This document is in the public domain and may be used and reprinted with permission except those copyrighted materials that are clearly noted in the document. Further reproduction of those copyrighted materials is prohibited without the specific permission of copyright holders.

**Suggested Citation:**

None of the investigators has any affiliations or financial involvement that conflicts with the material presented in this report.

This project was funded by the Agency for Healthcare Research and Quality (AHRQ), U.S. Department of Health and Human Services. The opinions expressed in this document are those of the authors and do not reflect the official position of AHRQ or the U.S. Department of Health and Human Services.
Acknowledgments

We thank members of the expert panel for their contributions to this paper: Michael Barr (American College of Physicians); Thomas Graff (Geisinger Health System); Larry Green (University of Colorado); Paul Grundy (IBM); Roger Kathol (Cartesian Solutions); Wayne Katon (University of Washington Medical School); Don Liss (Aetna); Barbara Mauer (MCPP Healthcare Consulting); Gary Oftedahl (Institute for Clinical Systems Improvement); and Leif Solberg (Health Partners Research Foundation).

At the Agency for Healthcare Research and Quality, Charlotte Mullican, Matthew Quinn, David Meyers, and Janice Genevro provided useful comments and guidance at different stages of development of this paper.

Finally, at Mathematica, Deborah Peikes and Myles Maxfield provided helpful comments.
Abstract

Efforts to improve the quality and efficiency of primary care have recently focused on the concept of the Patient Centered Medical Home (PCMH). Given that primary care serves as a main venue for providing mental health treatment, it is important to consider whether the adoption of the PCMH model is conducive to delivery of such treatment. This paper identifies the conceptual similarities in and differences between the PCMH and current strategies used to deliver mental health treatment in primary care. Even though adoption of the PCMH has the potential to enhance delivery of mental health treatment in primary care, several programmatic and policy actions are needed to facilitate integration of high-quality mental health treatment within a PCMH.
# Contents

Introduction ........................................................................................................................................1

Why Should Mental Health Problems Be Priorities for the PCMH? .................................................2

Are the Evidence-Based Strategies Used to Deliver Mental Health Treatment in Primary Care Consistent With the Core Components of the PCMH? .............................................................3

  - Patient-Centered Care .................................................................................................................4
  - Comprehensive Care ....................................................................................................................4
  - Care Coordination Among Providers ........................................................................................5
  - Access ..........................................................................................................................................5
  - Systems-Based Approach to Quality Improvement .......................................................................6
  - Use of Health Information Technology .......................................................................................6

How Can the PCMH Meet the Needs of Diverse Patient Populations With Complex Mental Health and Related Problems? .............................................................................................................6

  - Children and Adolescents ...........................................................................................................7
  - People With Serious Mental Illness ...............................................................................................7
  - People With Substance Use Disorders .........................................................................................8

What Policy and Programmatic Actions Are Needed to Ensure the Feasibility of Integrating Mental Health Treatment Into the PCMH? .............................................................................................8

  - Normalize Mental Health in Mainstream Medical Practice ...........................................................9
  - Integrate Reimbursement for the Time and Resources Needed to Provide Mental Health Treatment in the PCMH ..............................................................................................................10
  - Create a Roadmap for Implementation and Performance Assessment ........................................10
  - Determine the Most Effective and Cost-Effective Implementation Mechanisms for Populations With Complex Mental Health Problems ..............................................................................11
  - Create and/or Disseminate the Tools Needed by PCPS to Provide High-Quality, Patient-Centered Services ........................................................................................................................12

Concluding Comments .......................................................................................................................13

References ..........................................................................................................................................14
Introduction

Considerable evidence documents the relationship between high-quality primary care and improved health outcomes (Starfield, Shi, and Macinko, 2005). Throughout the United States, health outcomes are better in regions where the supply of primary care providers (PCPs) is highest (Shi, 1992, 1994; Shi et al., 2003). People who report a regular source of primary care also report better health, and they have better health outcomes and lower mortality than those without a regular source of care (Franks and Fiscella, 1998; O’Malley et al., 2005). Other studies show a direct relationship between the quality of primary care and the outcomes of that care (Flocke, Stange, and Zyzanski, 1998; Ryan et al., 2001).

