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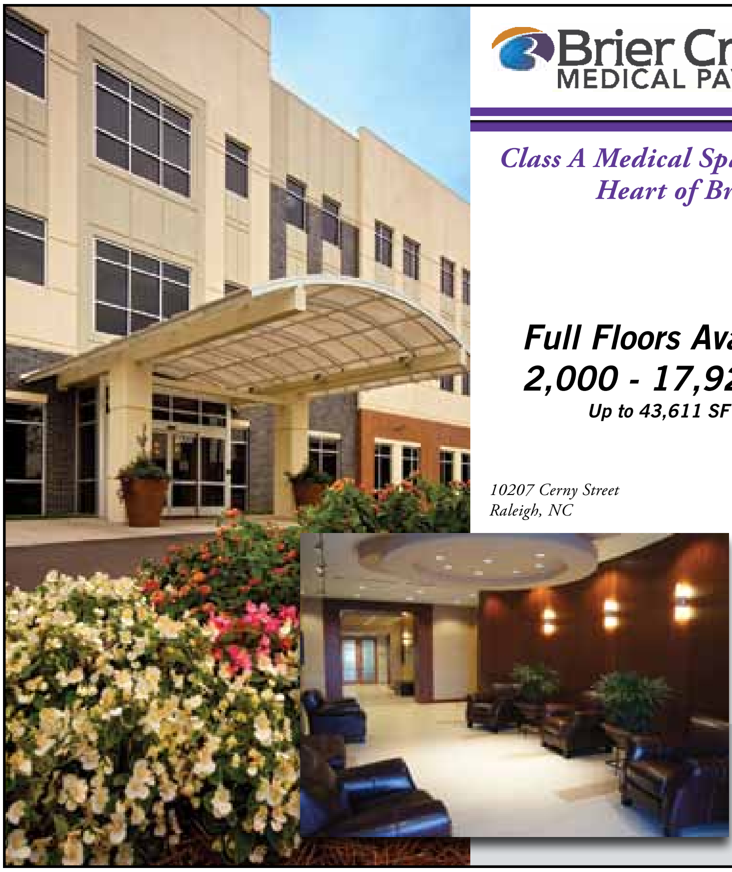

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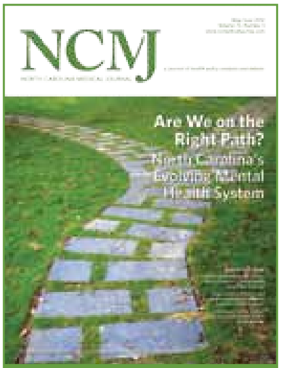

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Original Articles

Policy Forum
North Carolina's Evolving Mental Health System

INTRODUCTION

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DEPARTMENTS

Health Reform in North Carolina

Reader Services

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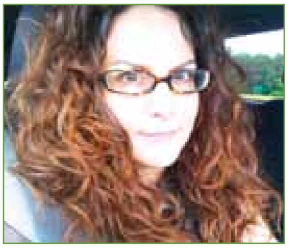
Tar Heel Footprints in Health Care

A periodic feature that recognizes individuals whose efforts—often unsung—enhance the health of North Carolinians

Cherene Allen-Caraco, QMHP, QDDP



When Cherene Allen-Caraco moved to Charlotte, North Carolina and observed gaps in the state's mental health system, she quickly became involved in efforts to identify solutions in the Mecklenburg County community. In her role as director of Mecklenburg's PROMISE, Allen-Caraco promotes the concept of mental health recovery. Where traditional approaches emphasize stabilization and maintenance, this recovery model for mental health treatment differs in that its primary emphasis is on hope and the ability of an individual to thrive and lead a productive, meaningful, and valued life despite his/her mental health condition.

Allen-Caraco's combination of professional and lived mental health experience gives her valuable perspective. Kim Franklin, PhD, a colleague at Meridian Behavioral Health Services, speaks highly of Allen-Caraco's passion and commitment as well as her strength as a credible and articulate consumer advocate. She says, "Cherene is one of the strongest recovery champions in North Carolina. ... She knows how to wrestle with the complex issues the state is facing."

About 6 years ago, Allen-Caraco helped to found Mecklenburg's PROMISE, a peer-run mental health community resource. Staffed by individuals in recovery themselves, Mecklenburg's PROMISE not only serves as a leader and resource for recovery in the community, but it is also a striking example of what recovery and wellness can look like for individuals with mental health conditions. Mecklenburg's PROMISE offers recovery education and training to behavioral health professionals and paraprofessionals, individuals in recovery, and the community in addition to peer support programs. Mecklenburg's PROMISE promotes collaboration between behavioral health professionals, individuals in recovery, and their family members and serves as a resource for any member of the community. In 2007, it was named the North Carolina Program of Excellence for Consumer-Directed Support.

In addition to her work at Mecklenburg's PROMISE, Allen-Caraco serves as a mental health consultant with The Council on Quality and Leadership (CQL), which offers consultation, accreditation, and training services to organizations across the nation. She consults with groups such as provider organizations, state and local governing authorities, advocacy and peer organizations, and hospital systems. She helps the committed organizations integrate principles of recovery into their services and cultivate recovery culture through both practice and organizational change.

Colleagues speak highly of Allen-Caraco's efforts and her contribution to mental health initiatives throughout North Carolina. Franklin says, "Cherene has been instrumental in keeping North Carolina accountable and focused on recovery." Another colleague, Debbie Dihoff, MA, from the National Alliance on Mental Illness (NAMI) North Carolina says, "Cherene does a wonderful job orienting everything to achieve the best possible health for people. She always finds time to do the extra work that makes a big difference in the lives of people with mental illness in the state."

Allen-Caraco earned her bachelor degree at the University of Syracuse, and is currently studying psychiatric rehabilitation at the University of Medicine and Dentistry of New Jersey. NCMJ

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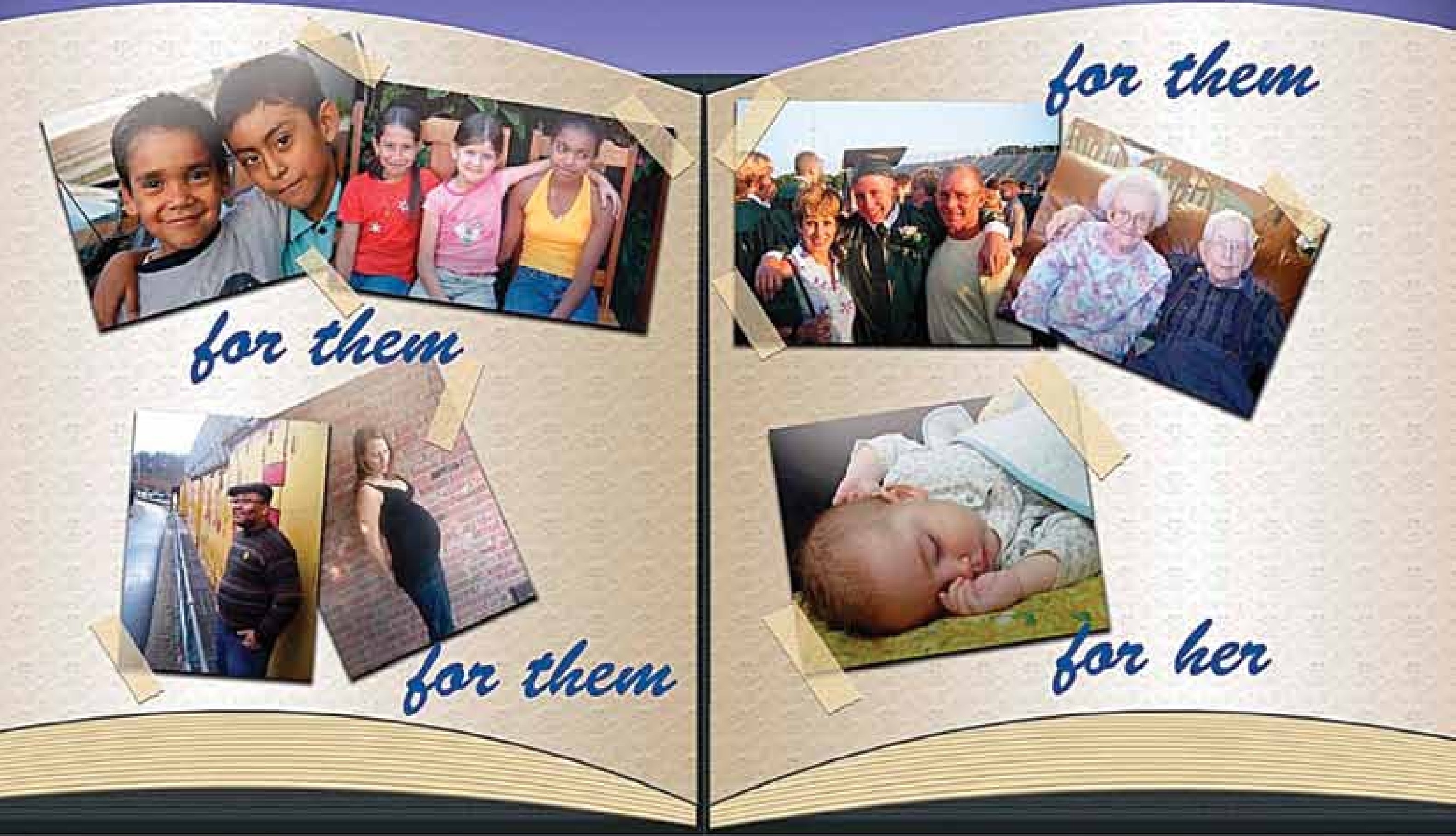

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ORIGINAL ARTICLE

North Carolina's Mental Health Workforce:
Unmet Need, Maldistribution, and No Quick Fixes

Kathleen C. Thomas, Alan R. Ellis, Thomas R. Konrad, Joseph P. Morrissey

BACKGROUND Recent data show a maldistribution of psychiatrists in North Carolina and critical shortages in some areas. However, only 11 entire counties have official mental health professional shortage designation.

METHODS This paper presents estimates of the adequacy of the county-level mental health professional workforce. These estimates build on previous work in 4 ways: They account for mental health need as well as provider supply, capture adequacy of the prescriber and nonprescriber workforce, consider mental health services provided by primary care providers, and account for travel across county lines by providers and consumers. Workforce adequacy is measured at the county level by the percentage of need for mental health visits that is met by the current supply of prescribers and nonprescribers.

RESULTS Ninety-five of North Carolina's 100 counties have unmet need for prescribers. In contrast, only 7 have unmet need for nonprescribers, and these counties have inadequate numbers of prescribers as well. To eliminate the deficit under current national patterns of care, the state would need about 980 more prescribers.

LIMITATIONS Data limitations constrain findings to focus on percentage of met need rather than supplying exact counts of additional professionals needed. Estimates do not distinguish between public and private sectors of care, nor do they embody a standard of care.

CONCLUSIONS North Carolina is working to develop its mental health prescriber workforce. The Affordable Care Act provides new opportunities to develop the mental health workforce, innovative practices involving an efficient mix of professionals, and financing mechanisms to support them.

North Carolina has been concerned about the adequacy of its mental health professional workforce for some time now. In 2007, the state undertook a workforce study that documented ongoing shortages of mental health professionals. Most people who needed mental health care were not receiving it. When people did receive care, families were not satisfied with the quality or continuity of care. Findings also indicated that the problem of mental health professional shortage was likely to worsen, both as a result of population growth and because of stressors that could lead to increased need, such as plant closings and combat deployment of family members [1]. Recent reports have continued to document unmet need for care that will likely be exacerbated by state Medicaid budget shortfalls [2,3]. These problems are national in scope and are not unique to North Carolina [4].

The most recent study of North Carolina's mental health professional workforce examined the state's supply of psychiatrists, finding maldistribution, with critical shortages in some areas, and the potential for problems to increase over time [5]. In 2004 North Carolina ranked 20th among states in number of psychiatrists relative to population, with 1.05 psychiatrists per 10,000 population for the state as a whole; however, 44 of the state's 100 counties met the criterion for federal designation as a shortage area, having fewer than 0.33 psychiatrists per 10,000 population. Moreover, this maldistribution appeared to be getting worse. From 1995 to 2004, nearly two thirds of North Carolina counties experienced a decline in number of psychiatrists relative to their population or remained without any psychiatrists.

Mental health system reform efforts have made it more difficult for mental health professionals to practice in North Carolina. North Carolina's most recent reform legislation, the Mental Health System Reform Act of 2001, sought to shift the focus of care and accountability from state hospitals to communities and to shift providers from public area programs to private settings. The goals were to increase efficiency, to support innovation, and to promote best practices [6]. However, these reforms asked the mental health workforce to treat public patients for less than they could charge for private-pay patients while being flexible in the face of changing settings and practices and to provide innovative care and adopt best practices for the individuals who were most difficult to treat [7]. Failure to shift resources from state hospitals to accountable community care has exacerbated these difficulties [8].

In an effort to ease provider shortages nationally, the Bureau of Health Professions of the Health Resources and

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Services Administration designates geographic areas as mental health shortage areas when prescribed documentation is provided. Designated shortage areas become eligible for important resources that can be used to help recruit 6 types of mental health care providers: advanced practice psychiatric nurses, licensed professional counselors, marriage and family therapists, psychiatrists, psychologists, and social workers. National Health Service Corps placements help new mental health professionals pay off their student loans in return for a commitment to work in a designated shortage area. Foreign-trained psychiatrists can obtain a J-1 visa waiver that allows them to work in the United States for an extended period when they agree to work in a designated shortage area. In addition, psychiatrists who practice in designated shortage areas receive a 10% bonus payment from Medicare. In September 2011, only 11 entire counties in North Carolina were designated as having a shortage of mental health professionals [9]. For counties with limited resources, the difficulty of documenting shortage may be one barrier to applying for designation as a shortage area.

This paper assesses the adequacy of the current mental health professional workforce by determining the percentage of need for mental health professionals that is met within North Carolina counties. The goals are to describe geographic disparities, to identify those counties that could most benefit from applying for Health Resources and Services Administration shortage designation, and to discuss additional measures that could be taken to address maldistribution and shortage. The estimates of met need provided here build on previous work in 4 ways: they account for need for mental health services as well as provider supply; they capture shortage of all 6 types of mental health professionals considered in the Health Resources and Services Administration designation protocol; they take into account mental health services provided by primary care providers; and they account for travel across county lines by providers and consumers.

Methods

Conceptualizing adequacy of the mental health professional workforce. Adequacy of the mental health workforce was measured using the percentage of need for mental health visits that is met within a county. Measuring adequacy this way improves upon earlier efforts by taking into account variation in need as well as supply of professionals [5]. Full details of the methods used to assess need and supply, as well as national findings, are reported elsewhere [10-12]. The methods are described briefly here.

County-level need was assessed across the entire adult community, taking into account need among adults with serious mental illness and among adults without serious mental illness. Children's need was beyond the scope of this study, as were both the need for treatment that specifically addresses substance use disorders and the adequacy of the workforce for providing such treatment.

County-level supply was assessed for the 6 types of mental health professionals supported through the Health Resources and Services Administration shortage designation program: advanced practice psychiatric nurses, licensed professional counselors, marriage and family therapists, psychiatrists, psychologists, and social workers. Because prescribers and nonprescribers clearly are not functionally substitutable, psychiatrists were counted as prescribers and all others were counted as nonprescribers. (Advanced practice psychiatric nurses have the authority to prescribe in North Carolina with physician oversight, but data do not exist to assess the extent to which they prescribe.) Although each profession has a unique approach to mental health care, it was not practical to make finer distinctions among providers. Also, although other groups (such as personal aides and registered counselors) provide services to people with mental health needs, this analysis focused on providers who are educated at the master's or doctoral level and can be licensed to diagnose and treat mental disorders

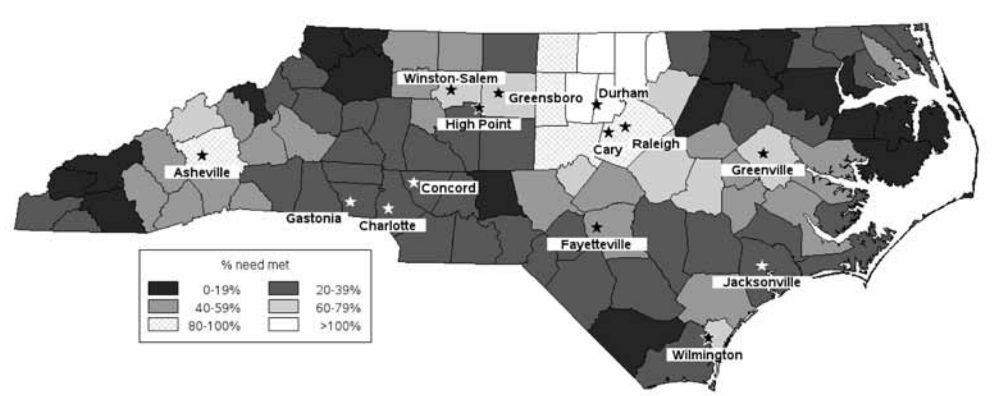
Measuring adequacy of the mental health professional workforce. County-level need for outpatient mental health services was estimated using 3 national sources of data. The National Comorbidity Survey Replication was used to model serious mental illness status as a function of demographic characteristics [13]. Serious mental illness was determined based on diagnosis, disability, and duration [10]. This model was applied to Census 2000 data to estimate county prevalence of serious mental illness [14]. County-level need was estimated as the sum of the need of individuals with serious mental illness, estimated from the National Comorbidity Survey Replication, and the need of individuals without serious mental illness, estimated from the Medical Expenditure Panel Survey [15]. In both datasets need was based on estimates of the actual number of provider visits associated with the population, converted into provider full-time equivalents. County-level estimates of need were deflated to adjust for mental health services provided by primary care providers [16]. County-level supply of mental health professionals was compiled from professional associations, state licensure boards, and national certification boards. Professional counts were converted to full-time equivalents to represent the volume of county need that is met. To account for travel across county boundaries, county-level estimates of need and supply were smoothed using a weighted average of estimates from counties within an hour's travel time [17-19].

