Truven Health Analytics to collect, analyze, and report on the Employer Measures of Productivity, Absence and Quality (EMPAQ), a set of 15 standardized metrics that evaluate 3 aspects of a business's human capital investment: (1) incidence (how many use it), (2) cost, and (3) lost workdays (impact on productivity).³² Of the more than 100 employers who participated in the 2014 EMPAQ report, 93% offered a health risk assessment (HRA). Industry-wide, the employee participation rate was 49% and rates correlated positively with increasing financial incentives. Companies that offered a financial incentive averaged 57% participation compared to 21% participation for companies that offered no financial incentive. With regard to disability claims, employers who offered a stay-at-work program with light duty or transitional assignments reduced lost work days by 6% per 100 employees and reduced their average long-term disability cost per claim by 33%. On-site

clinics (offered by 60% of employers) were associated with a decreased incidence of absences.

Expert panelists observed that HRA results might be useful in tailoring employer-sponsored programs for depression; for instance, on-site employee assistance program counseling and access to other programs could be expanded. Senior leadership training could be expanded to include recognition of signs of depression in employees. Importantly, a vocabulary must be developed for more effective communication about mental health in the work environment.

The panelists agreed that employers' health care leaders must increase their business and emotional literacy concerning BH issues and the struggles of individuals with these conditions. Once the stigma of BH is removed, these leaders can have meaningful discussions with employees. BH screening should be an important part of a long-term employer strategy.

Closing the BH professional and process gaps

Awareness does not provide the necessary impetus for positive action. In addition to inadequate numbers and uneven distribution of providers, closing the gaping BH professional gap requires training and retaining more BH professionals in the principles and processes of integrated health care (eg, "working smarter" and understanding that positive results are not achievable within the typical "50-minute hour").

BH specialists must be leveraged more effectively through clinical partnerships (especially with primary care) and technology (eg, in some cases telemedicine is more accessible than face-to-face). Integration of BH care with primary care fosters access to better care, improves health outcomes, and lowers costs – the Triple Aim of health care reform.

A serious issue at the core of BH is one of diagnosis. In order for a patient to be treated effectively, he or she must be diagnosed correctly. Standardizing the process of diagnosis requires consensus regarding care for a patient with a given diagnosis; unfortunately, the *Diagnostic and Statistical Manual of Mental Disorders* fails to take individual patient differences into account. Unlike its counterparts in physical medicine, the process for "proven depression" has yet to be conceptualized.

Achieving the Triple Aim for Patients with Depressive Disorders

The venerable Institute for Healthcare Improvement believes that new designs must be developed to simultaneously pursue 3 dimensions known as the "Triple Aim": (1) improving the patient experience of care (including quality and satisfaction), (2) improving the health of populations, and (3) reducing the per capita cost of health care. It is likely that the framers of US health care reform were influenced by the Triple Aim when they drafted what became the ACA that promised high-quality, affordable health care and better health outcomes for all Americans at a lower cost. How have health reforms impacted these dimensions in the context of BH and depression?

Improving the experience of care for patients with depression

Despite broad recognition that patient-centered care is important, patients often experience disenfranchisement—

especially those with BH issues. When people are not treated with basic dignity and respect by providers, they are likely to avoid future interactions with those providers. Even if care is safe, effective, and widely available, it is of little value if patients choose not to use it.

The patient advocacy movement begun in the 1970s by Planetree Founder, Angelica Thieriot, challenged the status quo of patients as passive recipients of care by demanding that patients be treated as competent adults and encouraged to take an active part in their healing, and by insisting that hospitals meet patients' human need for respect, control, and supportive care.³³ Since that time, the definition of "patient-centered" has evolved to "patient-and-family-centered," a clear understanding that the patient is not just a recipient of care but rather a codesigner of care. This implies that the treatment must match the patient's goals and take into account the impact on his or her family. With implementation of the ACA, the new patient mantra has become, "Nothing about me without me."

Consider the following recent changes:

The Department of Health and Human Services issued a rule granting patients direct access to lab test results by removing the legal barriers that have prevented medical laboratories from providing lab test results directly to patients or their designees.³⁴

In the spring of 2015, the Food and Drug Administration revised its guidance for communicating risks in direct-to-consumer (DTC) advertising, recommending the use of nontechnical language (eg, drowsiness rather than somnolence) and clear, everyday prose that describes risks as well as benefits. New DTC Guidance treats consumers as people who deserve to know about the compounds that they take into their bodies.³⁵

The pace of patient engagement technology is accelerating at an unprecedented rate.