Efforts to improve the quality and efficiency of primary care have recently centered on the concept of the Patient Centered Medical Home (PCMH). In the context of primary care, the PCMH is viewed as a way of organizing service delivery in a coordinated manner characterized by a “patient-centered” orientation; comprehensive team-based care with coordination among providers; continuous access to care; and a systems-based approach to quality and safety. The PCMH model is an approach that strengthens the main features of high quality, comprehensive primary care as defined by the Institute of Medicine (Donaldson et al., 1996; Starfield et al., 2005). The Agency for Healthcare Research and Quality (AHRQ) has recently emphasized the role of health information technology in implementing the key features of the PCMH and supporting ongoing quality improvement as a core PCMH activity. AHRQ has also highlighted the need for new workforce development and training and stressed the importance of payment reforms to ensure sustainability of the PCMH model.

Many PCMH demonstration projects have been initiated across the United States. Although a few have included treatment for depressive disorders as a component of a larger intervention (Bitton, Martin, and Landon, 2010), most have not explicitly addressed mental health. Consensus has yet to emerge on whether strategies used to deliver mental health treatment in primary care are consistent with the core elements of the PCMH or the extent to which adoption of the PCMH concept will facilitate the delivery of such treatment in primary care. To address the following four questions, we examine the PCMH concept and successful approaches to delivering mental health treatment in primary care:

1. Why should mental health problems be priorities for the PCMH?
2. Are the evidence-based strategies used to deliver mental health treatment in primary care consistent with the PCMH’s core components?
3. How can the PCMH meet the needs of diverse patient populations with complex mental health and related problems?
4. What policy and programmatic actions are needed to ensure the feasibility of integrating mental health treatment into the PCMH?
Why Should Mental Health Problems Be Priorities for the PCMH?

Overwhelming evidence indicates that mental health problems are common but often go unrecognized in primary care settings, that they compromise the quality and outcomes of treatment for physical health conditions, and that appropriate mental health treatment can alleviate these impediments to well-being. National studies estimate that, during a 1-year period, up to 30 percent of the U.S. adult population meets criteria for one or more mental health problems, particularly mood (19 percent), anxiety (11 percent), and substance use (25 percent) disorders (Kessler et al., 2005). Mood and anxiety disorders are especially common among primary care patients and occur in approximately 20 to 25 percent of patients seen in clinics serving mixed-income populations and in as many as 50 percent of patients seen in clinics serving low-income populations (Wang, Lane, et al., 2005). Mental health problems are 2 to 3 times more common in patients with chronic medical illnesses such as diabetes, arthritis, chronic pain, headache, back and neck problems, and heart disease (Katon, 2003; Katon, Lin, and Kroenke, 2007; Scott et al., 2007). Left untreated, mental health problems are associated with considerable functional impairment, poor adherence to treatment, adverse health behaviors that complicate physical health problems, and excess health care costs (Almeida and Pfaff, 2005; Anda et al., 1990; Cronin-Stubbs et al., 2000; DiMatteo, Lepper, and Croghan, 2000; Kessler et al., 2005; Kinnunen et al., 2006; Martini, Wagner, and Anthony, 2002; Merikangas et al., 2007; Scott et al., 2009).

Most mental health treatment is provided in primary care settings, and the percentage provided solely in these settings is rapidly growing (Wang, Lane, et al., 2005, Wang, et al., 2006). Nonetheless, PCPs typically under identify mental health problems in their patients (Young et al., 2001). When they do identify these conditions, PCPs more often than not deliver treatment that is suboptimal and characterized by inadequate followup and monitoring of patients (Kessler et al., 2005; Wang et al., 2002, Wang, Berglund, et al., 2005), especially among the low-income patient population and racial and ethnic minorities (Alegria et al., 2008; González et al., 2008, 2009, 2010). When viewed from this perspective, the PCMH will not achieve its goals unless and until it embraces and addresses patients’ mental health needs.