Workforce adequacy was measured as the percentage of each county's need for mental health services that was met by the county's supply of mental health professionals (100 × supply/need). Percentage of met need is presented separately for prescribers and nonprescribers. This measure of met need yields scores that range from zero (for counties with no mental health professionals) to less than 100

TABLE 1.
Percentage of Need Met for Mental Health Professionals in North Carolina, by County

County	Percentage of need met	
	for prescribers	for nonprescribers
Alamance	91.5	453.6
Alexander	27.9	169.5
Alleghany	11.0	129.4
Anson	22.7	263.1
Ashe	11.2	242.4
Avery	37.5	284.4
Beaufort	57.9	276.1
Bertie	11.9	82.1
Bladen	21.0	138.2
Brunswick	26.0	247.0
Buncombe	89.5	652.5
Burke	52.5	190.0
Cabarrus	28.2	290.5
Caldwell	27.7	184.1
Camden	34.6	232.4
Carteret	36.2	226.7
Caswell	88.1	401.2
Catawba	34.3	193.6
Chatham	97.2	509.5
Cherokee	26.0	182.1
Chowan	15.0	149.2
Clay	26.2	191.8
Cleveland	30.2	224.8
Columbus	0.0	99.8
Craven	49.4	255.7
Cumberland	44.4	246.4
Currituck	20.6	195.9
Dare	15.9	321.5
Davidson	37.4	289.2
Davie	44.0	310.8
Duplin	21.9	120.7
Durham	155.0	661.5
Edgecombe	22.6	174.5
Forsyth	65.1	428.5
Franklin	68.5	375.8
Gaston	31.3	263.4
Gates	36.1	195.3
Graham	15.4	185.5
Granville	184.4	538.1
Greene	49.7	230.3
Guilford	60.5	434.7
Halifax	14.7	100.5
Harnett	40.4	255.7
Haywood	54.8	492.0
Henderson	56.4	431.9
Hertford	25.4	91.0
Hoke	36.3	200.1
Hyde	0.0	9.1
Iredell	38.8	285.7
Jackson	43.9	508.1
Johnston	59.9	323.2
Jones	29.7	196.5
Lee	69.5	393.5
Lenoir	45.0	212.2
Lincoln	30.5	233.4
Macon	15.4	316.5
Madison	69.5	524.7
Martin	31.8	208.8
McDowell	52.7	323.3
Mecklenburg	38.9	399.7
Mitchell	3.8	151.5
Montgomery	16.2	108.1
Moore	51.0	246.3
Nash	10.9	127.5
New Hanover	74.7	419.1
Northampton	10.0	89.2
Onslow	22.5	250.5
Orange	184.1	801.5
Pamlico	38.7	224.6
Pasquotank	40.0	227.8
Pender	43.4	290.8
Perquimans	25.5	154.3
Person	157.5	527.0
Pitt	64.2	356.5
Polk	45.2	322.0
Randolph	35.1	279.2
Richmond	20.3	122.9
Robeson	31.8	121.7
Rockingham	34.0	255.7
Rowan	38.3	294.1
Rutherford	31.9	177.0
Sampson	28.5	120.8
Scotland	33.8	172.5
Stanly	28.2	280.9
Stokes	47.9	293.4
Surry	48.5	277.5
Swain	18.7	336.0
Transylvania	51.4	516.3
Tyrrell	0.0	86.6
Union	25.1	314.8
Vance	103.4	448.7
Wake	95.7	542.9
Warren	22.2	83.2
Washington	17.9	110.4
Watauga	26.7	341.3
Wayne	65.2	181.2
Wilkes	7.4	145.2
Wilson	46.5	278.0
Yadkin	44.4	309.6
Yancey	58.9	487.0

FIGURE 1.
Percentage of Need for Prescribers That Is Met in North Carolina Counties



(for counties with some mental health professionals, but not enough to meet need), to more than 100 (for counties with more than enough professionals to meet need). A table reports the percentage of need for prescribers and nonprescribers that is met in each county. Maps show the geographic distribution of these county-level estimates of met need. Overall scores for the state are calculated by aggregating need and supply estimates from the county level and represent the percentage of the state's need that is met.

This study was exempt from human research ethics oversight because the study employed only aggregate or de-identified data.

Results

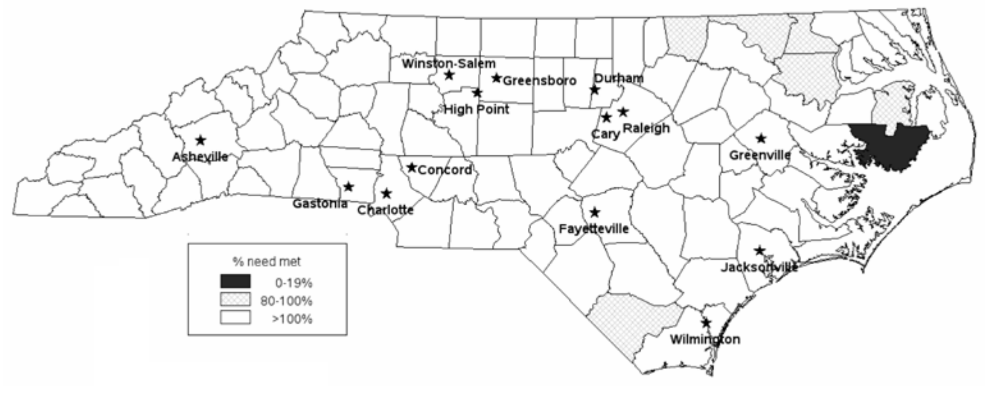
Across North Carolina counties, the percentage of need for prescribers that is met ranges from 0% to 184% (Table 1). Three-quarters of North Carolina counties have fewer than half the number of prescribers required to meet county needs. On the other hand, 5 adjacent counties (Durham, Granville, Orange, Person, and Vance) in the central Piedmont area of the state have more than 100% of their need for prescribers met, indicating an excess over and above what is needed by their local populations. For nonprescribers, the percentage of need met ranges from 9% to 801% (Table 1). Only 7 counties (Bertie, Columbus, Hertford, Hyde, Northampton, Tyrrell, and Warren) have some unmet need for nonprescribers, whereas 3 counties (Buncombe, Durham and Orange) have more than 6 times the number of nonprescribers required to meet county-level need. Overall, the supply of prescribers in North Carolina meets only 53% of the state's need. To make up the deficit under current national patterns of care, North Carolina would need more than 980 additional prescribers. In contrast, North Carolina has 3 times the needed number of nonprescribers. Need for a nonprescriber may be filled by any type of nonprescriber, but the need for prescribers cannot be filled by nonprescribers.

North Carolina's prescribers are concentrated in or near counties with major medical centers and state psychiatric hospitals (Figure 1). Where prescriber unmet need is the most extreme (darkest areas in Figure 1), nonprescriber unmet need exists as well (shaded areas in Figure 2).

Discussion

These estimates of met need for mental health professionals in North Carolina counties take into account both the need for services and the supply of 6 types of profes-

FIGURE 2.
Percentage of Need for Nonprescribers That Is Met in North Carolina Counties



sionals, both prescribers (psychiatrists) and nonprescribers (advanced practice psychiatric nurses, licensed professional counselors, marriage and family therapists, psychologists, and social workers). The estimates show widespread unmet need and highlight the geographic disparity across counties. Examination of nonprescribing mental health professionals indicates that unmet need and maldistribution exist there as well, but with less severity.

Ideally, we would like to be able to estimate the number of additional mental health prescribers and nonprescribers needed on a county-by-county basis. We are not able to do this because of limitations in the data and methods used. Instead, this paper presents the percentage of need for providers that is met within each county. Estimates of the number of additional providers needed are sensitive to assumptions about the amount of provider time needed by individual patients [20]. The provider time estimates, in turn, are based on recent national patterns of use, and such patterns change over time. In addition, there are important distinctions not captured by our estimates of met need. Our methods do not take hospital catchment areas into account. To the extent that North Carolina's large medical centers in conjunction with the state's Area Health Education Center programs meet the mental health needs of multiple counties, met need in the state's rural areas may be underestimated. On the other hand, to the extent that professionals provide services exclusively in hospitals or prisons, making them unavailable to provide outpatient services to local populations, county met need may be *overestimated*. Moreover, the estimates do not distinguish public and private sector practitioners. Unmet need may be more extreme for public sector services if existing providers do not serve publicly funded patients in proportion to their level of need. Importantly, these estimates were derived from current national utilization patterns and do not represent a standard of care.

What is North Carolina doing to improve workforce adequacy now? Under current practice patterns, North Carolina is short nearly 1,000 prescribers. It's unlikely that North Carolina can simply lure them from other states, because shortages are widespread nationally. Across all US counties, the median percent need met for prescribers is only 26% [11]. Nonetheless, North Carolina is doing better than other states in attracting mental health professionals [8].

Training additional psychiatrists is one clear way to address current shortages, but training programs struggle with high costs, and with the challenges of attracting medical school graduates into psychiatry and of retaining psychiatry residents in underserved areas following training [21-23]. These efforts alone will not resolve the prescriber shortage problem.

A lack of data has hampered efforts to understand and alleviate workforce maldistribution and shortages [4]. For example, although Durham and Orange counties have an excess of prescribers to meet county need, Duke University and University of North Carolina hospitals treat people across the state. If these counties had only enough providers to meet their own county needs, there would be insufficient numbers to staff their university psychiatry services. In 2010, North Carolina was awarded a state health workforce planning grant from the Office of Workforce Policy and Performance Management, Health Resources and Services Administration, to work on these issues [24].

One way of "virtually" redistributing the concentration of prescribers to meet both county and university psychiatry service needs is through telepsychiatry [25, 26]. The Department of Psychiatric Medicine at the Brody School of Medicine, East Carolina University, has such a program [27]. Virtual conferencing can support treatment plan development, medication management, and best practice guidelines in areas with unmet need for prescribers. Virtually extending university-based prescribers so that they can collaborate with nonprescribing professionals, who are distributed more broadly across the state, may help North Carolina to meet a greater proportion of its mental health needs.

There are two innovative efforts in North Carolina to address unmet need for prescribers by training nonphysician prescribers. The first is a 2-year program based in the School of Nursing at the University of North Carolina at Chapel Hill for advanced practice psychiatric nurses. Now in its eighth year, the Psych NP-NC program trains nurses with prescriptive authority to independently manage the mental health care needs of clients by functioning as psychotherapists and case managers in a variety of public, private, community, inpatient, and collaborative practice settings, and as consultants for hospitals and community organizations [28]. This program provides a mix of onsite and distance learning in an effort to allow students to continue working in communities across the state while receiving training. An important goal of the program is to graduate new advanced practice psychiatric nurses who are already established professionals in counties with unmet need for mental health professionals. A total of 74 nurses have graduated from the program and now practice in 67 North Carolina counties. In addition, the Duke and Southern Regional Area Health Education Centers started a 10-month pilot skill-enhancement training program in January 2012 for physician assistants and nurse practitioners who already work with large numbers of patients with behavioral health needs. The first cohort of 10 trainees will participate in intensive seminars focused on the behavioral health of adults, adolescents, and children, including case conferences and psychiatric consultations.

Taking full advantage of shortage designation incentives available from the National Health Service Corps of the Health Resources and Services Administration may help North Carolina to attract and retain recently graduated mental health professionals [29]. Historically, the Corps programs have focused mainly on primary care physicians and nonphysicians. However, there have always been a few psychiatrists involved. The most recent 2003 reauthorization legislation for the Corps expanded the number of eligible disciplines to include a number of nonphysician mental health providers, including marriage and family therapists, mental health social workers, and clinical psychologists, as well as psychiatric nurse practitioners. In recent years, a rapid expansion of the Corps has taken place as a result of funding appropriated by health reform legislation. The recent impact of these federal programs specifically on North Carolina's mental health workforce has yet to be documented, although evaluation studies are under way to examine deployment and long-term retention [24].

What else can North Carolina do to improve workforce adequacy? There is a real need for North Carolina to put more resources into the mental health system so that it functions well and becomes an attractive place for mental health professionals. These efforts need to take place across the entire state in order to address maldistribution as well. Developing practice strategies that take advantage of the relatively higher supply of nonprescribers could be an efficient approach. The findings presented here are derived from current practice patterns, but the Patient Protection and Affordable Care Act (Affordable Care Act, Pub L No. 111-148) provides new opportunities to develop the mental health professional workforce, by encouraging innovative practices that use an efficient mix of professionals and by establishing financing mechanisms to support them. North Carolina has received some federal funding already, and additional funds may become available in the future [30].

The Affordable Care Act offers the potential to invest in the development of the mental health workforce in a variety of ways. There may be an opportunity for schools to obtain grants to support training programs in mental health–related disciplines (social work, postgraduate-level general and geriatric psychology, professional and paraprofessional child and adolescent mental health) that emphasize team-based service, epidemiology and public health (§5203, §5301, §5305, §5306, §5315) [31]. These grants are designed with a special focus on historically black colleges and universities, and North Carolina should be especially well poised to take advantage of this program. Grants to states may support rural physician and mid-career public health and allied health training, planning for workforce development strategies, development of community-based linkages to support health professionals working in designated shortage areas, and cultural competence training for those who provide services to individuals with disabilities (§5102, §5205, §5206, §5307, §5309, §5606). There is support for training community health workers (§5313), patient navigators (§3510), and the direct care workforce (§5302), all of whom can provide critical support for the state's mental health professionals. There is continued investment in the National Health Service Corps and in loan repayment programs as well, with an emphasis on physicians providing pediatric behavioral health services in rural areas (§5201, §5207, §10501) [32].

The Affordable Care Act provides opportunities to support a better distribution and mix of mental health professionals as well. North Carolina's local management entities for public mental health services can merge into accountable care organizations that will have more control over the distribution of the mental health professional workforce [33]. Accountable care organizations can make use of practice innovations and economies of scale to overcome the challenges of acquiring responsibility for counties with unmet need for providers [34]. Expanded investment in community-based services such as community health centers and community acute psychiatric beds, coupled with mandated insurance coverage of patients, can provide incentives for mental health professionals to spread out throughout the state, rather than concentrating so much in urban areas. In turn, the role of state hospitals will narrow, focusing on the provision of forensic and long-term rehabilitation services, so that fewer mental health professionals will be needed at those facilities. With regard to finding the most efficient mix of mental health professionals, the Affordable Care Act supports innovations in medical homes (§3502) [35]. Nurse-led medical homes could shift reliance among mental health professionals [36]. Community-based psychiatric health teams and transition teams could also rely more on nonprescribers. Telepsychiatry to support patient-clinician and clinician-clinician communication could help generalists and nurse practitioners extend mental health professional capacity in rural areas [37]. The location of primary care providers within psychiatric service settings would free psychiatrists from having to provide basic medical services and nonprescribers from having to link consumers to primary care providers (§5604) [38]. New roles for nonprescribers may be developed to support integration of peer-support and social services, such as housing and employment for consumers [39].

Payment reform strategies developed through the Affordable Care Act can support the mental health professional workforce in new kinds of practice collaborations. For example, the act authorizes support for the following things: demonstration projects to develop medical home models, including funding strategies for community-based health teams (§2703, §3024, §3502, §10333); community-based transition teams that can provide services after hospital discharge (§3026); global capitation schemes for safety-net hospitals that could support hospitals to care for the mental health needs of people in their communities (§2705); new models and funding mechanisms for emergency psychiatric care (§2707); and dedicated funding for innovative services reimbursement that supports better outcomes in general (§3021, §3126).

Planning and demonstration projects are already under way in North Carolina to support mental health professional workforce development and innovative deployment [24, 37, 40-43]. If North Carolina can capitalize on these new opportunities, the prospects for an adequate mental health workforce in the future will be greatly improved. NCMJ

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ORIGINAL ARTICLE

Depressive Symptoms and Academic Performance of North Carolina College Students

Dana P. Turner, Michael E. Thompson, Larissa R. Brunner Huber, Ahmed A. Arif

BACKGROUND Depression negatively affects cognitive functioning and, consequently, academic performance. Studies of this association have yielded conflicting results and have not fully considered other factors that may play a role in academic performance. This study examines the relation between depression and academic performance in students at a large urban university in North Carolina.