- Virtual consults – especially appealing to patients with depression – are expected to double by 2020, leading to potential growth in reimbursement.³⁶
- Start-ups are vying to build an "Uber" for health care whereby the closest provider will come and care for the patient.³⁷ On-Demand Doctor start-ups are putting a high-tech spin on old-fashioned house calls; for instance, in New York City and San Francisco, a pager will dispatch a doctor or nurse via Uber for \$200 per urgent-care visit and \$75-\$100 per wellness check.
- In some rural California facilities, "live" hospital rounds are being made remotely by a San Francisco-based physician using a robot.³⁸
- Wearable technology to monitor health raises the question, "Will primary care become a self-administered system?" What apps might be created to assist patients with depression?

Patient-centered provisions of the ACA promote care that is delivered at home by the family. New York recently became the 15th state to enact legislation requiring hospitals to include a patient-designated care partner in the patient's care plan. Hospital staff are required to notify and offer to meet with the care partner, discuss the patient's care plan prior to discharge, and offer adequate training in aftercare tasks. In recognizing and involving the 4.1 million New Yorkers who serve as care partners, the Caregiver Advise,

Record, Enable Act may also reduce the \$17 billion spent annually by Medicare on avoidable readmissions.³⁹

Incentives are aligning at the macro level as well: for example, the Institute of Medicine developed a national network of patient and family leaders in 2015 to drive system change⁴⁰; the Centers for Medicare and Medicaid Services (CMS) Partnership for Patients set hospital engagement priorities in 2013/2014⁴¹; and, the ACA included PCMHs, ACOs, Medicare Shared Savings Programs, and meaningful use thresholds.⁴² All of these have patient engagement requirements and all recognize the issues and quality gaps in BH.

Health reform builds on the concept of BH parity. It recognizes that those with the highest health care utilization across all payers are those with comorbid BH conditions – mainly depression and anxiety. These populations have difficulty focusing on and understanding clinicians' instructions, tend to be suspicious of medications, and use the emergency room excessively. ACA is funding a pilot to change reimbursement/bundle payment, funding care management pilots, and requiring BH parity across all payers.

As different aspects of the law take effect and programs are launched, new measures of patient experience are being introduced. In the CMS Fiscal Year 2016 value-based purchasing domains, patient experience of care accounts for 25% of the base operating diagnosis-related group payment reduction amount (ie, 8 patient experience measures – 7 Hospital Consumer Assessment of Healthcare Providers and Systems composites and 1 global measure).⁴³ Although a validation process is yet to be implemented, the National Committee for Quality Assurance added the following BH elements to its standards for PCMH in 2014:⁴⁴

- 1) Depression screening for adults and adolescents using a standardized tool as part of the comprehensive health assessment.
- 2) Clinical decision support and evidence-based guidelines for a mental health disorder or substance use disorder.
- 3) A referral process for arranging or providing treatment for mental health and substance abuse disorders.

Improving quality of care and health outcomes for patients with depression

Distressed patients use health care twice as often those patients who are not distressed, and most BH care is delivered in primary care settings. Irrespective of care setting, BH care typically fails to achieve the desired outcomes because most patients only have a single visit.

The integrated primary care team is a new paradigm wherein all team members (ie, the patient, PCP, medical assistant, nurse care manager, family, social worker, BH provider, pharmacist, and community) are vital to patient outcomes. It does not replace specialty care – rather, patients with more severe conditions are referred for specialty care. Colocation of primary care and mental health providers in the same building does not constitute integrated services. A key feature of integrated care is that the timing and setting of visits are decided by the patient. Patient visits can be by phone, computer, or on a patient's day off from work, among other alternatives.

Recovery requires taking medication, changing medication if there are side effects, and obtaining additional behavioral information when needed. Because adherence to treatment is more difficult for patients with a BH diagnosis, caregiver support is an important element of integrated care. For instance, a psychoeducation program is available to assist caregivers of patients with significant dementia. Studies show that patients with alcohol dependence respond better to treatment provided in the primary care setting because providers are more engaged with patients.⁴⁵ Disease management for BH conditions is promising as well; most programs utilize 3- to 6-month interventions.