In response to evidence pointing to gaps in treatment of mental health problems, various models to improve the quality and outcomes of treatment in primary care settings have been developed and tested. For example, more than 40 trials in diverse primary care settings have demonstrated that PCPs can deliver effective treatment for depressive disorders and improve patient outcomes when they follow evidence-based protocols and redesign practice in ways that permit them to identify mental health problems, monitor mental health outcomes, and coordinate treatment more closely with mental health specialists in support of patient management (Bower et al., 2006; Butler et al., 2008). Though not yet extensive, research also demonstrates the value of integrated primary care services for anxiety (Rollman et al., 2003; Sullivan et al., 2007) and substance use (Bartels et al., 2004; Mertens et al., 2008; Weisner et al., 2001) disorders.
People with mental health problems use more health services than those without such problems, even after taking into account the higher prevalence of chronic physical health problems among those with mental disorders (Katon et al., 2003; Simon, Von Korff, and Barlow, 1995). This persistent finding has led to the hypothesis that expanding access to mental health treatment would lead to reductions in use of services and costs for physical health problems, but this so-called “medical cost-offset” has not been demonstrated (Azocar et al., 2004; Powers, Kniesner, and Croghan, 2001; Sturm, 2001; Von Korff et al., 1998). Consistent with this finding, although one recent study has shown reduction in costs associated with integrated depression treatment for patients with diabetes (Katon et al. 2006), most studies of integrated treatment in primary care settings have shown moderate increases in health costs ranging from $100 to $1,000 per treated patient over 6 to 12 months (Pyne et al., 2003; Schoenbaum et al., 2001; Simon et al., 2001). From one-quarter to one-half of the additional cost results from increased spending on antidepressants associated with better adherence; the remainder is attributable to the increased number of depression-related visits and telephone contacts. Thus, although integrated treatment strategies have not been shown to reduce costs except in special circumstances, they have consistently been shown to be cost effective relative to usual care, with incremental cost effectiveness ratios well within commonly cited thresholds for adoption of new medical treatments (Pyne et al., 2003; Schoenbaum et al., 2001; Simon et al., 2001).

Are the Evidence-Based Strategies Used to Deliver Mental Health Treatment in Primary Care Consistent With the Core Components of the PCMH?

The PCMH is grounded in the Chronic Care Model (CCM, Wagner, Austin, and Von Korff, 1996), which has found widespread application as a framework to improve the quality of care and outcomes for people with chronic health conditions. Consistent with CCM, the PCMH attempts to integrate PCPs, decision support tools, and clinical information-sharing mechanisms to promote productive interaction between (1) proactive teams of interdisciplinary providers armed with resources and expertise and (2) informed patients motivated to take an active part in their care. Efforts to improve access to and the quality of mental health treatment have led to the conclusion that, by emphasizing a “patient-centered” perspective, the CCM approach to the delivery of health care is also needed to address individuals’ physical and mental health needs (Institute of Medicine, 2006). The CCM systems approach to delivery of mental health treatment is organized around provider and patient education, aggressive outreach, screening, and identification of patients with mental health problems, motivating patients to play an active role in treatment, treatment protocols for providers, monitoring and followup, and coordination among providers (Trivedi, Lin, and Katon, 2007).

Recent years have seen the development and testing of several conceptually different models for managing mental health problems in primary care settings, such as training of primary care staff in mental health care, more integrated approaches, often referred to collectively as collaborative care or care management that include many of the care processes described in this paper, and facilitated referral from primary care to mental health specialists (for a description of these models, see Bower and Gilbody, 2005; Butler et al., 2008, Collins et al., 2010; Wulsin, Sollner, and Pincus, 2006). Taken in isolation, these approaches may be viewed along a
continuum of responsibility from the PCP to mental health specialists for managing mental health problems. In practice, these models are often combined in idiosyncratic ways adapted to the specific needs, resources, and context of a practice and the patients it serves. Typically, however, successful models incorporate some form of training for primary care physicians and their staff, redefinition or realignment of staff roles and duties, and the development of collaborations among primary care and mental health specialists that range from loose affiliations of providers to the full clinical and organizational integration of collocated medical and mental health staff (Bower et al., 2006; Gilbody et al., 2003).

While most models of integrated care can succeed in selected circumstances, more highly integrated models that include the core elements of the PCMH, i.e., patient-centered, comprehensive, coordinated care, enhanced access through systematic screening and diagnosis, and system-based quality improvement, result in the best mental health outcomes (Bower et al., 2006). In contrast, other attempts to improve the quality and outcomes of treatment for mental health problems, such as passive dissemination of treatment guidelines, provider education, and facilitated referral or colocation without other elements of integrated models, have not consistently been shown to improve mental health outcomes in primary care settings (Gilbody et al., 2003).

All successful models for integrating mental health care into primary care setting are based on or are consistent with the basic tenants of the CCM and thus share many attributes with the PCMH.

Patient-Centered Care

The PCMH model assumes that health care is best delivered as a partnership between providers, patients, and their families. This holistic approach is also a central element of integrated approaches to mental health treatment, beginning with a comprehensive needs assessment that explores the meanings of illness from the patient’s perspective. In addition, integrated approaches to mental health treatment engage patients in participating actively in their own care—often through the use of psychosocial techniques derived from motivational interviewing—and trains providers in communication techniques that facilitate informed decisionmaking while encouraging patient participation in the design of treatment plans and self-management (Cooper et al., 2010).