METHODS We analyzed data from student responses to the 2008 cross-sectional National College Health Assessment to create categories of depressive symptomatology. E-mail invitations to participate in the assessment were sent to 8,000 students at the university in an effort to obtain at least 900 responses, the minimum number considered valid for a campus of its size. We analyzed the responses of the 1,280 undergraduates who completed the survey. Logistic regression analyses were performed to examine associations between depressive symptoms and academic performance in this group.

RESULTS Students in the second, third, and fourth quartiles of depressive symptomatology had increased, though statistically non-significant, odds of having a lower cumulative grade average, even after adjustment for age, sex, year in school, race/ethnicity, substance use, and level of credit-card debt. This difference was most pronounced among students in the second quartile of depressive symptomatology.

LIMITATIONS This cross-sectional study did not allow for evaluation of causality. In addition, the self-report nature of this questionnaire could have led to some inaccuracy in reporting.

CONCLUSIONS Students reporting even a small number of depressive symptoms may be at increased risk for academic problems.

Findings from the Global Burden of Disease study indicate that depression is the world's leading cause of disability [1]. Data from the National Health and Nutrition Examination Survey 2005-2006 revealed that, in any 2-week period, 5.4% of Americans 12 years of age or older were depressed [2]. In the year 2000, depression costs in the United States (including direct medical costs, suicide-related mortality costs, and workplace costs relating to diminished productivity) totaled more than $83.1 billion [3].

The rate of depression in college students is higher than that in the general population [4]. Depression was the fourth most common health problem reported by college students on the American College Health Association (ACHA) National College Health Assessment (NCHA) in the NCHA Spring 2007 survey; 18.4% of respondents reported having experienced depression sometime within the past year [5]. Elsewhere it has been reported that students are increasingly seeking out campus services for help with depression [6].

Because depression has a negative effect on cognitive functioning, it can affect academic performance [7]. Several studies have shown a relationship between academic performance and depression in college populations [7-12], but others have not [13-14]. The relationship may not be linear; students experiencing moderate depressive symptoms do not necessarily perform worse academically than those with a mild or normal level of symptoms [9]. Many researchers have examined the association between depression and academic performance as a minor aspect of some other issue that they have taken as their main focus of study [8, 12-14]. Consequently, these examinations have taken into account very few of the variables that are potential confounders of the relationship.

A review of the literature suggests that many factors may be associated both with depression and with academic performance. Gender is one such factor, and gender differences in depression have been studied in both adults and adolescents [15-17]. Researchers have shown that race or ethnicity [18] and use of tobacco, alcohol, or illicit drugs [19-21] are other factors associated with both depression and academic performance. Financial difficulties also are related to both depression and academic achievement [8]. To date, researchers have not fully examined the effects of variables such as age, sex, year in school, and race or ethnicity on this association, nor have they considered the potential roles of substance use and financial problems, both of which often affect college students. We know of no studies reporting the association between depression and academic performance for college students in North Carolina.

Our study takes data collected at a large urban university in North Carolina in the NCHA Spring 2008 survey

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and uses it to evaluate the association between depressive symptoms and academic performance in college students.

Materials and Methods

The NCHA solicits information on a variety of health issues and their impact on student academic performance. The survey is available to universities each fall and spring semester. In the Spring 2008 semester, 106 campuses participated in the assessment [22]. ACHA has conducted reliability and validity analyses for the items on this survey [23]. The institution in our study administers the NCHA each spring semester, employing survey sampling and administration procedures that are consistent with NCHA protocols [23]. For a university of its size, ACHA recommends a response sample of at least 900 [23]. An e-mail invitation was sent to 8,000 randomly selected students. A total of 1,535 students responded to the invitation and completed the survey, yielding nearly twice the minimum desired number of responses; this yield is consistent with that for administration of the survey at this school in previous years. Only the responses of the 1,280 undergraduates who participated are included in our analysis. The collection of NCHA data on this campus and our plans for secondary analysis of it were reviewed and approved by the university's Institutional Review Board. Participants provided informed consent prior to beginning the survey.

Variables. Selected data from the NCHA [24] were abstracted into a de-identified dataset for this secondary analysis. Control variables were selected for inclusion based on a review of the literature. Cross-sectional data of this sort permits the construction of correlational models but does not permit assessment of causality. The outcome and exposure variables described below, therefore, are classified as such for purposes of statistical modeling and hypothesis generation.

The potential confounding variables that we examined included socio-demographic variables such as age (in years), sex, race or ethnicity, year in school (year 1 through 5 or more as an undergraduate), and level of credit-card debt (none, \$1-\$1,000, or more than \$1,000). The outcome variable was cumulative grade average; this was self-reported as "mostly As," "mostly Bs," and so on; for analysis, we recoded these responses into two categories: A/B and C/D/F.

Students recorded the frequency with which they experienced depressive symptoms within the past 12 months (never, 1-2 times, 3-4 times, etc). But the main exposure variable, depressive symptom level, was constructed from a series of 6 questions regarding the frequency during the past year with which students had felt things were hopeless, had felt overwhelmed, had felt exhausted, had felt very sad, had felt so depressed that they had difficulty functioning, or had seriously contemplated suicide. This set of items demonstrated high internal consistency (Cronbach's $\alpha = 0.859$). Each of these 6 depressive symptom items had 7 response categories ranging from "never" to "11 or more times in the past year." Each response category was assigned a value from 1 to 7, with "never" receiving a value of 1 and "11 or more times" receiving a value of 7. The values from each question were then summed to produce a depressive symptom score between 6 and 42. This approach yielded a measure that represented both the breadth and the frequency of symptoms experienced. Given the underlying imprecision in such responses and the nature of the score distribution, the scores were collapsed into quartiles for analysis.

Several potential confounder variables were recoded. Categories for year in school, race or ethnicity, substance use, and level of credit-card debt were collapsed because of the small number of responses for some categories.

Analysis. Participants with incomplete responses were included in the analyses of the variables for which they had responses. The race/ethnicity question received the lowest number of responses, with 1,196 students providing answers. All other variables had more than 1,200 responses. Frequencies and percentages were calculated for nominal and ordinal variables (sex, year in school, and race/ethnicity); mean and standard deviation were calculated for age. Bivariate analyses (χ^2 test for trend) were used to determine the relationship between cumulative grade average, depressive symptoms, and the suspected confounders (sex, year in school, race or ethnicity, each substance used, and credit-card debt).

Binary logistic regression was performed to provide a crude association between the depressive-symptom quartiles and cumulative grade average, as well as to identify other risk factors for a low cumulative grade average. Logistic regression was used to predict categorical outcome variables (a cumulative grade average of A/B or C/D/F) from exposure variables (level of depressive symptoms and the other risk factors). Crude odds ratios provided information on the association between the outcome variable and each individual exposure variable. To assess confounding, all variables were entered into the logistic regression model at the same time, and adjusted odds ratios and 95% confidence intervals were computed. Variables whose odds ratios changed by 10% or more in the multivariate model were considered to be confounders that should be considered for inclusion in subsequent multivariate analyses [25]. Finally, the Hosmer-Lemeshow test for goodness of fit was conducted to determine how well the model fit the data.

Results

One fourth of study participants (25.2%) reported a cumulative grade average of C, D, or F (Table 1). Men and non-Hispanic black students ($P < .001$, χ^2 test), as well as those with a modest (\$1-\$1,000) level of credit-card debt ($P < .003$, χ^2 test) made up a higher proportion of those with a cumulative grade average of C, D, or F than did women, students of other races or ethnicities, and those with either no credit-card debt or credit-card debt of more than \$1,000.

The constructed depressive symptomatology scale yielded a non-normal distribution. Consequently, nonparametric summary statistics are reported (eg, medians and quartiles rather than means). The quartile scores were used as cut points to condense the information into an ordinal ranking. The median depressive symptom score for all participants (shown in Table 2) was 15 (range 6, 42; interquartile range 11, 20). The median depressive symptom scores within each quartile are also noted in Table 2. Students in the first depression quartile (ie, those with the lowest level of symptoms of depression) were least likely to report having C, D, or F grades (only 23.0% of them did so), and those in the fourth quartile (those with the highest level of symptoms) were mostly likely to report C, D, or F grades (29.3% of them did so), but this trend was not statistically significant (P = .257). Participants who reported ever having been diagnosed with depression constituted 12.7% of the respondents. Of those students who had been diagnosed with depression, 63.7% fell into the fourth quartile, the category with highest level of depressive symptoms, and 17.2% fell into the third quartile, which had the next-highest level of depressive symptoms.

Unadjusted odds ratios. In the unadjusted analysis, students whose depressive-symptom scores fell into the second, third, or fourth quartile had higher odds than did those in the first quartile of reporting a cumulative grade average of C, D, or F, with those in the second quartile having the highest odds of all—an odds ratio (OR) of 1.388 (95% CI, .968-1.991) (Table 3). Males were significantly more likely (OR = 1.565; 95% CI, 1.203-2.035) to report a C, D,

TABLE 1.
Cumulative Grade Averages of Students with Various Demographic and Behavioral Characteristics

Student characteristic or behavior	Cumulative grade average A/B, no. (%)	C/D/F, no. (%)	Total no.	P[a]
Sex				
Female	621 (77.7)	178 (22.3)	799	0.001
Male	301 (69.0)	135 (31.0)	436	
Year in school (undergraduate)				
1st	234 (79.3)	61 (20.7)	295	0.280
2nd	182 (73.1)	67 (26.9)	249	
3rd	281 (73.8)	100 (26.2)	381	
4th	163 (74.1)	57 (25.9)	220	
5th or higher	57 (69.5)	25 (30.5)	82	
Race/ethnicity				
White, non-Hispanic	728 (77.9)	206 (22.1)	934	<0.001
Black, non-Hispanic	81 (57.0)	61 (43.0)	142	
Hispanic or Latino	34 (79.1)	9 (20.9)	43	
Asian or Pacific Islander	34 (68.0)	16 (32.0)	50	
Other	21 (77.8)	6 (22.2)	27	
Substance use during past 30 days				
Cigarettes	146 (62.9)	86 (37.1)	232	<0.001
Cigars	45 (56.3)	35 (43.8)	80	<0.001
Smokeless tobacco	26 (60.5)	187 (39.5)	43	0.027
Alcohol	526 (71.6)	209 (28.4)	735	0.002
Marijuana	84 (61.3)	53 (38.7)	137	<0.001
Cocaine	11 (61.1)	7 (38.9)	18	0.180
Amphetamines	15 (50.0)	15 (50.0)	30	0.002
Other drugs	21 (61.8)	13 (38.2)	34	0.077
Level of credit-card debt				
None	644 (78.4)	177 (21.6)	821	<0.001
$1-1,000	149 (65.4)	79 (34.6)	228	
> $1,000	114 (68.3)	53 (31.7)	167	
Total	927 (74.8)	313 (25.2)	1240	

[a] P value (calculated by means of χ^2 test) for association between the demographic or behavioral characteristic and cumulative-grade-average category.

TABLE 2.
Percentages of Students in Each Quartile of Depressive-Symptom Score Who Have a Cumulative Grade Average of C, D, or F or a Diagnosis of Depression

Quartile	Depressive-symptom score Median (Range)	Cumulative grade average of C/D/F[a] (%)	Ever diagnosed with depression[b] (%)
1st	8 (6-10)	23.0	6.4
2nd	12 (11-14)	26.8	12.7
3rd	17 (15-20)	23.8	17.2
4th	26 (21-42)	29.3	63.7
All participants	15 (11-20)[c]	25.7	12.7

[a] P = .257
[b] P < .001, using χ^2 test for trend
[c] Interquartile range

or F grade average than were females. Upper classmen had higher odds of reporting C, D, or F grades than did freshmen, but the association was not statistically significant. For every 1-year increase in age, the odds of having a C, D, or F grade average remained the same (OR = 1.000; 95% CI, 0.966-1.034).

Black, non-Hispanic students were more than twice as likely as non-Hispanic white students to report having a cumulative grade average of C, D, or F (OR = 2.661; 95% CI, 1.845-3.840). The use of cigarettes, cigars, smokeless tobacco, alcohol, marijuana, and amphetamines all were associated with significantly increased odds of having a C, D, or F grade average (Table 3). Students with modest credit-card debt ($1-$1,000) had increased odds of having a C, D, or F grade average (OR = 1.140; 95% CI, 0.746-1.744), whereas students with more than $1,000 of debt were significantly less likely to have a C, D, or F grade average (OR = 0.591; 95% CI, 0.410-0.852).

Confounders and adjusted odds ratios. The adjusted analysis included all of the previously identified potential confounders. With adjustment, the odds ratios showing the likelihood of having a cumulative grade average of C, D, or F increased by more than 10% for all races and ethnicities other than Hispanic or Latino and decreased by more than 10% for every type of substance use, signifying that these variables are all likely confounders of the association between depression level and cumulative grade average. After adjustment, the associations between poor grades and the use of cigarettes, smokeless tobacco, or alcohol were all attenuated to levels that were not statistically significant. The association of poor grades with Asian or Pacific Islander ethnicity reached statistical significance, and the associations of poor grades with being male, identifying as a non-Hispanic black, smoking cigars, using marijuana, using amphetamines, or having more than $1,000 in credit-card debt all remained statistically significant (Table 3).

Compared with students whose level of depressive symptoms was in the first quartile, students in the second quartile of symptom level were nearly 50% more likely to report a cumulative grade average of C, D, or F, but this difference was not statistically significant (adjusted OR = 1.475; 95% CI, 0.975-2.234). The adjusted odds of having poor grades were also elevated for those in the third and fourth quartiles of symptom level, but those increases were not statistically significant and were lower in magnitude than the increase for students in the second quartile.

Goodness-of-fit. The Hosmer-Lemeshow test produced a non-significant P value (P =.07). This indicates that the proposed model adequately fits the data.

Discussion

Students whose depressive-symptom score fell into the second quartile had the highest odds of reporting a cumulative grade average of C, D, or F. This result differs from the finding of Heiligenstein and colleagues [10] that those who are the most depressed are the most functionally impaired. However, it is similar to the finding of DeRoma and colleagues [9] that those experiencing a moderate level of symptoms perform worse academically than those with symptoms that are milder or more severe.

That nearly three fourths of students who fell into either the third or fourth depressive-symptom quartile had been diagnosed with depression speaks to the utility of using cumulative depressive symptoms as a sensitive proxy for depression in university-based surveys and suggests that it is likely that many of these students had been undergoing treatment for depression. Using depressive symptoms as a proxy for depression might not be as precise as using a diagnosis of depression, but doing so is more economical in community settings and can identify undiagnosed but at-risk students for further follow-up.

Students, faculty, and staff members of the student health service should be made aware that even mild symptoms of depression may be associated with lower grades. Although most faculty members see mental health problems as having an effect on academic productivity [26], they may not know just how prevalent these symptoms are and how they affect students. They should be alerted to the fact that they need to be watchful not just for students who are overtly depressed, but also for those who display milder symptoms of depression. Because faculty members see both a student's grades and his or her behavior and demeanor in class, they may be in a better position to recognize that a student's academic performance is being impaired by depression than are other members of the campus community. Educational programs on this topic could be beneficial to faculty members and improve their interactions with students.

In some cases, subtle symptoms of depression may be difficult to detect through interpersonal means. The implementation of a program of required screening for depression can help detect potential problems and prevent students from experiencing the detrimental effects of untreated depression. Students experiencing low levels of depressive symptoms might otherwise go undiagnosed. Academic problems resulting from undiagnosed depression can affect students for the rest of their lives.