Currently, a number of models are used to integrate BH into primary care.

- 1) Collaborative Care Model (CCM) - examples include:
 - Improving Mood – Providing Access to Collaborative Treatment (IMPACT) <http://impact-uw.org/>
 - Depression Improvement across Minnesota Offering a New Direction (DIAMOND) <http://www.integration.samhsa.gov/images/res/DIAMONDWhitePaper200807211.pdf>
 - Care of Mental, Physical and Substance Use Syndromes (COMPASS) <http://www.prhi.org/initiatives/compass>
 - Washington State Mental Health Integration Program serving 45,000 clients across the state. Operated by the University of Washington through Federally Qualified Health Centers (FQHCs), this is a CCM with an on-site collaborative care coordinator. <https://aims.uw.edu/washington-states-mental-health-integration-program-mhip>
- 2) Comprehensive Primary Care Model – eg, Sustaining Healthcare Across Integrated Primary Care Efforts (SHAPE) at Colorado’s Rocky Mountain Health Plan <http://sustainingintegratedcare.net/>
- 3) Combined FQHC and Community Mental Health Centers (CMHC) combinations – eg, FQHC and Cherokee Health System CMHC <https://integrationacademy.ahrq.gov/content/Cherokee%20Health%20Systems>
- 4) FQHC/CMHC Partnerships
 - Primary and Behavioral Health Care Integration funded programs in Missouri and Michigan
 - Integrated Comprehensive Health Systems at Intermountain Healthcare and Group Health of Puget Sound
- 5) The Commonwealth of Pennsylvania Regional Integrated Program (under the auspices of the Pharmaceutical Assistance Contract for the Elderly/Needs Enhancement Tier program) wherein all patients with a diagnosis of depression are prescribed an antipsychotic, anxiolytic or antidepressant medication.

CCM is a model that shows great promise. A CCM care team that includes the PCP, a mid-level care manager on site, and a consulting psychiatrist provides measurement-based treatment to defined targets, and monitors identified patient populations in a registry. Extensive evidence (80+ randomized controlled trials) demonstrates improved patient outcomes and cost savings.⁴⁶

Although variable across settings, integrated care doubles the effectiveness of care for patients with depression.⁴⁷ IMPACT replication studies show that the model is robust

across population segments and comorbid conditions, and that integrated care reduces health care costs (\$6.50 saved per \$1 invested over 3 years). Implementing CCM requires leadership and workforce training and a holistic system is essential for achieving savings (ie, the patient and the employer experience return on their investment whereas the hospital does not experience savings).⁴⁸

Chief among the challenges for implementation of CCM for depression is scalability; 1 or 2 patients a day is insufficient volume to house a BH professional on site. Psychiatry is too expensive for the average primary care practice, and there is little return on investment for health systems. With approximately 14 full-time equivalent BH professionals in its large system, the Philadelphia Veterans Administration (VA) is ideally suited to collaborative care. The VA has the ability to track patients via a fully integrated medical record and registry-based care. The VA medical record becomes a life record, and showing a patient a graphic representation of his/her condition is worth a thousand words. There are patient-level reports and data can be used for comparative effectiveness, patient profiling, clinic profiling and provider profiling. Reports track provider workload and outcomes. The success of the VA BH provider can be traced to the ability to track down patients in person or via phone to remind them to return for a session.

CCM strategies include a focus on developing practice-based evidence to facilitate continual improvement over time. Using a measurement-based treatment to target process, medications and other treatments are actively manipulated until the patient’s clinical goals are achieved.

Changing the cost of care discussion from how much to how well

Despite unequivocal evidence of clinical benefit, substantial underutilization of high-value services persists across the spectrum of clinical care. The conversation must change from how *much* money we spend to how *well* we spend it. Ideally, consumer cost-sharing levels should be set to encourage clinically appropriate use.

The current “one size fits all” cost-sharing approach fails to acknowledge substantial differences in clinical value among medical interventions. Trends show that the most vulnerable consumers are the most likely to suffer (eg, they buy a health insurance plan they can afford but later find that BH is not covered). Studies among Medicare patients with depressive symptoms show a disturbing pattern of cost-related non-adherence to treatment and subsequent worsening of symptoms.

