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Collaborative Care for Depression in Primary Care: How Psychiatry Could "Troubleshoot" Current Treatments and Practices

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The bulk of mental health services for people with depression are provided in primary care settings. Primary care providers prescribe 79 percent of antidepressant medications and see 60 percent of people being treated for depression in the United States, and they do that with little support from specialist services. Depression is not effectively managed in the primary care setting. Collaborative care based on a team approach, a population health perspective, and measurement-based care has been proven to treat depression more effectively than care as usual in a variety of settings and for different populations, and it increases people's access to medications and behavioral therapies. Psychiatry has the responsibility of supporting the primary care sector in delivering mental health services by disseminating collaborative care approaches under recent initiatives and opportunities made possible by the Affordable Care Act (ACA†).

INTRODUCTION

"Psychiatry is becoming a major trouble shooter in modern society; promises and hopes are great, at times too great; fulfillment of them will come only if we are guided by the spirit of science and by a strong social conscience." Thus Fritz Redlich, former chair of the Yale Psychiatry Department and the former dean of the Yale School of Medicine, concluded in his seminal work, *Social Class and Mental Illness: A Community Study* [1]. Mental health services traditionally were provided by mental health professionals; licensed

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†Abbreviations: SSRIs, selective serotonin uptake inhibitors; DTCA, direct to consumer advertising; PHQ-9, Patient Health Questionnaire-9; STAR*D, Sequenced Treatment Alternatives to Relieve Depression; IMPACT, Improving Mood-Promoting Access to Collaborative Treatment trial; ACA, Affordable Care Act; COPD, chronic obstructive pulmonary disease; DM, diabetes; CHD, coronary heart disease; AHRQ, Agency for Healthcare Research and Quality; VA, Department of Veterans Affairs; PC-MHI, Primary Care-Mental Health Integration; PCMH, primary care-based patient-centered medical home; ACO, accountable care organization; NCQA, National Committee for Quality Assurance.

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mental health practitioners provided professional service to people with mental health needs. Today, however, primary care has become the *de facto* mental health service provider [2]. With the growing realization that common mental illnesses are increasingly being presented and treated outside of their traditional treatment contexts, collaborative care models involving the participation of psychiatrists in primary care need to be considered in order to expand patient access to specialists and to improve the effectiveness of mental health care.

PRIMARY CARE AS THE *DE FACTO* MENTAL HEALTH SYSTEM

Nearly 60 percent of the total number of patients being treated for depression in the United States receive treatment in the primary care sector [3]. Patients with depression constitute 5 percent to 10 percent of patients seen in primary care clinics [4]. Recent estimates suggest that the bulk of mental health services are now provided outside traditional mental health venues. The percentage of single-modality mental health services (medication only) delivered in the primary care sector increased by 150 percent from 1990 to 2003, and the primary care sector is currently the largest modality to deliver mental health services across all sectors [5]. Despite the promise that mental disorders would be treated more efficiently by virtue of this shift, the data show that many patients requesting treatment in this sector either did not receive treatment, had incomplete clinical assessments, or did not obtain appropriate ongoing monitoring in accordance with accepted standards of care [6]. For example, Von Korff et al. found that only 25 percent to 50 percent of patients with depressive disorders were accurately diagnosed by primary care physicians [7]. In addition, among those who were accurately diagnosed, 50 percent received doses lower than those recommended by expert guidelines, and less than 10 percent of patients received a minimally adequate number of psychotherapy visits [8]. In addition, two-thirds of primary care physicians reported in 2004 to 2005 that they weren't able to refer patients to specialist mental health services — a rate that was at least twice as high as that of other services [9].