Students need to be made aware of the nature and magnitude of the risks posed by symptoms of depression. Depression must be destigmatized so that its potential consequences can be addressed proactively. The staff of the student health service should be made fully aware of the effects of depression so that they can plan health-education activities accordingly. Such activities should focus on making students aware of the possible threats to their health and to their academic performance posed by depression. Students should also be informed that depression during the college years is more common than they might think,

TABLE 3.
Crude and Adjusted Odds of Having a Cumulative Grade Average of C, D, or F

Student characteristic or behavior	Unadjusted odds OR (95% CI)	Adjusted odds OR[a] (95% CI)	Change with adjustment (%)
Depressive-symptom level			
1st quartile	1.000	1.000	
2nd quartile	1.388 (0.968-1.991)	1.475 (0.975-2.234)	6.27
3rd quartile	1.044 (0.716-1.523)	1.201 (0.790-1.826)	15.04
4th quartile	1.189 (0.813-1.740)	1.324 (0.867-2.021)	11.35
Age	1.000 (0.966-1.034)	0.974 (0.929-1.022)	-2.60
Sex			
Female	1.000	1.000	
Male	**1.565 (1.203-2.035)**	**1.646 (1.212-2.235)**	5.18
Year in school (undergraduate)			
1st	1.000	1.000	
2nd	1.412 (0.949-2.101)	1.451 (0.937-2.247)	2.76
3rd	1.365 (0.950-1.962)	1.168 (0.767-1.778)	-14.43
4th	1.341 (0.888-2.027)	1.306 (0.792-2.151)	-2.61
5th or higher	1.682 (0.973-2.911)	1.502 (0.781-2.889)	-10.70
Race/ethnicity			
White, non-Hispanic	1.000	1.000	
Black, non-Hispanic	**2.661 (1.845-3.840)**	**3.540 (2.336-5.365)**	33.03
Hispanic or Latino	0.935 (0.442-1.982)	0.998 (0.453-2.195)	6.74
Asian or Pacific Islander	1.663 (0.900-3.073)	**2.128 (1.093-4.142)**	27.96
Other	1.399 (0.804-2.433)	1.593 (0.864-2.939)	13.87
Substances used during past 30 days			
Cigarettes	**2.033 (1.499-2.757)**	1.336 (0.911-1.958)	-34.28
Cigars	**2.456 (1.548-3.898)**	**1.882 (1.094-3.235)**	-23.37
Smokeless	**1.997 (1.069-3.733)**	1.120 (0.511-2.455)	-43.92
Alcohol	**1.524 (1.164-1.995)**	1.149 (0.834-1.584)	-24.61
Marijuana	**2.044 (1.410-2.962)**	**1.586 (1.001-2.514)**	-22.41
Cocaine	1.903 (0.731-4.952)	0.657 (0.203-2.127)	-65.48
Amphetamines	**3.071 (1.483-6.356)**	**3.432 (1.456-8.086)**	10.52
Other	1.870 (0.925-3.779)	1.438 (0.611-3.384)	-23.10
Level of credit-card debt			
None	1.000	1.000	
$1-1,000	1.140 (0.746-1.744)	1.061 (0.664-1.696)	-6.93
>$1,000	**0.591 (0.410-0.852)**	**0.566 (0.369-0.866)**	-4.42

Numbers in boldface type are statistically significant.

[a] Adjusted for all of these potentially confounding student characteristics and behaviors.

so that those who suffer from depression can better understand that they are not alone. With that knowledge, they may feel more comfortable seeking help, which ultimately will improve their chances of succeeding in college.

The variables that we considered likely to be confounders (because they had an adjusted odds ratio that differed by more than 10% from the unadjusted ratio)—race or ethnicity and the use of substances such as cigarettes, cigars, smokeless tobacco, alcohol, marijuana, cocaine, amphetamines, or other drugs—should be considered, and adjusted for, in future analyses. Because the proposed model adequately fit the data, it likely will be useful for future research.

Limitations. Studies that are cross-sectional in nature, as ours was, only allow assessment of correlation, not evaluation of causality. It is possible that poor academic performance leads to depressive symptoms rather than depressive symptoms leading to poor academic performance. The NCHA survey is a self-reported instrument, and respondents may not have answered every question accurately, especially given the sensitive nature of some questions. If all participants had the same likelihood of providing inaccurate responses, nondifferential misclassification could have occurred, biasing the results toward the null hypothesis. In addition, the information available was not sufficient to determine whether survey respondents were demographically representative of the student population as a whole or whether nonrespondents differed in some way from respondents. Another limitation of our study is that the depressive-symptomatology scores we constructed, although highly reliable, cannot be linked to the diagnostic criteria for clinical depression.

This data is drawn from a single, large, urban university in North Carolina. The student population there is largely reflective of the state's total population of university students. Thus our findings should be generalizable throughout the state, and to similar urban universities in other states as well; these findings should prove useful in designing programs to address the pervasive effects of depression on college campuses.

Conclusions

Students experiencing even mild symptoms of depression are likely to be at risk for lower academic performance, and several factors could play a role in this relationship. Students in North Carolina and elsewhere could benefit from knowing more about this issue and its impact. Therefore, further research is needed in this area—specifically, longitudinal studies and additional efforts to validate the association between depressive symptomatology and clinical depression. NCMJ

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POLICY FORUM

North Carolina's Evolving Mental Health System

Introduction

This issue of the NCMJ tackles the problems and progress in behavioral health care in North Carolina. The terms "mental health," "behavioral health," "substance abuse," and "developmental disabilities" are all used in this issue. Each term has a different meaning. Together, they represent different, but often related sets of problems and often very different systems of care. This complexity is a function of the many ways in which health needs manifest themselves, as well as our tendency in health care delivery to specialize and compartmentalize care and systems of support. This diversity of taxonomy that arises in the labeling of health needs and problems reflects the diversity of issues that must be addressed in any system redesign.

The tone of many of the articles conveys a sense of crisis in the field and the need to continue to reform how we fund, manage, and deliver services for people with mental illness, substance use problems, or developmental disabilities. This ongoing sense of crisis is due to the frustration many feel when failures and breakdowns in the system become apparent and when lives are affected. The push for continued reform is motivated by the incomplete success of shifts in the locus of care, the funding of care, and the uneven assumption of responsibility for care across the health care delivery system as stakeholders and policy makers have tried to reform and re-orient the system.

Behavioral health faces a challenge of identity. The mental health, substance use, or intellectual and developmental disabilities that may be classified as problems are manifest in almost all cases in how a person interacts with others or with society and its structure. Those behaviors that cross the line into pathology may be generated by a singular force or a combination of forces, which include factors that are innate to the individual (ie, genetics), or external factors considered to be significant influencers of how an individual functions—from nurture to substance abuse. The classification of interactions as deviant or undesirable often depends on the response of the social structure around the individual.

Many of the conditions that require attention have a long gradient of intensity and severity, which tempts policy makers to try to identify cut-offs and thresholds that generally defy effective implementation of rules and treatment protocols. Due to this and a host of other reasons, there remains a strong aspect of "art" in the care of people with mental health or substance use disorders, and in the provision of services and supports for people with developmental disabilities. In addition, many of the people with mental illness, substance use disorders, or developmental disabilities have a co-morbidity in one of the other conditions. Providing appropriate services to people with mental health or substance use disorders, or to people with developmental disabilities is made all the more difficult by the many uncertain boundaries. In practice, providing services to people with mental health, developmental disabilities, or substance use problems creates an organizational and managerial challenge. This is a constant and has been reflected in how care was, is, and will be structured. Swartz and Morrissey observe that "…no single agency is in charge anymore," and this may reflect more the nature of the problems than the failure of the solutions. Unifying services for people with mental illness, developmental disabilities, or substance use disorders may only be the answer if we move towards unification with all health care-giving.

In North Carolina there is recognition that we can and must integrate behavioral health with somatic health when we speak of community-oriented and patient-centered health care. The continuity across caregiving paradigms requires broad acceptance of what might be seen as competing priorities and conflicting modalities. They must be reconciled for the total health of the population. **NCMJ**

Thomas C. Ricketts III, PhD, MPH
Editor in Chief

Public Behavioral Health Care Reform in North Carolina:

Will We Get It Right This Time Around?

Marvin Swartz, Joseph Morrissey

North Carolina seeks to provide affordable and high-quality care for people with mental health, developmental disabilities and substance abuse conditions by reforming its behavioral health care system. This article presents an overview of current efforts to achieve that goal and discusses the challenges that must be overcome if reform is to be effective.

The behavioral health system in North Carolina, as elsewhere in the United States, has historically faced many daunting challenges in the organization, delivery, and financing of care, leading to serious gaps in services and cycles of attempted reforms. Some of these challenges include the lack of capacity for community-based treatment, chronic shortages of behavioral health providers, and a shortage of state and local hospital capacity. As it faces these challenges, the state also has new opportunities. There is greater coordination and integration of care between primary care providers and behavioral health specialists; the state has expanded community hospital treatment capacity through 3-way contracts; there is greater capacity for crisis support; the number of Critical Access Behavioral Health Agencies has increased; and new models of delivery of services exist, such as telemedicine. In addition, the Affordable Care Act of 2010 and the Mental Health Parity and Addiction Equity Act of 2008 offer the potential to improve delivery and coordination of care while increasing the number of people eligible for insurance coverage. New behavioral health "carve-out" 1915(b)/(c) Medicaid waivers will give local communities greater flexibility to redesign behavioral health care, although such carve-outs may work at cross-purposes with the existing Enhanced Primary Care Case Management model offered under Community Care of North Carolina. The pace of these changes—particularly the rapidity of the statewide expansion of the Medicaid waivers—raises cautions about local capacity to build effective managed care organizations from the ground up. Will these new opportunities help the state transform its behavioral health system to address these persistent challenges?

Numerous reports, analyses, and commentaries have dissected and debated North Carolina's troubled efforts to reform its public behavioral health system over the past decade [1-8]. Despite legislative and fiscal uncertainties, new efforts are under way to overcome the shortfalls of the past and to get the public behavioral health system back on track to provide affordable and high-quality care to the many thousands of people with behavioral health conditions in North Carolina.

National Trends and Developments

Behavioral health care in the North Carolina and the nation is yet again at a crossroads. Dramatic changes in the treatment technologies, organization, and financing of behavioral health services and income supports since the deinstitutionalization of patients in state psychiatric hospitals in the early 1960s have substantially improved the well-being of persons with mental illnesses [9-13]; indeed, Frank and Glied describe the condition of people with such illnesses as "better, but not well" [12]. The passage of the Wellstone-Domenici Mental Health Parity and Addiction Equity Act of 2008 and the Affordable Care Act of 2010 (ACA) offers unprecedented opportunities to rethink and integrate general and mental health care, to guarantee at least minimally adequate mental health coverage, and to dramatically expand insurance coverage [14-16]. States have a major role to play in defining the services that will be included in the essential health benefit that will be available to small businesses and individuals who purchase new coverage after 2014 and in the benchmark plan that must be offered to people who are newly eligible for Medicaid. These reforms come with great uncertainty at a time when demands for health care cost containment have become politically undeniable and states are straining to pay their share of the state-federal Medicaid partnership that pays for the bulk of public behavioral health care. Ironically, the strain to pay for Medicaid-funded services may widen the gap between what we know works and what services are available.

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Part of this gap has arisen from declines in financial support for mental health and substance abuse treatment in the private and public sectors [11-13]. In the 1980s, as the costs of general health care rose, employers increasingly sought to control them through managed care cost-containment strategies wherein mental health and substance abuse services were "carved out" and managed as a separate benefit. Typically this entailed applying separate benefit and dollar limits to mental health and substance abuse treatment, a strategy made possible by the absence of a consistent legal mandate for insurers to provide mental health and substance abuse coverage on a par with other health care benefits—a problem now addressed through the Mental Health Parity and Addiction Equity Act and the ACA. However, these managed behavioral health care efforts led to massive reductions in mental health spending in private insurance plans: Mental health spending as a share of total spending fell from slightly more than 6% in 1988 to roughly 3% a decade later [13]. As a result, many behavioral health providers and psychiatric hospital services simply went out of business, dramatically weakening the behavioral health workforce and shrinking the supply of available alternatives to state psychiatric beds and public behavioral health services [9]. Emergency departments and primary care providers with scant treatment resources themselves began seeing an increasing number of psychiatric patients [17]. These trends in private insurance coverage shifted a substantial burden of care to public behavioral health services, primary care providers, emergency departments, and the justice system.

North Carolina Trends and Developments

North Carolina mirrored these national trends; however, compared with many states, we were slow to shift from reliance on state hospital beds to the provision of local community services; we were also slow to leverage state hospital funding for Medicaid-fundable community services. Indeed, as the state's supply of community psychiatric beds shrank dramatically, state hospital beds were left in place to fill the void. In the early 2000s, during the Easley administration, the ongoing performance problems of local mental health agencies and an overreliance on state hospital beds led the General Assembly to direct the Secretary of the North Carolina Department of Health and Human Services (DHHS) to overhaul North Carolina's public system of mental health, developmental disabilities, and substance abuse services (MHDDSAS) [3-6]. The Secretary's State Plan 2001: Blueprint for Change [18] called for the following changes: (1) The bed capacity of state psychiatric hospitals was to be reduced by 700 beds. (2) The previous 40 mental health area programs were to be converted into a smaller number of local management entities (LMEs) responsible for developing provider networks, assuring quality, and funding services at the local level. (3) The area program roles of administering and providing services were to be separated, creating a newly privatized system. LMEs would not provide any direct treatment or rehabilitative services as long as qualified private providers were available to do so, thereby avoiding the conflict of interest that many stakeholders believed was present when area programs functioned as both provider and funder of services. (4) All state mental health, substance abuse, and developmental disability dollars were to be targeted for the care of severely ill or impaired adults and children.

Funding for this transition was to come from a newly designated state trust fund, new Medicaid-funded services, and downsizing of the state hospitals. Many viewed this reform agenda as overly ambitious and poorly operationalized [3-4]. Rash discusses the history of the state's mental health system more fully in this issue [6].

Regrettably, subsequent downturns in the state economy made adequate funding for the mental health trust fund elusive, thwarting efforts to grow community treatment capacity; federal approval of new Medicaid services was significantly delayed; high demand for state hospital beds made bed reductions hard to accomplish, until the state mandated state hospital waiting lists; and reliance on poorly defined but generously reimbursed community support services led to ballooning Medicaid expenditures by the state, estimated at $400 million [17]. In a welcome corrective effort to reduce demand for state hospital beds and to address the dramatic shortage of local psychiatric bed capacity, the state legislature later identified new funding for hospitalizations for uninsured patients in so-called 3-way contracts, provided support for mobile crisis teams, and providing funding for local psychiatrists [6, 19-20]. Trantham and Sherry [19] and Murphy [20] describe the roles of mobile crisis and crisis intervention teams in this issue. Despite the new support for crisis services, shortages of state psychiatric beds have continued to lead to boarding of the most challenging patients in local hospital emergency departments [17]. Vicario discusses this problem more fully in his commentary in this issue [17]. At the same time, collaborative care efforts designed to build primary care capacity to manage behavioral health problems were encouraged, with the intention of easing pressure on specialty behavioral health providers and better integrating general and behavioral health care [21-22]. Dickens, Lancaster and Crosbie describe North Carolina's efforts to promote integrated care in primary care and behavioral health settings in their commentary [21], and Williams reviews the research literature about co-located and integrated care in his sidebar [22]. Despite some progress in building treatment capacity, mental health reform efforts during the Easley administration were largely viewed as inadequate in building effective community-based services.

Governor Beverly Perdue's election in 2008, accompanied by the appointment of new DHHS leadership, led to hoped-for mid-course corrections to reform efforts. One of DHHS's early major initiatives during the Perdue administration called for renewed clinical accountability and integration through the formation of Critical Access Behavioral Health Agencies (CABHAs), which were designed to restore medical leadership to provider agencies and to require them to become comprehensive service providers, rather than allowing them "cherry-pick" profitable services [23]. Another initiative promoted judicious expansion of Piedmont Behavioral Health's successful model program using the state's first 1915(b)/(c) Medicaid waiver [24]. However, optimism was soon quashed by the downturn in the economy, combined with the shift of the legislature to tighter fiscal conservatism. The new legislative leadership called for deep Medicaid cuts and for the passage of House Bill 916, which mandated rapid statewide extension of Medicaid 1915(b)/(c) waivers, coupled with widespread mergers of 23 LMEs into 11 newly created managed care organizations (MCOs) designed to administer capitated behavioral health services [24]. Shipman describes the history of Piedmont Behavioral Health's managed behavioral health care waiver [24], which was the precursor of the statewide waiver, and Terhune discusses the role that CAHBAs will play within the new managed care system [23]. Savidge and Stein also explain the opportunities that may be available under the waiver to improve the system of services and supports for people with substance abuse disorders [16].

Amidst these contested policies and in this charged political climate, Disability Rights North Carolina filed a complaint based on the US Supreme Court's Olmstead decision with the US Department of Justice, arguing that North Carolina is inappropriately institutionalizing people in adult care homes. Settlement of such cases in other states has required significant investments in community-based care [25-27]. Smith explains the underlying reasons for the Olmstead complaint in her commentary [25]; Melcher and Watson describe how the state hopes to respond to the concerns raised by the federal government [26]; and Farnham, in a sidebar, discusses how North Carolina can use some of the same strategies the state has employed in transitioning people out of other institutional settings to transition people with mental illness out of adult care homes [27].

This special issue of the NCMJ explores the countervailing challenges and opportunities at the intersection of federal and state health and mental health reforms, funding constraints, and litigation. Below, we focus on several key issues in this coming wave of behavioral health reform in North Carolina.

Key Issues for Consideration

Opportunities afforded by the ACA. Paradoxically, solutions to many of the current problems with public behavioral health care in North Carolina may come from national health care reform, not from further state-level reforms. The ACA and the Medicaid waiver expansion present multiple opportunities to redesign North Carolina's public behavioral health system [14]. Various provisions of the ACA provide 5 such opportunities for redesign.

First, states and federal agencies can test and evaluate improved financing and organizational arrangements to overcome the fragmentation of services that has led to poor quality and high cost of care. Second, provisions that promote comprehensive and coordinated care—the ones that encourage the development of patient-centered medical homes, for instance—should encourage more responsiveness to chronic disease comorbidities, such as severe mental illness and other serious chronic diseases or risks. Third, providers are encouraged to coordinate Medicaid behavioral health services with social services and housing supports that seek to prevent homelessness among people with severe mental illness. Fourth, the ACA allows providers to use preventive services and encourages those treating persons with severe mental illness to focus more on conjoint substance abuse education and treatment. And fifth, the act encourages the wider use of evidence-based practices such as assertive community treatment and supported employment, as well as model programs that develop and validate coordinated approaches to care delivery and payment.