Consumer engagement solutions are necessary to better allocate health expenditures based on the clinical benefit—not just the cost—of services. One potential solution to cost-related nonadherence is “clinically nuanced cost-sharing.” The tenets of clinical nuance recognize that (1) medical services differ in the amount of health produced, and (2) the clinical benefit derived from a specific service is influenced by the individual consumer using it as well as where and when the service is provided.

Employers must spend wisely and demand an insurance design that improves employee health. All stakeholders benefit from Value-based Insurance Design (VBID): consumers have better access and lower out-of-pocket costs, payers promote efficient expenditures and reduce wasteful

spending, and providers enhance their patients' health outcomes in alignment with performance measures.

Although access to preventive services has been expanded since implementation of the ACA, there are serious unresolved issues. For instance:

- Preventive screenings are covered for certain conditions but treatment for the condition is not.
- No distinction in coverage and cost-sharing is made between care that is evidence based and care that is not.

Strengthening Medicare Advantage Through Innovation and Transparency, a bill seeking to direct the department of Health and Human Services to establish a VBID demonstration for Medicare Advantage beneficiaries with chronic conditions, recently passed the US House with strong bipartisan support.⁴⁹ Building on momentum from Congressional support, CMS will begin a 5-year demonstration program of VBID in Medicare Advantage plans in 2017. Programs in 8 states (Pennsylvania, Tennessee, Oregon, Massachusetts, Iowa, Rhode Island, Connecticut, and Delaware) and the District of Columbia will test the utility of structuring consumer cost sharing and other health plan design elements to encourage patients to use high-value clinical services and providers. One of the targeted clinical conditions is mood disorders and a population-level status report on the collective experience of these states could shed light on this key area.

Another potential solution is the "high-value health plan" that permits coverage of additional evidence-based services prior to meeting a plan deductible in Health Savings Account-qualified High Deductible Health Plans.

Supply side initiatives (eg, provider incentives via payment reform, pay for performance, bundled payments) often pay little attention to consumer decision making or the "demand side" of care-seeking behavior. We are allowing patients to enroll in health plans that make it increasingly difficult to get the care they need. If providers are being paid to screen for depression, patients must have access to effective and affordable treatment options. Using clinical nuance to align payment reform and consumer engagement initiatives can help improve quality of care, enhance patient experience, and contain cost growth.

Like other chronic illnesses, BH conditions often require multiple therapies to achieve the desired clinical outcomes for individual patients. Rather than imposing administrative and financial barriers to access to additional therapies, a dynamic approach to benefit design lowers consumer cost sharing for individuals who diligently follow the necessary steps for managing their conditions and enhances access to clinically appropriate therapies.

VBID has proven effective for chronic physical conditions (eg, low- or no-cost foot and eye examinations and glucose control agents for patients with diabetes). There likely is a role for VBID in improving health outcomes and lowering costs for mood disorders.

Panel Insights and Recommendations

There was consensus among the expert panelists that a massive amount of work looms ahead. At the most fundamental level, all stakeholders must actively advocate to dismantle the historically separate siloes of physical and

mental health, consolidate all resources, eliminate carve-outs, and improve communication and collaboration. There was general agreement regarding the urgent need for solutions aimed at optimizing BH outcomes and promoting value-based approaches at the population health level. To accomplish this, there must be a paradigm shift in perception across all sectors; public policy makers, medical educators, the health care industry, business organizations, and the community must come to terms with the reality that the population with BH conditions is not at fault. The problems are systemic and the solutions lie in better understanding and addressing them.

Two organizations were recognized as being at the forefront of positive change. Established as a national resource center in 2000 with funding from the Agency for Healthcare Research and Quality, the Academy for Integrating Behavioral Health and Primary Care provides access to literature and integrated BH quality measures. The National Alliance on Mental Illness, the nation's largest mental health advocacy organization, plays a valuable role in raising awareness, identifying needs, and providing support and guidance for individuals and educators.

Panelists made observations and recommendations on a broad scope of interrelated issues.