DEPRESSION IN PRIMARY CARE

Recent evidence indicates that patients with depression die 5 to 10 years earlier than patients without this psychiatric disorder. The causes of death are similar to those of the general population — vascular disease, diabetes, asthma/chronic obstructive pulmonary disease (COPD), and cancer — not suicide or other psychiatric manifestations of their depression [10]. Distress, medical comorbidities, and functional impairment associated with chronic medical conditions often increase the severity of depression [10]. A study by Druss et al. in 2008 found that people with depression had nearly three times as many chronic medical conditions as people without depression [11]. Even after adjusting for variables like income, comorbidity, and insurance status, persons with depression who are not in treatment are more likely to have not seen a primary care doctor and are more likely to have lower rates of appropriate preventive services than persons without depression [11]. Depression's symptoms, such as poor motivation and hopelessness, could be important factors in the lack of medical care and low adherence to medical treatment regimens. Patients with chronic medical illness and comorbid depression or anxiety reported significantly higher numbers of medical symptoms, compared to those with chronic medical illness alone, when researchers controlled for the severity of the medical disorder [12]. In addition, depression worsens the course and increases the risk of complications for coronary heart diseases (CHD) and diabetes (DM). Patients with CHD and depression comorbidity have a 2.4 times higher all-cause mortality rate when compared to patients with CHD alone [13]. Likewise, patients with DM and depression comorbidity have increased risks of microvascular and macrovascular complications and increased risk of all-cause mortality when compared to patients with DM alone [13].

Along with improving the quality of care and the health of the population, cost considerations are part of the triple aim in current health care reform [14]. It has been shown that patients diagnosed with depression have higher annual health care costs ($4,246) when compared with those without depression ($2,371) [15]. A diagnosis of depression is associated with a generalized increase in use of health services, and this greater medical utilization exceeds the direct treatment costs for depression for it includes other categories of care, including specialty care, inpatient care, pharmacy claims, and laboratory study claims [15]. This increase in cost could be contained by treating depression, since in patients diagnosed with both depression and chronic comorbid medical diseases, antidepressant drug adherence was associated with an increased comorbid disease medication adherence and reduced total medical costs over a 1-year period [16].

ANTIDEPRESSANT MEDICATIONS

Antidepressants are currently the most prescribed class of medication in the United States (264 million prescriptions in 2011, followed closely by lipid regulators at 260 million) [17]. In terms of spending, the United States spent $11 billion on antidepressant medications in 2011, slightly more than what was spent on HIV medications ($10.3 billion) and antiulcerants ($10.1 billion) [17]. Psychiatrists and other mental health specialists prescribe only 21 percent of antidepressant medications; the rest are prescribed by non-specialists, mainly primary care providers [18]. From 1997 to 2006, psychotropic medication usage has increased in all its modalities, including off-label use and polypharmacy, in particular, with little indication of concurrent changes in illness severity or comorbidity [19]. Although rates of psychotherapy remained constant during the 1990s, the proportion of the U.S. population using a psychotropic drug increased from 3.4 percent in 1987 to 8.1 percent by 2001 [20]. This increase represents both the expanded use of psychotropic medication in populations where drug efficacy is established and its extension to new patients, for whom the marginal benefits are less clear [20]. The increase in use can be partially explained by the development of better-tolerated and more effective drugs, e.g., selective serotonin reuptake inhibitors (SSRIs), and the expansion in health coverage for mental illness made possible through the Mental Health Parity Act of 1996 [21]. Another contributor to the increased utilization is "direct-to-consumer advertising" (DTCA) campaigns. Research shows that individuals exposed to these campaigns are more likely to choose medication rather than psychotherapy to treat their symptoms [21]. Despite an increase in the rate of provision of mental health services and in the overall spending on antidepressant medications from 2002 to 2012, there has not been a corresponding decline in the prevalence of mental disorders or of suicidality [22]. This paradox could be explained partially by the lack of effective practices in diagnosing and treating depression, which I explore in the next section.

EFFECTIVE TREATMENT OF DEPRESSION

In his report on mental health, the Surgeon General highlighted the growing gap between the efficacy and the effectiveness of treatment for depression. He noted that this gap is most pronounced in the primary care sector [3,23]. To be treated effectively, depression must be recognized and treated adequately — with the proper treatment and dosage and for the appropriate duration.