These provisions do not take effect automatically, and the forthcoming Supreme Court review could affect the fate of the ACA considerably. The ACA provisions will require active planning and collaboration by the state, which must work with federal authorities, seeking approval to implement innovative practices that respond to current limitations regarding the way in which the public behavioral health system addresses the needs of people with disabling behavioral health conditions.

Managing current and future complexity. One fact often noticed but rarely understood is that, although the public MHDDSAS system and the human services bureaucracies that manage it have shrunk over the past 50 years, providing services to people with these conditions has become much more complex and is difficult to manage well [11-12]. In the 1950s, the public MHDDSAS system in North Carolina consisted of 4 state psychiatric hospitals, along with a separate array of substance abuse and developmental disabilities facilities. Most people with MHDDSAS conditions eventually spent time in these state facilities, and virtually all public funds flowed through the centralized state facilities system.

Today, these state facilities have shrunk to less than a fraction of their size in the 1950s. Many people with MHDDSAS conditions are never admitted to state psychiatric hospitals or facilities; following decades of mainstreaming efforts, people with these conditions can be found all over the community map. Funding for their care and support now flows from, and through, a highly decentralized and complex array of federal, state, and local agencies, including the Centers for Medicaid and Medicare Services, the US Social Security Administration, the Division of Social Services of the North Carolina DHHS, the state and federal criminal justice systems, agencies that provide supported housing, and school systems, as well as agencies that provide state support for inpatient and outpatient mental health care. The result is that the North Carolina Division of MHDDSAS no longer has exclusive jurisdiction over the main funding streams, policy levers, and direct services that affect the quality of life experienced by the large majority of people with MHDDSAS conditions. Indeed, no single agency is in charge anymore. Efforts to manage this array of providers, payers, and policymakers have become exceedingly complex, requiring much more in the way of negotiation with oversight and peer agencies, rather than traditional top-down directives within a single chain of command. As discussed below, demands to manage this complexity will dramatically intensify as North Carolina implements a new, publicly controlled, locally managed, "carved out," risk-based Medicaid managed care program.

Clinical services integration. One of the historic achievements of the community mental health center movement, represented in North Carolina by area programs, was the creation of comprehensive integrated service agencies—so-called "one-stop shops." Controversially, the breakup of area programs became the hallmark of the mental health reform effort of 2001. Responsibility for service provision was divested from area programs to a growing network of private service providers, each of whom entered into contracts with newly created LMEs for a specific set of remunerative services, delivered in defined geographic areas. One of the unanticipated consequences of this privatization was the increasing fragmentation of services. Coordination and continuity of care suffered mightily as each provider focused on its own service array. No single provider agency was tasked with taking—nor were the LMEs fully empowered to take—a comprehensive and integrated view of consumer needs and how best to meet them. In this environment, the market became flooded with many small, limited-service providers.

One DHHS response to this fragmentation was to create a new category of provider agency: the CABHA, which was designed to ensure that critical services are delivered by a clinically competent organization with appropriate medical oversight and the ability to deliver a more complete continuum of services [23]. The goal was to enhance the integration of clinical services while consolidating the provider marketplace by disqualifying small, single-service providers. By March 2012, more than 200 CABHAs had been certified across the state—far more than anticipated [28].

The state of the behavioral health workforce. Poor public and private funding, stigma, and marginalization of behavioral health services have all left the national behavioral health workforce in crisis; this largely low-status workforce is also poorly prepared to deliver empirically validated and culturally sensitive services [29]. Despite rapid population growth over the past 3 decades, large areas of North Carolina remain rural and lack an adequate supply of behavioral health professionals. Three-fourths of North Carolina counties have fewer than half the psychiatrists required to meet county needs [30]. On the other hand, 5 counties that are located adjacent to university medical centers in the central Piedmont area of the state (Durham, Granville, Orange, Person, and Vance) have several times the number of prescribers needed to meet the needs of their local populations [30].

Overall, the supply of prescribers in North Carolina meets only about half of the state's need. To make up the deficit under current national patterns of care, North Carolina would need nearly 1,000 additional prescribers. In contrast, North Carolina has 3 times the needed number of nonprescribers, albeit often inadequately trained ones. Although nonprescribers (psychologists, nurses, social workers, marriage and family therapists, and counselors) are often functionally substitutable for one another, they cannot function as prescribers due to scope of practice regulations and expertise constraints [30]. Several telemedicine initiatives and efforts to train advance practice professionals (eg, nurse practitioners, physician assistants) in behavioral health prescribing hold promise for partially addressing these shortfalls [31-32]. However, due to persistent state budget shortfalls and competing funding priorities, serious investment in the development of the behavioral health workforce has been sorely neglected.

Psychiatric hospital beds. One of the key conclusions of the State Auditor's Report that led to passage of mental health reform legislation in 2001 was that North Carolina's funding for public MHDDSAS services was out of balance [8]. The State Auditor concluded that too much money was being devoted to the operation of the 4 state psychiatric hospitals, whereas the vast majority of persons with behavioral health conditions were being served by grossly underfunded community programs. The report called for the downsizing of the state psychiatric hospitals and the transfer of dollars saved to expand community services. However, in the years immediately following 2001, admissions to the 4 state hospitals rose rapidly, so much so that by 2007 North Carolina had more 17,000 state hospital admissions [33]. Although many other states had converted their state psychiatric hospitals to long-stay facilities in the 1980s, in 2007 North Carolina was still using these hospitals for acute care.

That year, following a series of incidents involving allegations of patient neglect and premature deaths and the threatened loss of Medicaid and Medicare reimbursements, the North Carolina Division of MHDDSAS instituted waiting lists for admissions to the state psychiatric hospitals in order to reduce overcrowding and to protect both patient and staff safety. Within a year of being adopted, the waiting lists began to show dramatic reductions in the total number of admissions and sharp drops in short-stay patients. Bed capacity at the hospitals also began to be curtailed consistent with the State Auditor's recommendations. By 2010, there were 60% fewer beds in the state hospitals than there had been at the start of reform in 2001 [1-2]. North Carolina was catching up with the rest of the country: Between 1970 and 2002, the deinstitutionalization movement nationally had eliminated 85% of the beds in public psychiatric hospitals [34].

Although waiting lists helped relieve the stress on state hospitals, the waits they imposed created major problems for emergency departments in local general hospitals, where in 2010 the average patient needing a state hospital bed was estimated to wait 2.6 days [2]. DHHS has attempted to address this problem by purchasing access to a few hundred psychiatric beds in general hospitals across the state, but the impact of that initiative is as yet unclear [17].

The larger problem underlying the growing shortage of psychiatric beds in North Carolina is the absence of a rational bed-need methodology for determining the required ratio of beds to population that would adequately serve diverse areas of the state. Current bed allocations are based largely on historical trends rather than on careful assessments of population needs and the varying availability of state, private, and general hospital psychiatric beds and crisis services that can help to meet needs for intensive care with fewer beds per capita. The state needs a comprehensive continuum-of-care model that defines the role of state hospitals (limiting their use to intermediate- and long-term treatment) and links them to community-based crisis housing and crisis intervention services that alleviate emergency department backlogs while promoting community-based crisis management.

The interface between the criminal justice and mental health care systems. Jails and prisons now serve as the default system of care for many difficult-to-manage persons with severe mental illness, in much the same way that the state psychiatric hospitals did prior to recent reductions in the number of hospital beds and the institution of controls on admission. Good data for North Carolina are lacking, but nationally, more than a million persons with severe mental illness are detained in local jails each year, and tens of thousands more are incarcerated in state prisons [35-37]. Because the system of community services is largely voluntary and there are waiting lists for the state hospitals, jails have become one of the few community settings able to provide 24-hour custody and control of difficult-to-manage individuals with severe mental illness, who often refuse treatment and engage in behaviors that lead to arrest and detention. Incarceration likely exacerbates psychiatric illness, because the justice system lacks adequate treatment resources, and even brief stays in correctional settings are associated with trauma [38].

A variety of interventions have been developed over the past 2 decades to deal with the large numbers of mentally ill persons in the criminal justice system [35-38]. Communities throughout North Carolina have adopted many of these strategies in limited forms, including police-based crisis intervention teams, jail-diversion programs, mental health courts, and specialized mental health probation and parole programs [37]. To date, evidence demonstrating the success of these efforts in North Carolina and nationally has been difficult to demonstrate. The interface between the criminal justice and mental health care systems remains one of the most challenging areas impeding the development of a well-functioning community-based public behavioral health system.

Housing needs. A lack of stable housing is one of the major gaps in care facing many persons with behavioral health conditions, many of whom are poor and therefore need low-cost or subsidized housing. Indeed, the lack of such housing and the resulting overutilization of adult care homes largely precipitated the Olmstead-based US Department of Justice complaint [25-26].

The national loss of low-cost housing has meant that people with disabilities, who typically live on Supplemental Security Income or other disability income supports, cannot afford a 1-bedroom apartment in any housing market in the United States [39]. A continuum of subsidized housing is needed, from independent living situations to supported housing, where people with severe mental illness and other conditions can have assistance in meeting their daily needs. Such housing can help to keep people out of state hospitals as well as the criminal justice system.

Two things that are lacking in North Carolina are a range of housing options to help individuals who are unable to live independently and intensive community treatment teams that can engage consumers in active treatment and skills development. Dihoff and Weaver discuss the need for safe and affordable housing, along with other recovery supports, to help people with mental illness live successfully with their illness [40].

North Carolina's Embrace of Medicaid Behavioral Health Managed Care

Medicaid is now the largest payer of services for people with mental illness [11]. This fact alone places Medicaid policies and provisions front and center in any discussion about reorganizing North Carolina's public behavioral health system. In 2009, the North Carolina legislature authorized the phased conversion and consolidation of 23 LMEs into 11 MCOs under section 1915(b)/(c) of the Medicaid regulations, waiving federal requirements for fee-for-service payments and open choice of providers [24,41]. The new LME/MCOs will function as behavioral health carve-outs, whereby the behavioral health benefits for defined groups of Medicaid eligibles will be segregated from other Medicaid benefits and managed by the LME/MCOs under contract with the Division of Medical Assistance. Financial risk will remain with the state.

The promise of improvements in coordination of services, cost effectiveness, and quality of care is the impetus for shifting to Medicaid managed care. In principle, Medicaid waivers help to bridge 2 of the big problems that have plagued the public behavioral health system in North Carolina for years—namely, the fragmentation of financing and the lack of connection between funding and policymaking in the provision of MHDDSAS services.

With regard to the experiences that several states have had with risk-based, carved-out Medicaid managed care programs, the reviews are mixed on whether behavioral health carve-outs have reduced costs, improved access, and improved quality of care, especially for patients with complex problems [42-44]. In addition, such carve-out plans potentially fragment medical and behavioral health care [44-45]. Indeed, the behavioral health carve-out approach to Medicaid managed care would seem to be at cross-purposes with North Carolina's other, longer-standing, Medicaid managed care initiative—primary care case management (PCCM), now represented in an enhanced form through Community Care of North Carolina (CCNC) [21]. The enhanced PCCM model attempts to further achieve clinical integration through implementing a medical home concept. Several states with behavioral health carve-outs are carving behavioral health back into their medical plans in the interest of similar efforts at integration [44].

States that operate Medicaid behavioral health carve-out plans are in the minority, and the managed care plans of most of those that do are typically contracted to established nonprofit or for-profit MCOs statewide or regionally [44]. Guided by the positive results from a single homegrown regional pilot program operated by Piedmont Behavioral Health, North Carolina is set to implement its Medicaid managed care carve-out plan statewide by 2013. North Carolina appears to be unique in having decided to implement 11 separate local public behavioral managed care plans, a decision reflecting the state's concerns about outside corporate management and profit-taking.

A host of concerns are raised by the rapid statewide expansion of Medicaid managed care in North Carolina. Not the least of these is the sheer rapidity of the transformation of single- and multi-county LMEs into MCOs. Competently building these new business entities de novo with the requisite workforce, managed care acumen, standard operating procedures, inter–local government agreements, and operational flexibility on a short timeline poses a substantial risk that multiple organizational failures will occur. Indeed, a recent report from consultants monitoring the readiness of regional managed care operations found worrisome problems with business operations and clinical capacities [46].

Because capitation creates financial incentives to limit treatment costs by providing services in the least volume and in the least costly setting, there is a heightened risk of undertreatment—especially given the complexity of the MHDDSAS disabilities and the diverse agencies involved in their care [42-43]. Although some short-term savings may be achievable with tighter utilization review, greater savings and clinical outcomes may be achieved over time by improving access, changing patterns of care, reducing hospital utilization, implementing chronic disease management programs, and improving care coordination, all of which are achievable in enhanced primary care case management programs.

A recent review by the Kaiser Commission on Medicaid and the Uninsured identified several key concerns about Medicaid managed care [43]: payment concerns (eg, adequacy of payments and incentives to deliver high quality care, especially when providers are paid comparable fee-for-service Medicaid rates; promptness of claims payment and the multiplicity of claims payment processes across MCOs); provider network and delivery system concerns (eg, the depth, quality and accessibility of provider networks, especially in rural areas; coordination among providers, especially acute and longer-term care and integration with physical health care); and consumer protection and oversight (eg, engagement of consumers in informed choice of services; development, efficient collection and interpretation of meaningful quality and outcome measures; transparent grievance processes and accountability).

Conclusions

All of the opportunities for a new wave of public behavioral health reform will be seriously compromised without concurrent efforts to fundamentally improve the way behavioral health service utilization and outcome data are collected and evaluated in order to manage the public MHDDSAS system. State and county budget cuts over the past 2 decades have progressively eroded the program evaluation capacity of state agencies and local government. The complexities of emerging systems of care and financing far exceed the historic capabilities of the state, LMEs, and the network of provider agencies to manage in a coherent and integrated fashion. North Carolina must fully transition to an evidence-based management model in which proposed policies are empirically evaluated and vetted in advance of implementation.

One of the missing ingredients in North Carolina's behavioral health management and reform efforts is a neutral entity with the requisite technical and clinical skills to conduct rigorous ongoing policy analyses and program assessments to help guide legislative oversight, effective management of the public behavioral health system, and the growth of high-quality services for the people of North Carolina. North Carolina has engaged a series of outside consultants for these needs, leading to new learning curves with each engagement and, sometimes, conflicting conclusions. North Carolina universities are one of the major untapped resources in the state to address these information and implementation issues. North Carolina will soon have a new governor, new legislative leadership, and yet another chance at a new beginning with regard to behavioral health system development. Mobilizing university resources to meet pressing behavioral health policy and information needs could have a dramatic impact on getting the public behavioral health systems back on track in the years ahead. NCMJ

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North Carolina's Behavioral Health Delivery System:
A Historical Perspective

Mebane Rash

This commentary provides an overview of the mental health system in North Carolina. It suggests that the key to building a mental health system is settling on a strategy, implementing it, evaluating it, and funding it. More than a decade after reform was passed in North Carolina, this state still has not settled on a strategy.

Joshua is autistic. He has an IQ of 36. He can only speak a few words, such as "Ma" and "hurt." In January 2010, after violently attacking his mother and little brother at home, Joshua spent 8 days at Wake County Crisis and Assessment Services waiting for a bed in a facility to open up. He slept in a chair. He did not have access to a shower. He was 13 years old.

At the time, there were open beds at Central Regional Hospital in Butner, 35 miles away. Only 13 children were there, and they have the capacity for 34. But there were not enough workers to care for Joshua. After his 8-day wait, he was transferred to Broughton Hospital in Morganton, 200 miles west of Raleigh. It was the first time he had ever been away from his mother for more than two days.

This story illustrates that our mental health system still has many problems, even after a major reform in 2001. Key issues that remain unresolved are how to make sure state and local responsibilities are clear, how to identify who needs services and what services they need, how to address work force shortages, and how to fund the system in these tough economic times.

Mental Health Reform

President John F. Kennedy and his brother Robert had a special interest in mental health care because their sister Rosemary was developmentally disabled. In the early 1960s, they used their influence to help get legislation passed that encouraged a nationwide move toward deinstitutionalization—an effort to move those with mental disabilities out of state institutions and into local, community-based treatment.

The community-based treatment movement gained further strength in the 1990s as a result of two significant events. In 1990, Congress enacted the Americans with Disabilities Act to eliminate discrimination against those with disabilities [1]. The act applies to all public entities and to the use of public funds; therefore, it has implications for the provision of publicly funded Medicaid services to people with mental disabilities. Then in 1999, the US Supreme Court handed down the Olmstead decision, which required states to place people with mental disabilities in the least restrictive setting possible and in community settings rather than in institutions [2]. This decision paved the way for mental health reform nationwide.

North Carolina's mental health reform legislation, An Act to Phase in Implementation of Mental Health System Reform at the State and Local Level [3], was passed in October 2001. Underpinning mental health reform were two ideas: deinstitutionalization and privatization.