Diagnosis and treatment of depression: Mood vs. depression is almost impossible to discern in the primary care setting. Clinicians need better guidance for distinguishing a treatable condition (mood disorder) from depression. For example, when there is a death in the family a patient may be sad but still functioning. We must clearly define major depression and develop simple tools to help distinguish it from a situational response to life events and stresses. The pharmacogenetic challenge is selecting the right antidepressant for each patient. There is potential for using the genome to assess risk and personalize approaches to treatment of depression.

Patient and family engagement: Successful primary care practices believe that everyone is part of the team and the practice's structure reflects this. Patients and families can be enormously helpful if they are viewed as part of the treatment plan design. The dialog becomes:

Patient: "I am an expert about me."

Provider: "I am listening to you."

Clinicians should view a screening tool as an alert—a sign that something new or different should be done (eg, pharmaceutical, behavior modification). The entire team—including the patient and caregivers—must understand how cognition impacts daily life. A common vocabulary (all ethnic groups) is essential for conversations that help identify problems. Checklists are a vital element and everyone on the team can play a role.

Patient and family preferences must be taken into account in integrated approaches across all settings. This involves providing appropriate resources to train clinical and non-clinical staff in skills necessary for empathy and active listening, and a sound approach to specific goal setting and measurement (eg, 90% of the staff will receive empathy training by August 2017).

Typically, BH screening is oriented toward giving information to the provider rather than to the patient and family. When the patient and family are engaged and informed, it is more difficult for them to ignore the screening test results.

Performance measurement and quality improvement: All stakeholders need targeted, evidence-based tools to identify, treat, and monitor BH conditions. Measures of patient performance as well as clinician performance are vital for assuring that BH conditions such as depression receive much needed attention. For example, the Medicare Shared Savings goal is not just to identify a condition but also to get to remission. Accountability for population health measurement and evaluation should be factored into new models of care in order to learn what works and what does not.

Vague answers to questions like, “How are you doing?” are insufficient. BH must develop its own set of consistent measures of BH status and outcomes, comparable to the “vital signs” used in physical health care. There are too few BH quality measures, and too many of those that exist assess processes rather than outcomes. Aggressive quality improvement strategies will help make treatment systems more effective.

Cognition might be considered to be a new BH health outcome measure and incorporated into a population health strategy for identifying which patients need treatment and follow-up. Recovery is another key outcome; it is very important to involve the patient in defining recovery.

Provider reimbursement: Public and private payers must determine how to reimburse BH providers for novel treatments and care delivery models. For instance, because telemedicine has shown promise for managing patients with depression, funding should be considered for team-based care delivery via telehealth.

The discussion of VBID in the context of BH revealed that benefit designs should not be approached in a “one size fits all” fashion. Hospital administrators should negotiate with insurers to create benefit designs wherein pricing reflects the value a particular service brings to its patients and the system. VBID has great potential as a powerful tool for aligning what we spend with what has real value for patients and populations with depression.

Technological issues: To date, health information technology applications for the BH setting have been disappointing and/or inadequate. Aside from the VA, electronic health records (EHRs) rarely address the full range of medical, behavioral, and socioeconomic factors or share information easily. Registries are not a regular feature of EHR systems, making it difficult to monitor patient populations. Health information exchange is still very limited, especially for BH information. Privacy laws are often construed as barriers to such information exchanges; this is especially true for substance abuse. Such rules are outdated and counterproductive.

Provider liability: Panelists concurred that if a provider does not have the ability to treat depression, he or she generally does not ask about it. The liability issues associated with asking must be built into the care delivery model.

Conclusion

National statistics confirm that depression is a serious and growing population health issue. Like other chronic conditions, effective treatment is long term and must go well beyond clinical sessions and prescriptions to address issues such as adequate housing and jobs; however, this is where the

similarity ends. Long-standing, complex problems continue to hamper efforts to provide high-value care for BH disorders. The traditionally separate physical health and BH systems have long hampered the delivery of appropriate, cost-effective care, and the acute care model—writing a prescription and moving on—does not foster the development of caring relationships among providers, patients, and their families. A chronic shortage and inequitable distribution of well-trained BH providers is another concern.