Recognition

Depression is accurately diagnosed only 25 percent to 50 percent of the time in a primary care setting [7,8]. To establish a diagnosis, the treating physician must recognize that there is an emotional problem with the patient in order to initiate conversation about treatment. The physician's attitude plays a role, as it has been shown that the physician's active listening (eye contact, posture, and absence of verbal interruptions) and ability to ask questions with psycholog-

ical content are associated with the ability to identify a patient's emotional problems [24]. This association was shown to be independent of the physician's social, academic, attitudinal, and professional characteristics and independent of the sociodemographic characteristics of the patients, the time spent in exploration during the office visit, and the severity of the emotional or somatic disorder [24]. Also, the physician's comfort in discussing mental health issues plays an important role. A recent study showed that even when patients are interested and ask questions about treatment for depression, physicians' responses to these questions were varied in quality, and patients who asked more questions perceived their physicians' communication to be worse [25]. This suggests that encouraging patients to ask questions by itself won't improve the quality of treatment, unless it is accompanied by increased education and training for primary care physicians. Competing demands also influence the rate of treatment of depression. Medical attention to depression during a given medical visit is inversely related with the number or recency of the patient's physical complaints and not greatly affected by the severity of the patient's depressive symptoms [26]. There are also some patient-specific factors: Clients who are less enthusiastic about depression treatment are less likely to reveal their symptoms, especially in the context of having many other somatic complaints [27].

Proper Treatment

The evidence for the efficacy of using antidepressant medications to treat depression in the primary care setting is well established. This includes moderate or severe depression (i.e., a current major depressive episode) and milder symptoms that have persisted for 2 years or more (i.e., dysthymic disorder) [28]. Efficacy is not clearly established for subthreshold or minor depression (i.e., depressive symptoms neither persistent nor severe enough to qualify for diagnosis of dysthymic disorder or major depressive episode) [28]. Because milder symptoms are more likely to resolve spontaneously, antidepressive drug use tends to be less cost-effective in people with subthreshold or mild syndromes [29]. Patients with milder forms of depression should be encouraged to try time-limited, evidence-based psychotherapies. The American Psychiatric Association practice guidelines for the treatment of patients with major depressive disorders emphasize the use of different psychotherapies, including cognitive behavioral therapy, interpersonal therapy, and behavioral activation, as a first modality to be used for mild to moderate depression, anxiety, and eating disorders [30]. Observance of such guidelines will likely increase the effectiveness of care.

Correct Dosage

More than half of patients treated with antidepressant medications in primary care settings receive doses smaller than those recommended by expert guidelines [28]. The high rates of inadequate dosing appear to reflect both the prescription of subtherapeutic doses by physicians and patients' usage of lower doses than prescribed [28]. As shown by the STAR*D study, remission of depression symptoms was consistently associated with a better prognosis than was simple improvement [31]. In addition, many prescribing practices, such as underdosing, poor titration, and combining antidepressants have not been scientifically evaluated. In treating depression, the aim should be to reach remission; "less depressed" should not be the goal for depression treatment, in the same way that "less hypertensive" is not the goal for treatment of hypertension [32].

Appropriate Treatment Duration

Guidelines emphasize that treatment must continue for at least 4 weeks in order to assess clinical efficacy and for at least 6 to 8 months in order to achieve sustainable remission [30]. However, evidence shows that 42.4 percent all of patients who were prescribed antidepressant medications discontinued them during the first 30 days, and only 27.6 percent of patients continued antidepressant treatment for more than 90 days [33]. This pattern will likely result in a lower

percentage of people achieving remission, assuming that antidepressant medications were indicated in the first place.