Deinstitutionalization. Even after this reform, the state has continued to operate 15 inpatient facilities statewide, including 4 state psychiatric hospitals, 3 alcohol and drug treatment centers, 3 developmental centers for people with intellectual and developmental disabilities, 2 residential programs for children, and 3 neuro-medical treatment centers. Together, these facilities, served 12,815 persons in fiscal year 2011 [4]. The number of persons served at the state psychiatric hospitals has decreased over the past decade. While the state's 4 psychiatric hospitals served 17,160 persons in 2001—the year of mental health reform—in 2011, they provided care to just 5,754 persons [5].

The intent of mental health reform was to separate management from provider functions for area programs providing community-based mental health services, to create local management entities (LMEs) with strong ties to county government, and to mandate state oversight and assistance. The 39 quasi-independent area programs created in the 1970s to provide direct services to one or more counties served both as providers and as payers—that is, they both delivered services and oversaw public dollars that were

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allocated to mental health services. They were autonomous public agencies governed by a citizen board, and they were not accountable to elected county commissioners because their service areas often covered several counties.

These area programs morphed into LMEs, shedding their direct services and becoming the local entity that manages providers and public funds for local consumers. Many individuals who had been staff members of the area programs became contractors with the newly formed LMEs. Consolidation also occurred: The 39 area programs were replaced initially by 33 LMEs, resulting in savings in administration costs and overhead. By July 2010, there were only 23 LMEs serving all 100 counties [6]. In 2001, 246,039 persons were served through the LMEs, and by 2011, the LMEs were coordinating services for 360,180 persons statewide [7].

Privatization. Privatization of clinical services—which gathered steam on the national level throughout the 1970s, 1980s, and 1990s—was not initially a central premise of North Carolina's 2001 reform legislation. Private providers already were involved in delivering some services. Only after the reform bill passed in 2001 did private providers and LME staff begin to say that the goal was to privatize.

In theory, North Carolina's approach was supposed to accomplish 4 things: to increase administrative efficiency by segregating management and oversight from the provision of services, to promote innovation and utilize new technologies, to enhance provider quality, and to stimulate competition among providers [8]. But the transition has not been easy. For consumers, the loss of a one-stop shop has been tough. Many consumer advocacy groups, who had served as a watchdog over quality, expanded their role under reform to provide services, creating a potential conflict of interest for themselves. There have also been concerns that the private sector might not be sufficiently responsive to the needs of people with mental illness and that the profit motive could result in a reduction in the quality or quantity of services, particularly for those with severe and persistent mental illness.

Reform created a large provider network and corresponding service capacity, but there have been questions about provider quality. Late in 2009, the North Carolina Department of Health and Human Services proposed a new provider classification for mental health services in North Carolina: CABHAs, short for Critical Access Behavioral Health Agencies. These large providers deliver mental health and substance abuse services. Currently, there are 202 certified CABHAs statewide [9].

CABHAs may be for-profit, nonprofit, or public health care companies, but they are required to provide three core services–comprehensive clinical assessment, medication management, and outpatient therapy—and in addition, at least 2 other services from a list of 14, creating a continuum of care. The goal is to establish a strong clinical foundation on which to build community capacity. To that end, the state also requires certain staffing for CABHAs—a medical director (full-time for CABHAs serving more than 750 consumers), a clinical director, and a quality management/staff training director.

Based on our research and analysis of mental health reform in the 50 states, we have found that the key to building a solid mental health system is settling on a strategy, implementing it, evaluating it, and funding it. North Carolina's reform effort has seen major policy shifts so frequently that often it seems the biggest problem with reform may be the state's inability to stay the course. More than a decade after reform legislation passed in North Carolina, significant changes in policy are still under way.

Opportunities and Challenges Ahead

As we have looked at what other states around the country are doing to comply with the US Supreme Court's Olmstead decision and serve those with mental disabilities, three trends are apparent.

A new funding model: the waiver. First, there is a need for new funding models. Medicaid is the largest funder of mental health services nationwide. In North Carolina, it is also the fastest growing program in our state budget. The provision of mental health services is big money and big business.

North Carolina is currently trying a new funding model—a federal waiver for our Medicaid program (the 1915(b)/(c) Medicaid waiver). Particularly in the current economic environment, this waiver is a crucial element in running an effective and cost-conscious system. Federal waivers allow states to operate programs outside the federal guidelines.

The waiver eventually will apply to all mental health, developmental disability, and substance abuse services in North Carolina that are funded by Medicaid. There are pros and cons to this approach. It allows the state to more effectively use Medicaid and state funds by giving it the ability to predict and control costs. Instead of getting a fee for a service provided, LMEs will get a set amount each month for each consumer served. The waiver gives the LMEs the ability to pick providers and set rates; the hope is that the LMEs will be able to create incentives for providers to make available the mix of services consumers need in their region, including for those that may have been undertreated historically. But LMEs also will assume risk. If services cost more to provide than projected, the LMEs will have to use risk reserves to cover the additional cost.

In 2011, needing to find ways to save money, the North Carolina legislature passed a bill to expand the waiver statewide by July 1, 2013, in the hope of saving $10.5 million this fiscal year and $52.5 million in the next fiscal year [10]. This has thrown our entire system into flux as local management entities consolidate to meet the requirements for managed care organizations (MCOs). North Carolina's 23 LMEs currently have merged into 21 LMEs, and ultimately we expect the LMEs to merge and collapse into 12 LME/MCOs [11]. For this model to work, each MCO will have to cover a sufficient number of consumers to be financially stable.

A cautionary tale about waivers and the risk of relying exclusively on Medicaid to fund mental health services: Michigan has implemented its waiver statewide with mixed results. The state has been able to save money and increase provider quality, but it has struggled to match federal dollars with state dollars because of its economy and the recession. To get on the Medicaid rolls and obtain coverage, a consumer must be in dire circumstances. As one Michigan area mental health director told us, "We've had to tell people who ask for help to come back to us when they've lost their job, their house, and their support—because at that point they will qualify for Medicaid and get the services they need."

Funding the system: corrections or mental health? Another emerging trend is for states to deal with mental illness and substance abuse in jails and prisons rather than in the mental health system. There is no better example of this than the state of Georgia, where 1 in every 13 adults is under correctional control [12]. It is estimated that 75 to 80 percent of those inmates require either mental health or substance abuse services, and some require both [13].

A psychiatrist who works in western North Carolina told us that state governments have two options when it comes to serving their mentally ill populations: Either the Department of Corrections can be the unseen arm of mental health system, housing people in prisons with little or no treatment, or the mental health system can be the unseen arm of the Department of Corrections, with citizens being served at a much lower cost in the community with treatment that prevents them from ending up back in jail. Which system do we as a state want to fund?

Emergency departments on the front lines. The third trend that emerged in our 50-state study is that visits to hospital emergency departments (EDs) by patients with mental illness or substance abuse are increasing. This unintended consequence of mental health reform plays out across our state each and every day. In 2011, at one community hospital that has 24 beds in the ED, there were about 2,000 visits by patients with mental illness or substance abuse—on average, about 5 visits each day (M.R., unpublished data). Last June, things got so bad that for two weeks, there were 9 or more patients in this ED at all times with mental health or substance abuse issues. Patients are also staying in EDs longer and longer as they wait for beds to open up. There have been as many as 15 people being held in this particular ED for mental health issues, taking up more than half the department's capacity. The longest stay has been 10 days. Imagine waiting in an ED for 10 days!

Emergency departments like this one are on the front lines of mental health care in North Carolina—even though they are not funded and staffed to serve that function, even though the environment in the ED is the opposite of what many mental health patients need, and even though many EDs are unable to initiate treatment.

By contrast, in New York, the mental health system was designed to put EDs on the front lines. Each of their regions has a psychiatric ED for the provision of mental health services; it provides a single portal of entry into the mental health system. Psychiatric EDs are the home base for Assertive Community Treatment teams, which are designed to provide comprehensive, community-based psychiatric treatment, rehabilitation, and support. These EDs are funded and staffed to identify who needs help the most, what help they need, and where they should get it.

Community-Based Treatment, Community-Based Lives

In his 30 years as a consumer of mental health services in North Carolina, Mark Long has seen it all. He has been admitted to every state psychiatric hospital and many local community hospitals. He has lived in group homes and on the street. He has tried nearly every treatment available, often with painful side effects.

Diagnosed with paranoid schizophrenia as a young man, Long spent most of the 1970s and 1980s in and out of psychiatric hospitals. Of the shift to community services in the 1990s, he says, "I felt like a yo-yo. I would bounce into one situation and then I would bounce back out. I went from being in a hospital to being back in the community every few months."

After making a third attempt to take his own life, Long left the family care home where he was living, walked down the street, and found Residential Treatment Services of Alamance. He later enrolled in the University of North Carolina at Greensboro, graduating with a degree in social work in May 2009. He went on to become one of the first Peer Support Specialists in our state. These specialists are people in recovery from mental illness or substance abuse who provide support to others by sharing their experiences. There are now 652 certified Peer Support Specialists in North Carolina [14].

Long has finally found the right treatment, a place to call home, and a vocation. His community-based treatment is his community-based life. The Court in Olmstead got the policy right. It is the implementation of this decision by the state that continues to need reform. NCMJ

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Managed Care:
Right or Wrong for North Carolina

Pamela Shipman

Since 2005, Piedmont Behavioral Healthcare (PBH) has operated North Carolina's only managed care Medicaid waiver program. Legislation was recently passed requiring that the waiver program be expanded statewide by January 2013. Experience with the PBH model suggests that this expansion can result in significant savings without compromising quality or access.

The Affordable Care Act of 2010 opened the door to vast changes in the US health care system. As a result, innovations are sweeping across that system, changing it irrevocably. Fundamental reforms in health care operations now taking place include an expansion in the use of electronic health information technology, a greater emphasis on producing positive health outcomes, the development of reimbursement models that will reward attainment of improved health outcomes rather than productivity, an intense focus on accountability, and the expectation that operations will achieve a high level of efficiency.

Many reforms, especially those defining health care operations, will continue to play out regardless of what the US Supreme Court decides regarding the constitutionality of the Affordable Care Act. For North Carolina, these changes arrive at a time when its behavioral health system is suffering from highly publicized failures, state budget shortfalls, escalating Medicaid costs, poor quality of care, and abuse of Medicaid services. In order to function effectively under these circumstances, the North Carolina system of care for people who have mental health or substance use problems or intellectual or developmental disabilities needs to be reshaped; its transformation will require leadership and vision.

In response to state budget shortfalls, system instability (including multiple changes in the service array, new requirements for provider staff training, greater utilization control, and rate reductions for certain services), and the expectation that the number of people eligible for Medicaid will increase significantly when ACA criteria go into effect in January 2014, the General Assembly took decisive action in June 2011, passing House Bill 916 [1]. That legislation established a timeline for statewide expansion of the state's section 1915(b)/(c) Medicaid waiver program and defined the framework of the community behavioral health system of the future by requiring a transition to a managed care model built on Medicaid funding. As part of the waiver expansion, the local management entities (LMEs) that were created by the state's Mental Health Reform Bill of 2001 [2] will merge with one another to form managed care organizations (MCOs). LMEs have long-standing connections to their communities and can build on existing infrastructure. Because the General Assembly wanted to ensure the success of the expansion, House Bill 916 requires that the expansion be implemented in a manner that is faithful to the PBH demonstration model created for the pilot Medicaid waiver program launched in 2005.

Why Managed Care?

The Medicaid managed care contract requires that MCOs develop strategies to address the special needs of Medicaid populations, including inadequate income, disabilities, lack of transportation, substandard housing, illiteracy, poor diet, as well as cultural and language barriers. Regulations governing the operation of Medicaid waivers require education, outreach, and focused intervention activities on the part of the MCO in order to ensure that enrollees are assisted in accessing necessary care. Linkages to primary care are a must. Managed care operates differently in systems that are publicly funded than in commercial systems funded by private insurance, because the people served in the former often require direct outreach and assistance to access care. Without timely and appropriate services, these individuals often seek care in high-cost settings such as emergency departments. It is now well established that if people receive the care they need when they need it, health outcomes are better and the use of high-cost alternatives is reduced.

Managed Care Offers Advantages for States

Advantages of the managed care model include the ability to predict Medicaid expenditures, which allows states to prepare their budgets with greater certainty. States also achieve administrative efficiencies by contracting with one

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Planned Changes in Child/Family/Youth Services at One LME/MCO

Don E. Herring, Marsha L. Ring

Western Highlands Network (WHN) is a local management entity/managed care organization (LME/MCO) managing state and federal behavioral healthcare funds in Buncombe, Henderson, Madison, Mitchell, Polk, Rutherford, Transylvania, and Yancey Counties. In January 2012, WHN had a general population of 535,492 and a Medicaid-eligible population of 80,297. During that month, the network provided services and supports to 7,785 active consumers through state, grants, and Medicaid funding. Of these, 3,075 were Medicaid funded and less than 21 years old.

The children and young adults we serve, ages birth through 20, have historically been high users of long-term residential placements and psychiatric treatment facility services, which are high in cost and often take these young people far from their families or caregivers. Further, the treatment modality chosen has not always been matched to the underlying diagnosis. Thus treatment success has been hard to predict—results have been uncertain at best and potentially harmful at worst.

The 1915(b)/(c) Medicaid waivers require LME/MCOs to measure how good a job they are doing of adopting evidence-based guidelines and other promising practices, to close the provider network to new providers until an area-services needs assessment has been completed, and to develop methods of assessing provider performance with regard to business operations, service access, expected outcomes and consumer satisfaction.

The waiver is structured to "reward" the LME/MCO for being a good manager of services. One goal is movement from expensive, high-end services of short duration to longer-term, in-home (or at least close to home) services; another is the provision of services that research has shown to be effective. Any savings achieved will be reinvested in expanding the services and supports in the eight county area served by the LME/MCO. The federal Centers for Medicare and Medicaid Services and the North Carolina Department of Health and Human Services clearly expect the LME/MCO to be 100% "at risk." At risk means that the LME/MCO must operate within the yearly negotiated rates it receives from Medicaid or use its own fund balance to make up any deficit in overspending. Consumers and providers will be the losers if funds go unspent. The goal is to spend wisely on what works for a particular child or family, with the right services and supports at the right time, delivered by the right provider for the right duration and at the right intensity, while monitoring the quality of care.

Coordination of care with primary care physicians is critical for all age groups and disability populations. WHN is a leader in working with the local Community Care of North Carolina network (known as Community Care of Western North Carolina in WHN Counties). With additional waiver funds, the number of integrated care managers will expand from two to four in order to provide coordination of care for consumers whose need of both physical and behavioral health services is great.

Here is the Child/Family/Youth "Blueprint" that WHN plans to implement to achieve the goals of the waivers: (1) Assessments will be performed by competent clinicians,

or more capitated, at-risk MCOs rather than with thousands of fee-for-service providers. Managed care offers states a single point of accountability by making it possible for there to be one designated manager for the entire continuum of services and supports for a specified geographic area. States can hold a single entity responsible for access, quality, and cost. A benefit of managed care for an entity receiving public funding, such as PBH, is that administrative funds are concentrated within the MCO. Currently, Medicaid administrative funds for Medicaid fee-for-services care and for the special Medicaid community waiver program of CAP-MR/DD (Communities Alternative Program for Persons with Mental Retardation/Developmental Disabilities) are dispersed across several organizations, including ValueOptions, HP Enterprise Services, and a few LMEs. Diluting precious administrative resources compromises the capacity of any single entity to develop the infrastructure necessary for waiver operations. The infrastructure requirements include complex information technology, quality oversight systems, and highly qualified staff members to operate these systems and manage for outcomes.

One of the advantages of the managed care Medicaid waiver program is that there is an option under 1915(b)(3) for states to use savings to reinvest in additional services that are not otherwise available to the state's Medicaid population. The savings realized are converted to a special per-member, per-month payment that provides funding for the additional services in future years.

Managed care systems create predictable business environments for providers by managing competition through a closed network. A closed network provides choice for consumers, but offers providers the opportunity to have sufficient market share to support investment in their local infrastructure. PBH's use of evergreen contracts (contracts without an end date) provides additional assurances to providers. The managed care waiver program requires MCOs to ensure that consumers have both access to services and a choice of providers. Low-density populations can result in inadequate numbers of providers and poor access to care in rural areas. The MCOs are responsible for recruiting providers for underserved areas and can use financial incentives such as special rates to bring providers into a specific geographic area.

The MCOs have full authority to ensure quality of serchild/adult psychiatrists, and Intellectual/Developmental Disability Care Coordinators. These assessments will be required to address physical needs identified by appropriately trained medical professionals. (2) Coordination of care will be provided for those children and youth with mental health needs who also require social services, are involved with the criminal justice system, have high physical health needs, or have multiple system-related issues (eg, social services, juvenile justice, medical, educational). (3) Referrals will be made to the providers enrolled in WHN who can best meet an individual's needs. (4) Utilization managers and care managers will determine whether WHN providers are providing the right level of care at the right intensity, whether the care is working, and whether the child or youth and his or her family are satisfied with these supports and services. (5) Those planning the care of children, families, and youth will consider when it might be appropriate to titrate them off of supports and services. Life-long planning will begin for children and youth whose intellectual or developmental disabilities suggest that they may need life-long supports and services; criteria for discharge will be determined for the others.