On November 3, 2015, a multidisciplinary panel of experts met to discuss these critical issues and share information about opportunities for improving individual patient and population health outcomes for depressive disorders. Multistakeholder approaches, integrated care delivery systems, and VBID were discussed as methods to reduce fragmentation in care settings and reimbursement structures. Importantly, the panelists recommended targeted education for PCPs, employers, patients, and families to promote better understanding of depression.

There was consensus among the panelists that health reform has made progress in removing some of the barriers to care and paved the way for new approaches to medical management of patients suffering from depression. The Triple Aim calls for better care, better experience of care, and lower cost; panelists observed that “for the patient and family” should be added to each of these aims.

Author Disclosure Statement

Ms. Clarke and Dr. Skoufalos are employees of the Jefferson College of Population Health, which received funding from Takeda Pharmaceuticals, USA, Inc./Lundbeck, LLC to convene the national stakeholder panel and to author this supplement. Drs. Medalia and Fendrick received stipends from Takeda Pharmaceuticals, USA, Inc./Lundbeck, LLC for their participation on the expert panel and editorial assistance on the manuscript.

References

1. Roehrig C. Datawatch. Mental disorders top the list of the most costly conditions in the United States: \$201 billion. *Health Aff.* 2016;35(6):1–4.
2. Druss BG, Newcomer JW. Challenges and solutions to integrating mental and physical health care. *J Clin Psychiatry.* 2007;68(4):e09.
3. Brundtland GH. Message from the Director-General. In: *World Health Report 2001 – Mental Health: New Understanding, New Hope.* Geneva, Switzerland: World Health Organization; 2001:ix-x.
4. Murray CJL, Vos T, Lozano R, et al. Disability-adjusted life years (DALYs) for 291 diseases and injuries in 21 regions, 1990–2010: a systematic analysis for the global burden of disease study 2010. *Lancet.* 2012;380(9859):2197–2223.
5. National Alliance on Mental Illness. Mental health by the numbers. www.nami.org/Learn-More/Mental-Health-By-the-Numbers. Accessed August 11, 2016.
6. World Health Organization. *The Global Burden of Disease: 2004 Update.* Geneva, Switzerland: WHO Press; 2009.
7. O'Connor EA, Whitlock EP, Gaynes B, et al. Screening for depression in adults and older adults in primary care: an updated systematic review. <http://www.ncbi.nlm.nih.gov/books/NBK36406/>. Accessed May 4, 2016.