Comprehensive Care

The PCMH model requires the medical home to treat the range of a patient’s health problems. Consistent with the PCMH, most approaches to delivering mental health services in primary care hold the primary care practice responsible for caring for all of the patient’s physical and mental health needs. Integrated mental health care has been tested and proven effective in patients with comorbid depression and diabetes (Katon et al., 2004), coronary heart disease (Frasure-Smith and Lesperance, 2010), and chronic pain (Dobscha et al., 2009; Kroenke et al., 2009).
The PCMH emphasizes a team-based approach to care that includes PCPs (including physicians, nurse practitioners, and physician assistants), nurses, pharmacists, physical and occupational therapists, care managers, and others. Similarly, successful models of mental health integration in primary care embrace a team-based philosophy. The PCP, a care manager, and a mental health specialist form the core of such teams. The role, function, and training of the care manager is especially important, particularly when they have mental health education, training, and/or experience and are closely supervised by a prescribing psychiatrist (Bower et al., 2006). The care manager is responsible for tracking patients, monitoring symptoms, providing patient education, supporting treatment adherence, taking action when nonadherence occurs or symptoms worsen, and delivering psychosocial interventions. Nurses, social workers, and medical assistants have successfully filled the role of case managers (Gensichen et al., 2009), but whether care managers focused on mental health interventions can simultaneously coordinate care for comorbid physical conditions is still an open question. In addition to supervising medication management and other mental health interventions, the psychiatrist or mental health specialist provides decision support and education for the PCP and, less frequently, directs patient care in complex cases (Katon and Unutzer, 2006; Katon et al., 2001).

**Care Coordination Among Providers**

The PCMH is responsible for coordinating care across the health care system. Because few PCPs have the time or training to provide intensive psychotherapy or closely monitor medications prescribed for individuals with complex mental health needs, consultation with and referrals to mental health specialists are essential components of successful approaches to delivering mental health services in primary care; also integrated care models require that primary care staff foster relationships with mental health specialists. In most cases, the PCP maintains responsibility for the patient, with ongoing support from mental health specialists in a “stepped-care” approach that matches patient needs with services provided. Thus, the duration and timing of consultation and whether consultation is conducted in person or by telephone depends on the acuity and nature of the problem and the patient’s support system. Coordination among providers also facilitates use of behavioral techniques to support treatment of comorbid physical health problems, including high-risk health behaviors such as smoking, obesity, and sedentary lifestyle.

**Access**

Amid concerns about long wait times for appointments, insufficient continuity of care, and lack of availability of specialists, the PCMH provides access to medical care when it is needed. While these issues are also concerns for those with mental health problems, recognition and diagnosis of mental disorders are considered the main impediments to receiving timely, high-quality mental health treatment in primary care settings (Wang, Berglund, et al., 2005). Research has demonstrated that about 85 percent of persons with depression see a medical provider at some point during an episode but that fewer than half of such persons are diagnosed with depression (Young et al., 2001). Part of the explanation for low levels of diagnosis lies in the perceived stigma and characteristics of depression. Patients with chest pain are likely to report such symptoms and expect evaluation and treatment, but depressed patients rarely complain.
directly of a depressed mood. While facilitating access to treatment for mental health problems is consistent with the PCMH’s core elements, successful integration of mental health treatment in the PCMH requires a proactive, systematic approach to screening and diagnosis (Bower et al., 2006; Rubenstein et al., 1999).

**Systems-Based Approach to Quality Improvement**

Similar to the PCMH, strategies used to deliver mental health services in primary care rely on developing formal processes for screening and diagnosis, adopting evidence-based treatment protocols, monitoring outcomes, effectively communicating with patients, and coordinating with other providers involved in a patient’s care—all of which might be expedited with the use of patient registries and various information technologies. Decision support tools might include personal digital assistant devices and online tools that may be used for mental health screening, selecting treatment protocols, and monitoring outcomes (Gardner, Kelleher, and Pajer, 2002). Several Web-based data management and tracking systems, initially developed for multicenter clinical trials, have been successfully adapted for use in practice settings (Brown et al., 2008; Grypma et al., 2006; Unützer et al., 2002). These systems allow the care team to monitor contacts, symptoms, and adherence to treatment at both the patient and practice level. With these systems, regular quality reports allow the team to identify quality “outliers” and devise solutions for individual patients and system-wide problems. These tools have the advantage of rich clinical information and thus could represent a significant improvement over claims-based approaches to performance assessment (Croghan et al., 2006).