If savings result from implementing the changes listed above, we will use the money to make the following improvements to services and supports for children, youth and families: First, we plan on investing more heavily in prevention, creating a prevention continuum to reach children and youth with trained peer-support specialists (eg, student peer counseling, youth directed mental health advocacy programs). We intend to improve the quality of treatment provided by identifying and offering evidence-based or promising practices for specific conditions or diagnoses. We also plan to expand the array of services and supports for children with autism spectrum disorder, oppositional defiant disorder, and conduct disorder, and to make a greater variety of specialty providers available. For example, we plan to contract with psychiatric residential treatment facilities in or close to our community to develop specialty services for children and youth with specific diagnoses. We also want to find specialists who can provide therapeutic foster care (ie, families that specialize in taking in youth in crisis as alternatives to inpatient or facility based crisis units). We plan to provide transitional services for adolescents who are aging out of the foster care system and cannot go home, and for those 18 to 20 years of age who have mental health problems, substance abuse disorders, or intellectual or developmental disabilities and lack family support. We also intend to provide facility-based crisis and stabilization services for youths undergoing short, intense crisis episodes by making beds in those facilities available for short-term intensive treatment. NCMJ

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vices. Medicaid regulations establish a framework for quality that is carefully monitored through annual External Quality Review audits. The MCOs have authority to set and enforce quality and performance standards, enroll and discharge providers from the network, and apply sanctions for poor-quality care.

Regulations established by the managed care waiver ensure strong consumer protections, including availability of information and appeal rights. The goal of managed care is to ensure that people needing services are efficiently directed to medically necessary care. The MCOs have the authority to make exceptions in order to meet the unique needs of individuals—by making exceptions for limits on the number of services authorized, for instance, and by setting consumer-specific rates. The PBH demonstration indicates that efficient access to the most appropriate service in combination with other managed care strategies, including a closed provider network, have resulted in overall costs that are significantly lower than in the fee for service Medicaid system in North Carolina.

The managed care model is more structured and organized than a fee-for-service system. There is more oversight and management of all aspects of system operations. This will feel restrictive to some stakeholders. However, the advantages of the model far outweigh the disadvantages of any restrictions, whether real or perceived.

States that operate Medicaid fee-for-service systems, as North Carolina has been doing, have few options when they are faced with reducing Medicaid costs. In a fee-for-service Medicaid system, states are limited to system-wide cost-control methods that uniformly impact all providers and all of the people they serve, regardless of needs. The only options the state has are to limit the amount of services available (for instance, by restricting the number of hours per day, per week, or per month that the consumer can receive the service), to reduce provider rates, or to refuse to cover any nonmandatory services.

Basing the Medicaid Waiver Expansion on the PBH Model

PBH began operating a section 1915(b)/(c) waiver in April 2005. The effects of the waiver on the PBH community system have been increasingly positive, and significant overall savings to the Medicaid program have followed its implementation. Over the years, a number of external evaluations have verified these results. Outcomes affected favorably include the percentage of those in need who are served, compared with the state average, as shown in Table 1. In addition, for individuals with Medicaid coverage, PBH's rate of utilization of services for intellectual or developmental disabilities is much higher than the statewide rate: In the PBH region, 413.2 out of every 10,000 Medicaid enrollees receives such services, compared with the 237.7 out of every 10,000 Medicaid enrollees statewide [3].

PBH has demonstrated that significant savings can be achieved through managed care without compromising quality or access. In 2010, according to an analysis performed by Mercer Government Consulting, PBH's Medicaid costs per member per month using the managed care model were $132.62, compared with an average Medicaid cost statewide of $170.96 per member per month (PBH, unpublished data). During the 3-year period from 2008 through 2010, PBH spent a total of $116,862,770 less than they would have spent if their Medicaid costs per member per month had been the same as the average statewide cost per member per month. For all 6 years of operations since the PBH waiver was implemented (2005-2011), PBH's total Medicaid costs were more than $200 million lower than they would have been if PBH's costs per member per month had been the same as the average statewide cost over the same period (PBH, unpublished data).

The 1915(b)(3) waiver gives states the opportunity to use Medicaid savings to fund additional services that Medicaid will not pay for outside of the waiver; these are known as (b)(3) services. Services designated for such funding, developed by PBH and approved by the state and CMS, include respite care, supported employment, personal care or individual support, one-time transitional costs, psychosocial rehabilitation and peer supports, physician consultation, and an array of deinstitutionalization services. For example, in the counties served by PBH, those caring for children with Medicaid coverage who have mental health or substance abuse problems or intellectual or developmental disabilities are eligible for respite care services. In the other North Carolina counties, a child must be enrolled in the CAP-MR/DD waiver in order for his caregivers to receive Medicaid-funded respite care. If a CAP-MR/DD slot is not available, the service is not available to that child's caregivers. PBH claims and financial data reveal that from 2008 through 2011, more than $9.3 million dollars were spent on approved Medicaid alternative services available through the 1915(b)(3) option, and 1,771 people were served (PBH, unpublished data).

Managed care does not mean saying "No." PBH has consistently had a very low denial rate for requests for Medicaid-funded services. PBH data reflect a denial rate that is generally in the range of 0.05% to 1.5% on a monthly basis. In 2010, there were 25,999 requests for services, and the annual denial rate was 1.6%; in 2011, there were 33,931 requests, only 0.85% of which were denied (PBH, unpublished data).

TABLE 1.
Percentage of North Carolinians in Need Receiving Services During State Fiscal Year 2011

Age/Disability Group	In counties served by PBH	State average
Adult/Mental health	80%	53%
Child/Mental health	67%	57%
Adult/ Intellectual or developmental disability	64%	41%
Child/ Intellectual or developmental disability	36%	22%
Adult/Substance abuse	18%	11%
Child/Substance abuse	11%	9%

Note. Persons with multiple disabilities are counted in all applicable rows. Data were initially compiled from PBH claims, Medicaid fee-for-service claims, and state-funded service claims and then published in The PBH Managed Care Experience: A Comparison to Non-Managed Care Local Management Entities. North Carolina Division of Mental Health, Developmental Disabilities and Substance Abuse Services; December 1, 2011:1-2. http://www.ncdhhs.gov/mhddsas/statspublications/Reports/DivisionInitiativeReports/LME-MCOPerfReports/PBHExperience2011-12.pdf. Accessed April 21, 2012.

The Medicaid managed care waiver requires MCOs to focus on consumer satisfaction. PBH conducts an annual consumer survey through a third party to ensure that consumers will feel that it is safe to respond honestly [4]. UNC-Charlotte Urban Institute has conducted the survey for a number of years and provides PBH with an in-depth analysis of survey results. The UNC-Charlotte Urban Institute also conducts an annual provider satisfaction survey to assess the level of provider satisfaction [5]. Data from both satisfaction surveys is widely reviewed within PBH and is used to develop improvement goals and strategies.

The North Carolina Division of Mental Health, Developmental Disabilities, and Substance Abuse conducts an annual Perception of Care Survey for consumers receiving behavioral health services. The Division also contracts with the Human Services Research Institute to conduct an annual Core Indicators assessment for people with intellectual or developmental disabilities. Tables 2 and 3 show how PBH's performance on these state-sponsored assessments compares with the statewide results.

PBH has also been evaluated a number of times by external organizations with managed care expertise, including Mercer Government Consulting and the Carolina Center for Medical Excellence [6]. Evaluation recommendations have been used to inform improvement plans while at the same time the overall results of these evaluations have been consistently positive, demonstrating that the waivers allow for a higher quality community system at lower cost.

The Managed Care Model Can Work for All of North Carolina

PBH's goals in implementing its managed care model originated with the public input process that defined its 2003 Local Business Plan. The company decided to use the

TABLE 2.
North Carolina Perception of Care Survey Results for Consumers Receiving Mental Health or Substance Abuse Services and Their Families

Domain	Category of consumer	Year	% with a positive perception of domain	
			In counties served by PBH	State average
Access to services	Adults (18 years of age or older)	2009	86%	87%
		2010	85%	88%
	Youth (12 to 17 years of age)	2009	81%	83%
		2010	74%	84%
	Parents of children under 12 years of age	2009	88%	91%
		2010	100%	94%
Outcomes	Adults (18 years of age or older)	2009	67%	73%
		2010	76%	76%
	Youth (12 to 17 years of age)	2009	57%	73%
		2010	87%	71%
	Parents of children under 12 years of age	2009	59%	68%
		2010	50%	73%
Treatment planning	Adults (18 years or age or older)	2009	84%	85%
		2010	82%	87%
	Youth (12 to 17 years of age)	2009	77%	81%
		2010	89%	78%
	Parents of children under 12 years of age	2009	91%	94%
		2010	100%	93%

Note. Data are from The PBH Managed Care Experience: A Comparison to Non-Managed Care Local Management Entities. North Carolina Division of Mental Health, Developmental Disabilities and Substance Abuse Services; December 1, 2011:21-22. http://www.ncdhhs.gov/mhddsas/statspublications/Reports/DivisionInitiativeReports/LME-MCOPerfReports/PBHExperience2011-12.pdf. Accessed April 21, 2012.

strength of the model to transform its community system, by focusing on the priorities of consumers and their family members and by making continual adjustments to meet the changing needs and choices of persons with mental health or substance abuse problems or intellectual or developmental disabilities. The values identified at the very beginning of this effort—recovery, self-determination, person-centered planning, and consumer- and family-driven services—continue to be central to PBH's operations.

It was very difficult for PBH to remain focused on these goals during the long waiver start-up period. PBH began waiver operations in April 2005. In March 2006, the Medicaid service array was completely revamped, resulting in a second start-up period for both PBH and our providers. Waivers are difficult to implement because of the myriad of details that must be put into operations through many different individuals within an organization, as well as communicated to external stakeholders. When these details change, the entire system is impacted. The most challenging aspect of operations for PBH during this period was to keep everyone working in tandem. We were presented with problems and questions every hour of every day that had to be addressed. Every decision that had to be made had never been made before. Communicating decisions and change orders on a timely basis was critical. We made many mistakes during start-up. We went down wrong roads, we disagreed about what to do, we were indecisive, and we did not communicate effectively. We made the best decisions when we remembered what we wanted to achieve through the managed care waivers. A waiver start-up needs strong centralized leadership. There is no room for debate, blame, dissention, or indecision. There is nothing more important than having a strong, committed team. We were also very fortunate to have the good will of our employees, our providers, and the people we served. We learned to be patient, and not to be defensive. We listened to feedback and acted on it. We were lucky that we were not in the spotlight, and when we made mistakes, we learned, made corrections and moved on.

Managed care is a means to an end. It is a strong framework for a cohesive, efficient, organized, responsive, accountable, and quality-driven system. It comes with powerful tools only available through a managed care framework, tools that can be used for the benefit or to the detriment of a community system. This is why having a vision and having values are so essential for success.

North Carolina needs a strong model to take the community system of services for people with mental health or substance use problems or intellectual or developmental disabilities to the next level. The managed care model is the only vehicle currently available that can transform the current system into a world-class operational model of the future. PBH has demonstrated that a publicly managed and privately operated service system can provide balance, accountability, and outcomes that will serve the citizens of

TABLE 3.
Selected National Core Indicator Survey Results for Consumers in North Carolina Receiving Services for Intellectual or Developmental Disabilities

Categories	2008-2009 In counties served by PBH	2008-2009 State average	2009-2010 In counties served by PBH	2009-2010 State average	2010-2011 In counties served by PBH	2010-2011 State average
Satisfaction						
The proportion of people who are satisfied with their home staff	100.0%	98.6%	90.9%	95.0%	94.7%	92.2%
The proportion of people who are satisfied with their neighborhood	95.2%	93.3%	81.8%	87.2%	91.3%	87.0%
The proportion of people who are satisfied with their job	100.0%	97.3%	66.7%	90.3%	100.0%	92.5%
The proportion of people who are satisfied with their day activity	100.0%	96.0%	83.3%	91.7%	93.8%	93.5%
The proportion of people who are satisfied with their day activity staff	100.0%	98.9%	100.0%	95.4%	94.4%	94.8%
Service Coordination						
The proportion of people who report that they have met their case manager	100.0%	97.0%	100.0%	93.5%	88.6%	93.5%
The proportion of people who report that service coordinators help them get what they need	100.0%	88.0%	87.5%	87.0%	100.0%	80.7%
The proportion of people who report that their service coordinators asked about their preferences	100.0%	80.8%	75.0%	85.4%	90.0%	82.5%
The proportion of people who report participating in a person-centered plan	78.9%	81.8%	100.0%	86.0%	95.5%	82.0%

Note. Data are from reports titled NCI for Piedmont for each year indicated. These are the results of National Core Indicators Surveys for the years in question. National Association of State Directors of Developmental Disabilities Services and the Human Services Research Institute.

North Carolina well.

Nearly all states are expanding their Medicaid managed care programs because of expanding enrollments, diminishing state budgets, and changes driven by the Affordable Care Act. However, North Carolina is the only state pursuing a publicly managed model. We have a unique window of opportunity that will soon close. Success is possible. All the MCOs, including PBH, need the confidence and good will of our system stakeholders. There will not be another chance for the public system in North Carolina. This is it. NCMJ

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INVITED COMMENTARY

The Role of Critical Access Behavioral Health Agencies in a Reformed Behavioral Health System

Peggy S. Terhune

This commentary discusses the role that Critical Access Behavioral Health Agencies (CABHAs) currently play in meeting the behavioral health needs of people in North Carolina, the opportunities and challenges that CABHAs will confront under the state's section 1915(b)/(c) Medicaid waiver, and the future of CABHAs under the Affordable Care Act.

In 2009, the North Carolina Department of Health and Human Services created a new category of provider agency for mental health and substance abuse services, the Critical Access Behavioral Health Agency (CABHA). The department's chief goal in taking this step was to ensure that critical services are delivered by a clinically competent organization that offers appropriate medical oversight and has the ability to deliver a robust array of services [1]. The CABHA model is an outgrowth of the Piedmont Behavioral Health (PBH) Comprehensive Community Provider (CCP) model. However, the CABHA model added required but unfunded positions, including a medical director, chief clinical officer, and quality management and training director. This modification added more than $500,000 in unfunded costs to the CABHAs, with no revenue source to offset the expense. Another difference between the CAHBA and the CCP was that the CABHA rules specified an array of basic services as well as two enhanced services around a continuum of care.

PBH, which is a managed care organization (MCO), created the CCP model as part of North Carolina's section 1915(b)/(c) Medicaid waiver pilot project, which began in 2005. The organization chose 3 clinically competent and accountable providers, made them responsible for providing core clinical services for at least 2 of the 3 primary disability categories (mental illness, substance abuse, and intellectual or development disabilities), and required them to provide at least 5 distinct services [2]. The specific decision to create 3 CCPs was based on a capacity study and geo mapping, which examined the likelihood and location of individuals in the PBH 5 county catchment area that would require behavioral health services. PBH determined, based on this analysis, that 3 comprehensive provider organizations could meet the population need and remain fiscally solvent without receiving any additional funds from PBH other than the expected fee-for-service. With their fiscal stability assured, those organizations could focus on providing clinically appropriate services at the lowest possible cost. In addition, having a low number of CCPs ensured that communication between CCPs was frequent, which helped build trusting relationships.

Monarch offered to become the first CCP and worked collaboratively with PBH to create and refine the concept. Two more CCPs were added, and the 3 organizations worked together collaboratively, often functioning almost as different arms of the same agency. Consumers were readily referred from one CCP to another. The CCPs and PBH met frequently to work through issues that emerged, streamlining processes to facilitate positive outcomes. For example, when it became clear that a person needed a higher or lower level of service, common practice prior to the CCPs was to refer and discharge, even though it might take several weeks for the new service to begin. The three CCPs met with the MCO and agreed that the referring agency would continue to provide services until the acquiring agency could initiate services. In this way, individuals were not "dropped" within the system, but continuous care was ensured. Consumer satisfaction increased, consumer health improved, costs were managed effectively, and communication between CCPs regarding individual consumers was frequent and remarkably effective. In addition, PBH was able to establish specific quality outcomes and to benchmark the CCPs against state and national indicators as well as against each other. The ability to consistently gather appropriate data allowed PBH to demonstrate that quality of care improved.

The state's CABHA concept derived from this effective model, but thus far, CABHAs have not been as successful as PBH's CCPs. Concerned about how to maintain quality in networks that are not closed, the North Carolina Division of Mental Health, Developmental Disabilities, and Substance

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Abuse Services (DMHDDSAS) has imposed rigorous requirements on CABHAs, such as the previously mentioned additional positions that were not allowed to generate revenue. The process for becoming a CABHA is complex, and rules for CABHAs have changed over time. The initial plan to have a limited number of providers (75-100) was not realized; at one point this number grew to more than 225 [3]. Seeing fragmentation, DMHDDSAS undertook CABHA reviews, choosing 75 of the organizations at random to audit. Some CABHAs (including the original CCPs in PBH) received perfect scores, but many providers were given a plan of correction or were immediately decertified as CABHAs.