8. West Virginia State Innovation Model Grant. State Innovation Model (SIM) Grant: Behavioral Health Integration. Background and overview of models. http://www.wvhicollaborative.wv.gov/Documents/West%20Virginia%20Integration%20Presentation_January%202016.pdf. Accessed May 4, 2016.
9. Mental Health America. Suicide. <http://www.mentalhealthamerica.net/suicide>. Accessed May 4, 2016.
10. Xu J, Murphy SL, Kochanek KD, Bastian BA. Deaths: final data for 2013. National Vital Statistics Reports. http://www.cdc.gov/nchs/data/nvsr/nvsr64/nvsr64_02.pdf. Accessed May 16, 2016.
11. Reiger DA, Narrow DE, Rae DS, Manderscheid RW, Locke BZ, Goodwin FK. The de facto U.S. mental and addictive disorders service system. Epidemiologic catchment area prospective 1-year prevalence rates of disorders and services. *Arch Gen Psychiatry* 1993;50:85–94.
12. Unutzer J, Schoenbaum M, Druss BG, Katon WJ. Transforming mental health care at the interface with general medicine: report for the Presidents Commission. *Psychiatr Serv*. 2006;57(1):37–47.
13. Wang PS, Lane M, Olfson M, Pinchus HA, Wells KB, Kessler RC. Twelve-month use of mental health services in the United States: results from the National Comorbidity Survey Replication. *Arch Gen Psychiatry*. 2005;62:629–640.
14. Thase ME, Haight BR, Richard N, et al. Remission rates following antidepressants therapy with bupropion or selective serotonin reuptake inhibitors: a meta-analysis of original data from 7 randomized controlled trials. *J Clin Psychiatry*. 2005;66:974–981.
15. Rush AJ, Fava M, Wisniewski SR, et al. Sequenced treatment alternatives to relieve depression (STAR*D): rationale and design. *Control Clin Trials*. 2004;25:119–142.
16. Trivedi MH, Rush AJ, Wisniewski SR, et al. Evaluation of outcomes with citalopram for depression using measurement-based care in STAR*D: implications for clinical practice. *Am J Psychiatry*. 2006;163:28–40.
17. Hansen NB, Lambert MJ, Forman EM. The psychotherapy dose-response effect and its implications for treatment delivery services. *Clin Psychol Sci*. 2002;9:329–343.
18. Kaiser Family Foundation. State Health Facts. Mental Health Care Health Professional Shortage Areas (HPSAs). <http://kff.org/other/state-indicator/mental-health-care-health-professional-shortage-areas-hpsas/>. Accessed May 4, 2016.
19. Sun LH. Why it's so hard to find a mental health professional. October 22, 2015. <https://www.washingtonpost.com/news/to-your-health/wp/2015/10/22/why-its-so-hard-to-find-a-mental-health-professional/>. Accessed May 4, 2016.
20. National Association of State Mental Health Program Directors (NASMHPD) Medical Directors Council. Morbidity and mortality in people with serious mental illness. October 2006. <http://northernlakescmh.com/wp-content/uploads/2010/03/686.pdf>. Accessed May 4, 2016.
21. Booske BC, Athens JK, Kindig DA, Park H, Remington PL. Different perspectives for assigning weights to determinants of health. February 2010. <https://uwphi.pophealth.wisc.edu/publications/other/different-perspectives-for-assigning-weights-to-determinants-of-health.pdf>. Accessed May 16, 2016.
22. Melek SP, Norris DT, Paulus J. Economic Impact of Integrated Medical-Behavioral Healthcare: Implications for Psychiatry. Denver, CO: Milliman; April 2014.
23. Corrigan PW, Druss BG, Perlick DA. The impact of mental illness stigma on seeking and participating in mental health care. 2014. <http://www.psychologicalscience.org/index.php/publications/mental-illness-stigma.html>. Accessed May 4, 2016.
24. Bowie CR, Depp C, McGrath JA, et al. Prediction of real world functional disability in chronic mental disorders: a comparison of schizophrenia and bipolar disorder. *Am J Psychiatry*. 2010;167:1116–1124.
25. Jaeger J, Berns S, Uzelac S, Davis-Conway S. Neurocognitive deficits and disability in major depressive disorders. *Psychiatry Res*. 2006;145(1):39–48.
26. Sanchez-Moreno J, Martinez-Aran A, Tabarés-Seisdedos R, Torrent C, Vieta E, Ayuso-Mateos JL. Functioning and disability in bipolar disorder: an extensive review. *Psychother Psychosom*. 2009;78:285–297.
27. Shilyanski C, Williams LM, Gyurak A, Harris A, Usherwood T, Etkin A. Effect of antidepressant treatment on cognitive impairments associated with depression: a randomized longitudinal study. *Lancet Psychiatry*. 2016;3:425–435.
28. Martino DJ, Marengo E, Igoa A, et al. Neurocognitive and symptomatic predictors of functional outcome in bipolar disorders: a prospective 1 year follow-up study. *J Affect Disord*. 2009;116:37–42.
29. Tabarés-Seisdedos R, Balanzá-Martínez V, Sánchez-Moreno J, et al. Neurocognitive and clinical predictors of functional outcome in patients with schizophrenia and bipolar I disorder at one-year follow-up. *J Affect Disord*. 2008;109:286–299.
30. Dickerson F, Boronow JJ, Stallings C, Origoni AE, Cole SK, Yolken RH. Cognitive functioning in schizophrenia and bipolar disorders: comparison of performance on the Repeatable Battery for the Assessment of Neuropsychological Status. *Psychiatry Res*. 2004;129(1):45–53.
31. Forcada I, Mur M, Mora E, Vieta E, Bartrés-Faz D, Portella MJ. The influence of cognitive reserve on psychosocial and neuropsychological functioning in bipolar disorder. *Eur Neuropsychopharmacol*. 2015;25:214–222.
32. Truven Analytics, National Business Group on Health. EMPAQ[®] insights 2015. https://truvenhealth.com/Portals/0/Assets/HealthInsights/EMPAQ_Report2015_FINAL1.pdf. Accessed May 18, 2016.
33. Scott KW, Phil M, Jha AK. Putting quality on the global health agenda. *N Engl J Med*. 2014;371:3–5.
34. Conn J. HHS issues rule granting patients direct access to lab test results. February 3, 2014. <http://www.modernhealthcare.com/article/20140203/NEWS/302039958>. Accessed May 4, 2016.
35. Robertson CT. New DTCA guidance – enough to empower consumers? *N Engl J Med*. 2015;373:1085–1087.
36. Jaspén B. Doctors' virtual consults with patients to double by 2020. August 9, 2015. <http://www.forbes.com/sites/brucejaspén/2015/08/09/as-telehealth-booms-doctor-video-consults-to-double-by-2020/#58ed99ca5d66>. Accessed May 4, 2016.
37. Beck M. Startups vie to build an Uber for health care. August 11, 2015. <http://www.wsj.com/articles/startups-vie-to-build-an-uber-for-health-care-1439265847>. Accessed May 16, 2016.
38. Telemedicine robots allow doctors to 'teleport' next to hospital patients. November 19, 2013. <http://www.techtimes.com/articles/1504/20131119/telemedicine-robots-allow-doctors-to-teleport-next-to-hospital-patients.htm>. Accessed May 19, 2016.
39. Seward JL. CARE Act passes Senate. April 21, 2015, <https://www.nysenate.gov/newsroom/press-releases/james-l-seward/care-act-passes-senate>. Accessed May 16, 2016.