**Use of Health Information Technology**

Health information technology is viewed as an important tool for many PCMH functions and is being studied as a means to improve treatment for mental health problems. Telephonic, e-mail, and online computer technologies can deliver education and engage individuals in symptom management and self-care (Gerstle, 2004). Researchers are testing the utility of interactive voice-response telephone systems and text messaging to monitor symptoms and side effects for individuals under treatment for mental health problems in primary care (Gardner, 2008; Kelleher and Stevens, 2009). Online “therapeutic workbooks” and self-management training tools for depression have been developed (Gerstle, 2004), and therapies, such as Cognitive Behavioral Therapy, have been computerized (National Institute for Health and Clinical Excellence, 2010). Finally, computer technologies can deliver training in mental health treatment and communication skills to primary care staff (Kemper et al., 2008). Further research is needed to examine the costs and long-term effectiveness of these strategies.

**How Can the PCMH Meet the Needs of Diverse Patient Populations With Complex Mental Health and Related Problems?**

While collaborative care and other strategies for delivering mental health services in primary care settings have proved successful in many populations with mental health problems, some
special populations require further consideration, including children, those with serious and persistent mental illness (SMI), and those with substance use disorders. No matter how advanced a primary care practice may be, some patients’ mental health, substance use, and physical health problems might best be managed in intensive specialty care settings. In these situations, the essential elements of the PCMH still apply, but how and where they are implemented may differ.

**Children and Adolescents**

Several strategies have been used to improve primary care’s capacity for meeting the mental health needs of children and adolescents (Ginsburg and Foster, 2009). Collaborative care models have proved effective in treating adolescent depression (Asarnow et al., 2005), and guidelines have been developed for treating attention deficit disorder and hyperactivity in primary care settings (Leslie et al., 2004). PCPs are often in the best position to recognize and address situations such as abusive families that promote development of future mental health and substance use problems (World Health Organization, 2004). Despite the success of these efforts, the quality of mental health services in primary care for children and adolescents still requires improvement, which may be facilitated by adoption of the PCMH concept. In particular, it is essential to develop and test approaches that can equip primary care to address the needs of the nearly 40 percent of children and adolescents who experience periods of clinically significant functional impairment related to mental health problems but do not meet diagnostic criteria for specific mental disorders (Bernal et al., 2000; Briggs-Gowan et al., 2000, 2003). Further, even children with a diagnosable mental disorder demonstrate relatively low diagnostic stability over time (Briggs-Gowan et al., 2000), complicating the selection of and adherence to treatment protocols (Wissow et al., 2008). PCPs thus need tools and communication skills to identify emerging mental health problems, engage families in determining an appropriate course of action, and monitor outcomes when diagnosis is uncertain.

**People With Serious Mental Illness**

Through their regular, long-term contact with patients, PCPs are often in the best position to identify the early warning signs of SMI. Yet, focusing care on patients with schizophrenia, bipolar disorder, and severe major depression in primary care settings is likely to conflict with other priorities and may not represent the best use of resources from the standpoint of the primary care practice. Nonetheless, it is imperative to address in a coordinated and holistic manner the physical and mental health needs of individuals with SMI. Such individuals are at increased risk of mortality associated with higher rates of chronic physical conditions, including obesity, hypertension, diabetes, and cardiovascular disease (Miller et al., 2006). Those with SMI typically have more contact with community-based mental health service systems than with office-based primary care medical settings, but community-based mental health providers often do not have the appropriate medical staff to treat acute physical problems or help manage chronic physical conditions. In response, some mental health providers have embedded medical staff to treat physical health problems within care settings that have historically focused on mental health (Druss et al., 2010), and the concept of the Federally Qualified Behavioral Health Center has been proposed to serve as the medical and mental health home to individuals with SMI (Alakeson et al., 2010; Jarvis, 2009).
People With Substance Use Disorders

All the concepts discussed thus far also apply to substance use disorders (Mauer, 2010). Like mood and anxiety disorders, substance use disorders are common but frequently go unrecognized in primary care settings. Like other physical and mental health problems, substance use disorders are chronic conditions that progress slowly, putting PCPs in an ideal position to screen for alcohol and drug problems and monitor each patient’s status. Finally, like people with SMI, those with substance use disorders who receive treatment in specialty settings often fail to receive adequate prevention and treatment of physical health problems.

In parallel with all health problems, substance use disorders are heterogeneous, spanning a broad range of specific substances and severity. Studies have found that PCPs can help patients decrease alcohol consumption and its harmful consequences through office-based interventions that take only 10 or 15 minutes (Babor et al., 2007). However, the potential for primary care to address substance use disorders is largely untapped, in part because PCPs lack training and have poor access to specialty consultation for such disorders (Saitz, Horton, and Samet, 2003). In other situations, especially for those involving severe, recurrent, or co-occurring substance use and mental disorders, however, specialty clinics that include integrated primary care services might be the best location for an individual’s medical home (Mertens et al., 2008).