COLLABORATIVE CARE

The concept of collaborative care [34] was developed to address the shortcomings of depression diagnosis and treatment in the primary care sector. This model was influenced by the work of Wagner and his colleagues [35], developed to address a similar shortcoming in the treatment of chronic medical illnesses like hypertension and diabetes. For example, Otschega et al. found that in 2006 only one-third of Americans with hypertension received effective treatment to lower blood pressure below recommended levels [36]. The realization that this complex issue required coordination and a team-based approach, rather than individual sporadic interventions, led to the development of the chronic illness model of care [37]. Like the chronic illness model, collaborative care emphasizes a population-based approach, with measurement-based and stepped care [38]. The collaborative care model defines the patient not by location (i.e., a person with this illness in my clinic), but by the illness diagnosed, and extends the team's responsibility to the treatment of any person in a specific community with the illness. Periodic measurement of depression symptoms and patients' registries have to be established to track patients' progress. Collaborative care models emphasize coordination and a team-based approach, in which a psychiatrist functions as a consultant to primary care doctors in their treatment of depression and a behavioral care manager coordinates the care. Cases are proactively identified through instrument screening like PHQ-9 and brief behavioral therapies are offered if needed. Patients are treated mainly by primary care doctors, following medication guidelines developed specifically for the setting. Patient progress is monitored through regular checkups and instrument use, and psychiatrists provide support and consultation to primary care providers for cases that fail to improve. In-person consultation between the psychiatrist and the patient follows when indicated [13]. Collaborative depression care programs have been shown to be more effective than standard care in improving depression outcomes in the short and longer terms [39], as well as in improving social and physical functioning, and they increase satisfaction with care for patients and primary care providers alike [40]. Simon et al. found that a stepped collaborative care program for depressed primary care patients led to substantial increases in treatment effectiveness and only moderate increases in costs [41]. Like many interventions in mental health and general medical care, achieving better clinical outcomes requires additional initial expenditures. However, evidence shows that collaborative care for management of depressive disorders provides "good economic value" [42]. The Community Preventive Services Task Force in 2012 recommended collaborative care models for management of depressive disorders in primary care settings based on strong evidence of the model's effectiveness in improving depression symptoms and increasing adherence to treatment, response to treatment, and remission and recovery from depression [43]. In addition, in a 2012 review, the Cochrane Database concluded that collaborative care is associated with significant improvement in depression and anxiety outcomes, compared with the results for usual care, and that collaborative care represents a useful addition to clinical pathways for adult patients with depression and anxiety [44].

The strong evidence in favor of collaborative care has fueled a number of large-scale dissemination and implementation efforts. These include, among others, the Agency for Healthcare Research and Quality (AHRQ) Partners in Care program, the MacArthur Initiative on Depression and Primary Care, the Robert Wood Johnson Foundation's Depression in Primary Care program, and the U.S. Department of Veterans Affairs (VA) Primary Care-Mental Health Integration (PC-MHI) program [45].

There are many obstacles to implementing collaborative care models in the

current health care system, including rigid health care delivery systems, inflexible financial compensation schemes, and outmoded billing practices. However, models for success, such as the University of Washington's IMPACT program (impact-uw.org) [46] and others, have proved that it can be done.

The Affordable Care Act (ACA) that was passed in 2010 in the United States provides many opportunities to redesign the fragmented mental health system. It substantially increases the funding for new programs and tools, such as health homes, interdisciplinary care teams, and collaborative care [47]. Some provisions of the ACA offer extraordinary opportunities, for example, they reimburse previously unreimbursed services, confront complex chronic comorbidities, and adopt underused evidence-based interventions [48]. Primary care-based patient-centered medical homes (PCMHs) and accountable care organizations (ACOs), which are encouraged under the ACA, could be very valuable structures for disseminating collaborative care models. As currently defined by the National Committee for Quality Assurance (NCQA), to qualify for a Level 2 medical home will require a primary care clinic to demonstrate population-based approaches for quality improvement for three chronic illnesses, one of which must be a behavioral disorder such as major depression [40,49]. Psychiatry should take advantage of these new models of health care delivery and financing to advance the implementation of collaborative care models for depression. This will be an important step toward improving the treatment of depression in primary care and achieving the triple aim of improving the quality of care, the health of the population, and to contain cost [14].

CONCLUSION

The primary care sector is becoming the *de facto* mental health system; 60 percent of persons being treated for depression get their treatment through their primary care provider. Although this may increase access to mental health services, it has been shown that depression in the primary care setting is underdiagnosed and frequently is not appropriately or effectively treated. Many provider and patient factors influence this situation. Collaborative care approaches have been proven to improve care for depression in variety of settings and populations. Psychiatry should play a leadership role in disseminating these models, taking advantage of the new health care delivery methods like Accountable Care Organizations (ACOs) and new financial incentives under the Affordable Care Act to achieve the triple aim in depression management in primary care.

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