40. National Academy of Medicine. Patient & Family Health Care Leadership: A Resource Compendium. July 17, 2015. <http://nam.edu/wp-content/uploads/2015/07/PFHCL-Resource-Compendium-rev17Jul15.pdf>. Accessed May 19, 2016.
41. Centers for Medicare & Medicaid Services. Partnership for Patients. Hospital engagement networks. <https://partnershipforpatients.cms.gov/about-the-partnership/hospital-engagement-networks/thehospitalengagementnetworks.html>. Accessed May 19, 2016.
42. Bartels SJ, Gill L, Naslund JA. The Affordable Care Act, accountable care organizations, and mental health care for older adults: implications and opportunities. *Harv Rev Psychiatry*. 2015;23:304–319.
43. Centers for Medicare & Medicaid Services. Fiscal year (FY) 2016 results for the CMS Hospital Value-Based Purchasing Program. <https://www.cms.gov/Newsroom/MediaReleaseDatabase/Fact-sheets/2015-Fact-sheets-items/2015-10-26.html>. Accessed May 19, 2016.
44. National Committee for Quality Assurance. New NCQA patient-centered medical home standards raise the bar. <http://www.ncqa.org/newsroom/news-archive/2014-news-archive/news-release-march-24-2014>. Accessed May 19, 2016.
45. Ernst DB, Pettinati HM, Weiss RD, Donovan DM, Longabaugh R. An intervention for treating alcohol dependence: relating elements of medical management to patient outcomes with implications for primary care. *Ann Fam Med*. 2008;6:435–440.
46. University of Washington, Psychiatry and Behavioral Sciences, Division of Population Health. Collaborative Care. <https://aims.uw.edu/collaborative-care>. Accessed May 16, 2016.
47. Unützer J, Katon W, Callahan CM, et al. Collaborative care management of late-life depression in the primary care setting: a randomized controlled trial. *JAMA*. 2002;288:2836–2845.
48. Unützer J, Harbin H, Schoenbaum M, Druss B. The Collaborative Care Model: an approach for integrating physical and mental health care in Medicaid health homes. Medicaid Health Home Information Resource Center. <https://www.medicaid.gov/State-Resource-Center/Medicaid-State-Technical-Assistance/Health-Homes-Technical-Assistance/Downloads/HH-IRC-Collaborative-5-13.pdf>. Accessed May 19, 2016.
49. Congress.gov. Strengthening Medicare Advantage Through Innovation and Transparency for Seniors of 2015. <https://www.congress.gov/bill/114th-congress/house-bill/2570>. Accessed May 16, 2016.

Address correspondence to:

Janice Clarke, RN

Jefferson College of Population Health

901 Walnut St, 10th floor

Philadelphia, PA 19107

E-mail: Janice.clarke@jefferson.edu