In summary, providing integrated mental health treatment to children and adolescents, and adults with SMI and substance use disorders presents enormous challenges. In patients with more mild to moderate symptoms, adequate treatment can be provided in the PCMH. In many if not most cases of severe symptoms, the optimal mechanisms for providing integrated care consistent with the principles of the PCMH are yet to be established.

What Policy and Programmatic Actions Are Needed to Ensure the Feasibility of Integrating Mental Health Treatment Into the PCMH?

The typical primary care practice faces several challenges in providing high-quality mental health treatment. Already overloaded practices increasingly struggle to provide prompt access to high-quality care for patients with chronic conditions (Nutting et al., 2000). Many PCPs report that they lack training in the diagnosis and treatment of mental disorders (Butler et al., 2008). They express concern about the time required for counseling, educating, and monitoring patients; lack of access to mental health specialists for advice and consultation; and their inability to obtain outpatient mental health services for their patients (Cunningham, 2009; Horwitz et al., 2007; Roy-Byrne and Wagner, 2004). This lack of connectivity to other providers and perception of burden associated with treating mental health problems in primary care practices impede the identification and treatment of mental health problems in primary care (Brown, Riley, and Wissow, 2007; Stiffman, 2000), issues that must be addressed in order to build PCMHs that successfully integrate mental health care.
In the remainder of this paper, we describe essential policy actions that will strengthen the capacity of the PCMH to serve the needs of those with mental health problems. We find there is convincing evidence (1) that integrating mental health care into primary care practice results in better quality and outcomes, (2) we know the essential ingredients of successful integration at the clinical and practice level, and (3) that we have deep understanding of the system barriers that impede implementation and sustainability. Despite the firm research base for the principles of integrated mental health care in primary care settings, further research and evaluation are needed. Consistent with the recommendations of a recent AHRQ Evidence-based Practice Center report, more research is needed to refine our understanding of the best mechanisms for implementing integrated care, the situations in which specific elements or combinations of elements work best, the populations that will benefit most from integrated care, and how to match practices with the appropriate elements of integrated care (Butler et al., 2008).

To make integration feasible and facilitate the effective functioning of an integrated system, leadership will be required at all levels of the delivery system, including the Federal Government, where responsibility for primary and mental health care spans a wide range of departments and agencies (Institute of Medicine, 2006). A substantial and integrated Federal role will be especially important in bringing together all relevant stakeholders to address the issues raised here, determining and assessing accountability for implementation, and facilitating resolution of potentially competing interests.

In the following paragraphs, we outline five essential measures—normalize mental health into mainstream medical practice, integrate reimbursement mechanisms, create a roadmap for implementation, determine mechanisms to address the needs of those with complex mental health problems, and disseminate the tools needs by PCPs—that collectively will facilitate integrated mental health treatment in primary care settings and that are needed for the PCMH to achieve its full potential.

**Normalize Mental Health in Mainstream Medical Practice**

Conceptually, management of mental health problems is similar to management of other common medical conditions, such as diabetes or heart disease. Each requires recognition of symptoms and an initial diagnostic assessment, development of a treatment plan, and careful monitoring and followup care. In some cases, patients with more severe conditions may be referred to specialists, but the primary care team remains responsible for care coordination and followup. While this model seems to work for those with a variety of medical conditions, it has not yet worked well for those with mental health problems. Successful implementation of the PCMH, with its focus on the whole person, comprehensive and coordinated care, and communication, may help overcome the barriers to delivering treatment in primary care for both physical and mental health conditions.

Efforts to integrate mental health services in the PCMH will face significant challenges imposed by the segregation of the physical and mental health treatment systems (Karp, 1996; Nutting et al., 2009). Normalizing treatment of mental health problems in primary care practice will thus require significant cultural shifts. Molecular genetics has shown that mental health
problems, like most health conditions, are the result of complex interactions between mind and brain, body, genes, and environment (Collins, 2004; Dick et al., 2009; Kandel, 2006; Shanahan and Hofer, 2005). Society has demonstrated a growing understanding of these fundamental interactions (Croghan et al., 2003; Schnittker, 2005, 2008), but health care policy and practice have yet to do so. Episodes of physical and mental illnesses and their treatment are more similar than different, and PCPs appear willing to accept responsibility for treatment of common mental health problems (Gallo, Ryan, and Ford, 1999; Gallo et al., 2002). In practice, however, PCPs often place priority on physical health problems (Nutting et al., 2000; Shao et al., 1997), and, relative to treating patients with other medical problems, they are less willing to refer patients with mental health problems for mental health specialty care (Gallo, Ryan, and Ford, 1999; Shao et al., 1997). These treatment patterns suggest that there may be beliefs and habits among providers that could be changed through education, training, and supportive interdisciplinary relationships.

To be a functioning PCMH that provides mental health treatment, PCPs will need to acquire new technical and leadership skills that are not typically part of current medical curricula but should be. The next generation of PCPs, however, will not adequately address today’s challenges unless currently practicing PCPs receive the training, education, and incentives to adopt needed skills. In addition to changes in reimbursement that will expedite adoption of the PCMH and integrated mental health treatment overall, incentives might include requirements to demonstrate understanding and successful command of the skills needed for licensure, board certification, and medical staff privileges.

Normalizing treatment of mental health problems also involves redesigning workflows to allow mental health evaluation and treatment protocols to fit the context of primary care practice. PCPs report significant time pressure, poor control over workflow and intensity, and frequently chaotic working environments (Linzer et al., 2009), conditions that limit opportunities for the more intense, time-consuming assessments, education, and active treatment protocols needed to provide high-quality mental health care (Rubenstein et al., 1999). Conversely, psychiatrists and other mental health professionals have found it especially difficult to alter their typical 30- to 50-minute undisturbed therapy sessions to respond to the often immediate demands of primary care practice (Gask et al., 2010).

Integrate Reimbursement for the Time and Resources Needed to Provide Mental Health Treatment in the PCMH

As we have noted, integrated care for depression is associated with a modest increase in total health care cost, mostly attributable to the costs of visits for monitoring treatment and improved adherence to medications (Simon et al., 2001). At the same time, current reimbursement mechanisms do not provide sufficient resources for team-based care and care coordination activities, creating a barrier to implementation of the PCMH (Berenson and Rich, 2010; Pham, Peikes, and Ginsburg, 2008). While those with mental health problems encounter these and other financial barriers to peer-support and illness self-management services (Mauch, Kautz, and Smith, 2008), additional structural problems with reimbursement of mental health treatment need to be addressed if integration is to occur. As management of mental health
problems has moved from inpatient and institutional settings to managed behavioral health care organizations (MBHO) over the past three decades, parallel changes have occurred in the types of mental health care available, how much care is provided, and how it is covered (Frank and Glied, 2006). Although accompanied by relatively flat spending, greater access to care, and higher quality, these changes in financing have also helped sustain the segregation of mental health and general medical care. For example, MBHOs typically require separate coding and billing procedures, prohibit mental health personnel from billing for services provided in nonmental health settings, and pay at levels below the cost of the services provided. New financing and reimbursement mechanisms that retain the benefits of MBHOs while mitigating their detrimental effects on integration will be needed if the PCMH is to include treatment for mental health problems. As one expert emphasizes, “All roads to integration in the PCMH go through payment reform (Larry Green, University of Colorado, expert panel meeting on February 17, 2010).”

Although the Mental Health Parity and Addiction Equity Act of 2008 addresses disparities in payment for physical and mental health services, it does not specifically address these financing and reimbursement challenges; moreover, the effects of new parity rules are not clear. At the least, the long public debate over parity has raised awareness of the costs of mental health care and could thus provide additional motivation for integrating primary care and mental health care providers if health insurers see integration as a way to improve health outcomes while controlling costs.

Create a Roadmap for Implementation and Performance Assessment

While many primary care practices provide care consistent with PCMH goals, the transition for PCPs would introduce new processes and procedures that could disrupt established workflows and overwhelm staff trying to maintain patient care (Nutting et al., 2009), especially over the short term and in the absence of external support. A staged approach to implementation of the PCMH overall, and to integration of mental health services in particular, could help practices cope with a large-scale and potentially overwhelming transformation. Such an approach may not, however, suit medical practices attempting simultaneously to balance the priorities of credentialing organizations, insurance plans, and government funders, each of which might require or advise a different set of activities for implementing system or practice redesign, payment reforms, or quality improvement.

To resolve potentially competing priorities, key stakeholders will need to collaborate to provide the leadership required to develop guidance and technical assistance for those involved in planning for and implementing the PCMH, and they should help coordinate the activities of various governmental and nongovernmental organizations involved with the PCMH and those involved in other delivery system and payment reform initiatives. In addition to academic research studies and formal demonstration programs, ongoing experimentation and experience from real-world settings may offer guidance on the key steps of implementation, required time and resources, and a logical sequence of implementation that builds on the infrastructure, knowledge, and skills acquired during the previous steps. Technical assistance, particularly important for small practices, should assist providers in setting goals and expectations,
developing a timetable for implementation, and employing tools to monitor progress. PCPs could also be assisted in learning how to adapt various models of integration based on the specific practice size and setting and the availability of mental health and other support services in their community.

It will be essential to develop performance measures that will encourage adoption of the PCMH and integration of mental health while providing a source of ongoing feedback and identifying opportunities for improvement. Many important structural measures, such as the requirement for registries, have already been developed but need to be adapted to incorporate mental health problems. In addition, accreditation standards could develop and adopt “symptom-based” performance measures that would assess processes of care between the time symptoms were first reported and the time a diagnosis was made and would thus mitigate well-documented problems in recognition and diagnosis of mental health problems. (Croghan et al., 2006). Medical home certification standards might require practices to demonstrate that staff has the appropriate skills to address patient mental health needs, the proactive mechanisms for detecting mental health problems, and the processes to ensure coordination among providers. Ultimately, outcomes-based measures that include assessment of mental health status should be adopted.

**Determine the Most Effective and Cost-Effective Implementation Mechanisms for Populations With Complex Mental Health Problems**

Many mental health problems, such as depression, are characterized by poor self-esteem and feelings of worthlessness; they are not easily recognized by patients or providers and are associated with stigma. Much research has focused on helping PCPs identify mental health problems and engage patients in treatment, but less research has examined how to monitor outcomes, coordinate care, and improve continuity—all essential elements of the PCMH. Such research is particularly important to identify effective strategies for implementing PCMH to meet the needs of children with mental health problems, people with SMI, and those with substance use disorders. In some situations, the frequency with which these disorders occur; the poor quality of current care; and the development of brief screening, diagnostic, and treatment tools suggest considerable benefit from treating patients with mental health conditions in primary care settings. On the other hand, many such patients require high-intensity specialty care. Facilitating and coordinating their access to ongoing preventive and primary care services, as well as to such nonhealth-related human services as education, housing, and rehabilitative services, presents a significant challenge. Research must test the most effective and cost effective PCMH models for serving the needs of these populations. In addition, it will be important to develop decision support tools that allow both primary and specialty care providers to recognize quickly when integrated services are needed and the mechanisms that facilitate access to such services.

**Create and/or Disseminate the Tools Needed by PCPs to Provide High-Quality, Patient-Centered Services**

Creating guidance and offering technical assistance for implementing PCMH will help PCPs determine how and when mental health services should be introduced into their practices. Research on integrated services for special populations will help identify who should receive
services and where services should be delivered. Providers will still need to decide what, to whom, and when services should be provided. Valid and reliable screening, diagnostic, and monitoring instruments should be available for routine use in primary care practices. Yet screening tools alone will not result in improved mental health outcomes; therefore, physicians, nurses, and other staff should be trained in their use. Consistent with recent recommendations of the U.S. Preventive Health Services Task Force (O’Connor et al., 2009), routine screening should only be conducted when appropriate staff-assisted depression care supports, such as those outlined throughout this paper, are in place. A consistent set of mental health and substance use tools should be selected and introduced into the larger PCMH toolbox. PCMH staff also should be trained in appropriate treatment and intervention tasks, including methods to deliver psychosocial interventions such as motivational interviewing. In addition, they should become skilled in the types of communication needed for patient-centered care, including informed decisionmaking, patient participation in the design of treatment plans, and instruction in self-management techniques. These technical and communication competencies should be included in licensure and credentialing requirements at both the provider and practice levels.

Concluding Comments

Many studies have demonstrated that high-quality mental health and substance use services may often be delivered in primary care settings. Moreover, because mental health and substance use problems are among the most common conditions seen in primary care settings and frequently co-occur with other medical problems, PCPs are often in the best position to identify, diagnose, and treat them. These facts alone make it clear that the PCMH will not reach its full potential without adequately addressing patients’ mental health needs. Doing so, however, will likely shift responsibility for the delivery of much mental health care from the mental health sector into primary care, a change many stakeholders will likely oppose. For example, some patients might resist “medicalization” of their emotions while PCPs may view mental health treatment as complicated and burdensome. Psychiatry training programs and MBHOs might perceive the emphasis on mental health treatment in primary care settings as impinging on their revenues and workforce. Thus, including all stakeholders in a coordinated planning and implementation process will be critical to the success of efforts to integrate mental health treatment into primary care settings.
References


Gerstle RS. E-mail communication between pediatricians and their patients. Pediatrics 2004;114:317-21.