PBH requested a waiver from CABHA requirements, as the MCO believed the new requirements to be unnecessary, but the request was not approved. As a result, they lost high-quality provider organizations that had been providing services, which necessitated PBH to direct services to less capable entities [4]. Although PBH has multiple CABHAs in their catchment area, they continue to allow only the three CCPs to function as comprehensive providers. PBH realized that if they were to use all approved CABHAs as CCPs, then the economies of scale and tightness of collaboration and cooperation experienced by the 3 original CCPs would cease to exist. PBH did see value in the addition of a psychiatrist to the team, however, and enhanced the psychiatric rate. Use of the services of the psychiatrists who are medical directors has made it possible to improve the quality of services while furthering the concept of coordination with health care. This has produced better outcomes for consumers at lower cost and has resulted in a focus on coordination with the consumer's Medicaid "health home."

Because the state did not limit the number of CABHAs, and because most local management entities (LMEs)—which manage providers and public funds for local consumers—have not worked to develop trust and collaboration between providers, the CABHA system has not yet met the state's goal of "[moving] the public system over time to a more coherent service delivery model that reduces clinical fragmentation at the local level and begins to prepare the provider community for the changes that will be required in a waiver environment" [1]. LMEs have not been given the authority to replicate the PBH CCP model. Today, the delivery of care continues to be effective in the geographic area served by PBH, but it is still disjointed and fragmented in new locations, including the counties new to PBH.

Opportunities and Challenges of the 1915(b)/(c) Medicaid Waiver Statewide Implementation

As PBH's CCP pilot project demonstrated, one of the benefits of having a limited number of comprehensive providers is improved coordination of services and supports, ensuring that evidence-based, cost-effective, medically necessary services are provided within the Medicaid waiver plan model. With coordination and communication, care can be provided at the right clinical and fiscal level to meet consumer needs. As LMEs merge with one another to form managed care organizations (MCOs), all LME/MCOs will have the opportunity to achieve this, yet it may be that few will succeed in doing so.

A significant factor in PBH's success with CCPs is its ability to have a closed network. PBH determines who will provide which services within its geographic area. By having this level of control, PBH can ensure that the right number of clinically competent providers are offering a specific service, so that the provider's volume of business will be sufficient to maintain its fiscal stability. Many providers appreciate this type of fiscal awareness in an MCO but nevertheless resent the oversight that dictates each provider's business model. In a Webinar presentation on February 12, 2012, Annette Downey, Executive Director of Community Living Services in Ferndale, Michigan, stated that in Michigan, under managed care the consumer (rather than the network) drives the viability of the provider. Organizations there succeed not because a network has selected them to provide certain services, but because they provide a higher quality of service, which leads more consumers to choose to receive care from them. It is unlikely that a consumer-driven system would be effective in North Carolina at this time, however, because the state and the LMEs do not always have effective tools to eliminate poor providers.

The state's decision to create CABHAs was an excellent attempt to re-create and improve upon the CCP model, but the CABHA initiative has been somewhat unsuccessful in achieving its goals. Some organizations that have been approved as CABHAs have attempted to replicate the continuum of care and coordination that has proved effective. Others, however, became CABHAs only in an effort to continue to provide the profitable services in their business array. Political pressures exerted by organizations focused on survival and profit led to the state's decision to approve many more CABHAs than would be needed if the CCP model were being re-created in each LME/MCO area. There are simply too many CABHAs; with a large number of provider organizations, it will not be possible for the LME/MCO to replicate PBH's success.

As the state moves to provide managed care through 11 LME/MCOs, the use of CABHAs as originally intended is in question. House Bill 916, which calls for statewide expansion of the 1915(b)/(c) Medicaid waiver, says that in implementing the expansion, the state should "maintain fidelity" to the PBH demonstration model [5]. Given that CABHAs were not part of the PBH pilot model, which used CCPs to provide a continuum of services within a closed network, it would seem that each LME/MCO should be required to choose a small group of comprehensive providers to serve those functions. New LME/MCOs, however, have been instructed that although they can close their networks, all existing providers must be enrolled in the network, whether competent or not, and the LME/MCO is not to eliminate any providers for the first year. This negates the ability of the LME/MCO to ensure that the network only has clinically competent, ethical providers. However, if the closed model is appropriately used, there will not be any need for state-certified CABHAs.

Existing LMEs are moving from a system in which they have been only partly responsible for quality of care and provider performance to an insurance-based model in which they will have complete responsibility. Although the state has been working and continues to work with the LMEs as they become MCOs, providing technical assistance in areas such as technology, claims processing, network relations, quality management, and so on, LMEs are being asked to morph into a completely different type of organization. Expertise in a new industry is difficult to develop in the short time allotted to each potential MCO. As the LME/MCOs struggle with the operational basics of becoming an insurance company, they have thus had to put aside the issue of how best to provide clinical coordination in a fiscally viable manner through comprehensive providers.

A significant challenge to successful use of either the CABHA model or the CCP model by the new LME/MCOs is the provider/LME relationship. Each LME has its own culture, and each LME relates to providers differently. In the geographic regions to be served by some of the LME/MCOs, the relationship between providers and LMEs is hostile at best; the LME perceives itself to be in total control, and rather than working with providers in a system driven by shared values, it expects to manage quality through extensive monitoring to ensure that the providers in the network perform well. In some instances, the LME has a benign relationship with its providers, but the LME and the providers operate as silos. A constructive, collaborative relationship between the LME/MCO and the provider community is essential if either the CABHA model or the CCP model is to be successful. If the culture of the network is one of distrust between the LME and the providers, that distrust may extend to relationships between providers. In this type of culture, the potential benefits of a CABHA or CCP model will not be realized. Collaboration, cooperation, and a focus on meeting the needs of the consumer must be values that the providers and the LME share, and partners must trust one another. In some networks, that culture of trust plainly does not exist.

Given that LME/MCOs are required to adhere to the PBH model, they should choose a limited number of comprehensive providers for their network (based on capacity studies and geo-mapping) and use those entities to provide comprehensive services. The LME/MCO should then facilitate the depth of collaboration and coordination necessary to create an almost seamless system for referring patients from one comprehensive provider to another. An important concern is that LME/MCOs may not be able to quickly implement an insurance model and may have difficulty negotiating the intricacies associated with determining outcomes and cost-effectiveness in meeting medical necessity. PBH had 5 years to acquire and refine the necessary skills. As LMEs become MCOs, they are likely to become bogged down in the minutiae of operations—technology, legal contracts, meeting the requirements of the Centers for Medicare and Medicaid Services, and the like. LME/MCOs are unlikely to be able to truly focus on quality of care and outcomes in the first few years of their existence.

What Will Happen in 2014 Under the Affordable Care Act (ACA)

When the ACA goes into effect in January 2014, LME/MCOs will continue to manage the Medicaid funds and available state and county money that are designated for mental health, developmental disability, and substance abuse services. Because the ACA includes a state option to provide health homes for enrollees, the need for coordinated, effective services will become even more critical.

As various health practices prepare for the ACA, they are already integrating health homes with mental health services. For example, some oncologists in Charlotte have hired a licensed clinical therapist to provide counseling to oncology patients [6]. It may be that then the oncology practice will refer to specialty behavioral health providers only those patients whose mental health problems are severe. Comprehensive community providers who do not collaborate with health homes by providing for some of the short-term needs of consumers will be relegated to serving only those with more significant needs, which will cause a cultural shift for providers that some may not be able to make.

It is anticipated an outcome model (rather than a fee-for-service model) may drive the system. If so, each provider will be required to demonstrate that they are able to provide care that will make the person who receives it healthier. This will only be possible if an organization has a strong continuum of care, can seamlessly move a person through the services they require, focuses on effective outcomes, and ensures that the least costly service possible is used.

With a CCP model, the MCO will be better able to limit the number of contracts it manages and to provide a platform for coordination of care and accountability. If multiple CABHAs are providing disjointed services, the ability of the MCO to ensure accurate data, appropriate outcomes, and seamless delivery of coordinated services and continuity of care will deteriorate. Money will be spent ineffectively, and outcomes will be less desirable.

Provider organizations should focus on ensuring effective, fiscally viable outcomes. LME/MCOs and provider organizations should work to develop the positive relationships, close collaboration, and coordination that are found in the PBH network. LME/MCOs should limit the number of comprehensive providers in order to obtain the maximum benefit for consumers. The CABHA rules should sunset, and MCOs should be allowed to manage their networks through their own chosen comprehensive providers. NCMJ

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Potential conflicts of interest. P.S.T. is employed by Monarch, which is a large provider within the PBH network and has worked with PBH since before the inception of the section 1915(b)/(c) pilot project. Monarch is a both CCP and a CABHA. Monarch also provides services and supports to people who receive funding from all 11 potential MCOs.

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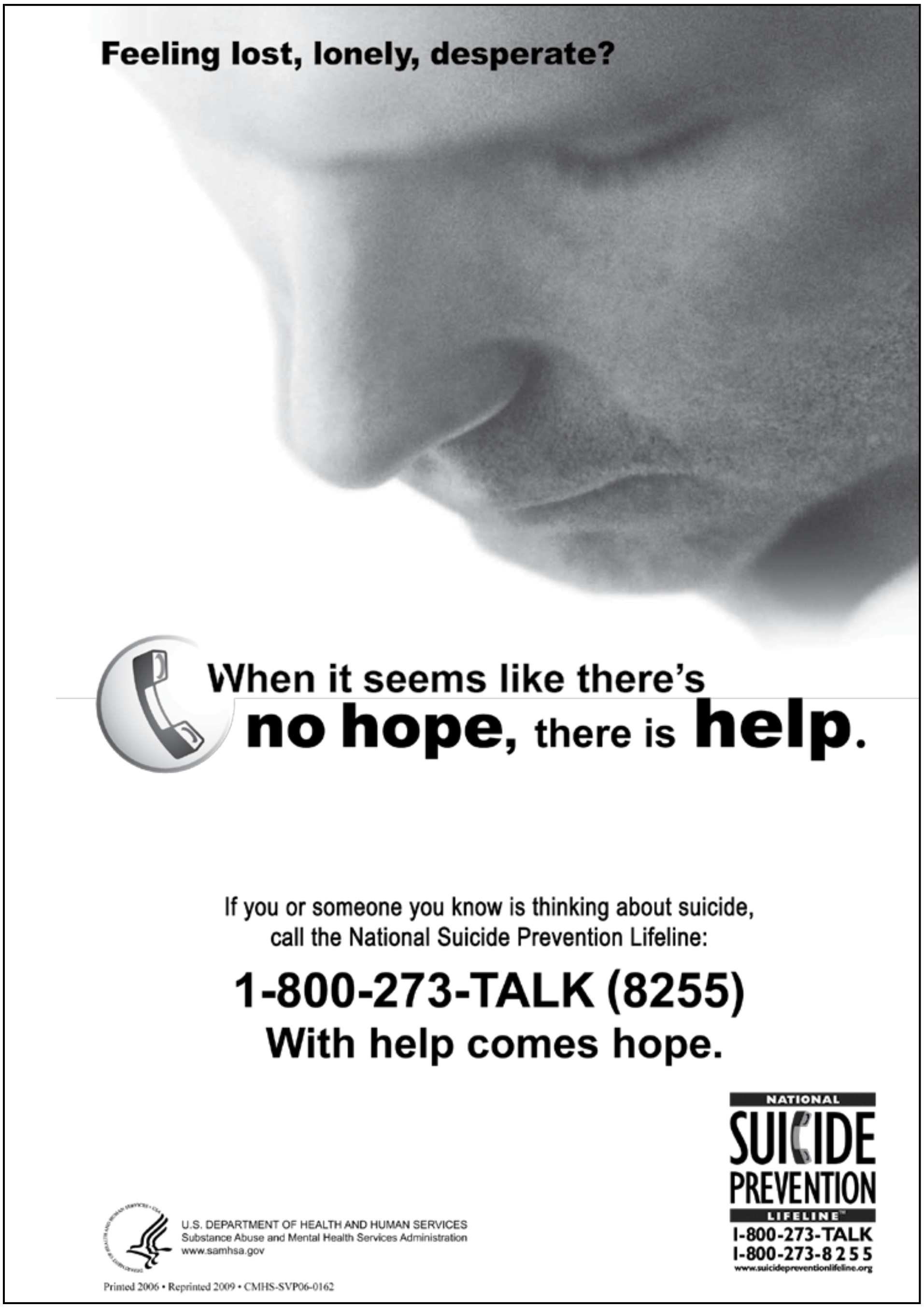

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INVITED COMMENTARY

Mobile Crisis Management Teams as Part of an Effective Crisis Management System for Rural Communities

Doug Trantham, Anne Sherry

Mobile crisis management teams provide crisis prevention and intervention services in community settings. The Appalachian Community Services crisis management program shows how such teams can be used to effectively serve rural communities.

In 2007, North Carolina appropriated funds for the support of mobile crisis management teams across the state. Mobile crisis management is a Medicaid-billable service involving "all support, services and treatments necessary to provide integrated crisis response, crisis stabilization interventions, and crisis prevention activities" [1]. Mobile crisis management teams are staffed with a mix of clinicians and unlicensed qualified professionals. They respond to all ages and disability groups in community settings (including residences, schools, offices and emergency departments) and have around-the-clock access to a psychiatrist for consultation. The Appalachian Community Services (ACS) crisis management system, originally developed by the region's Local Management Entity (LME), Smoky Mountain Center, serves as an example of the effective use of mobile crisis teams to serve rural communities as part of a comprehensive crisis management system that includes emergency dispatch, facility-based crisis intervention services, and walk-in clinics. This effective rural model features assessment by licensed clinicians, linkage with inpatient resources, and close collaboration with community partners to prevent and diffuse crises, avoid unnecessary use of emergency departments (EDs), and achieve positive outcomes for clients.

Delivering mobile crisis services in a rural area presents unique challenges. ACS serves 7 rural counties in Western North Carolina with populations ranging from 10,587 to 59,036. Approximately 120 miles long, the region includes the Eastern Band of the Cherokee Nation and several small municipalities, and is served by 7 small community hospitals and 7 sheriff's departments. Unlike hospitals in urban centers, which typically employ their own behavioral health staff, hospitals in this region must rely on mobile crisis management teams to provide a behavioral health response when one is required by individuals visiting the emergency department (ED). This necessitates credentialing of mobile crisis clinicians. With such a large service area, it is critical that deployment and management of staff be highly effective.

The majority of crisis calls come directly to ACS emergency dispatch rather than to the LME. In fiscal year 2010-2011, ACS had 3,945 calls to the crisis line, of which 2,469 resulted in a face-to-face intervention. Of these, 68% were performed in EDs; the rest were performed in client homes and other safe community settings. The high percentage of assessments conducted in the ED is due to two factors. Many individuals present to the ED before calling mobile crisis. ACS marketing efforts, and the walk-in centers, are beginning to reduce this trend. A second factor is that individuals who require inpatient treatment must be medically cleared prior to being accepted by the receiving facility. Many individuals could receive this medical clearance through an alternative treatment provider, such as an urgent care, and ACS has encouraged the development of such alternatives.

Crisis calls typically come from individuals seeking services, family members of those in crisis, service providers, law enforcement officers, and EDs. Calls are received through a toll-free line by trained support staff, logged into custom tracking software, linked with an available mobile crisis clinician, and triaged. At that point, callers who do not require emergency medical assessment and treatment may be scheduled to be seen in the community, avoiding an unnecessary ED visit. Some callers simply require information, and others may have needs that can be adequately addressed by referral to a walk-in center the following business day. A face-to-face mobile crisis assessment is performed when triage determines that a comprehensive clinical assessment is necessary to ensure someone's safety. The mobile crisis clinician who takes the crisis call works the case from initial triage to disposition. Disposition may

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Crisis Intervention Teams and Mobile Crisis Management

Kate Murphy

The Crisis Intervention Team (CIT) model is a law enforcement-based jail-diversion program for those experiencing crisis as a result of mental health problems. The use of crisis intervention teams is growing across North Carolina. According to an email message from Bob Kurtz, PhD, of the Division of Mental Health, Developmental Disabilities, and Substance Abuse Services in the North Carolina Department of Health and Human Services, in February 2011, more than 4,000 (about 18%) of the state's law enforcement officers were CIT-certified at that time.

The first CIT initiative was developed in Memphis, Tennessee, in 1988 in the wake of a tragedy there. The Memphis CIT program now serves as a national model for taking a proactive approach to assisting individuals in crisis who might otherwise serve jail time [1]. To become CIT-certified, law-enforcement officers undergo 40 hours of training in which they are taught the signs of a mental health crisis and de-escalation skills; officers are also provided with resources for diverting people in crisis from jail by linking them to treatment when this can be done at little risk to public safety [2]. In many instances those in crisis are connected to treatment through the mobile crisis management system.

Southeastern Center for Mental Health, Developmental Disabilities, and Substance Abuse Services facilitates CIT training in Brunswick, New Hanover and Pender counties. In southeastern North Carolina, the relationship of law enforcement officers to the local mobile crisis management system is integral to the CIT program and starts during training. A representative of the mobile crisis system attends CIT trainings to discuss the partnership between mobile crisis clinicians and officers and to explain how to contact mobile crisis dispatch and to access mobile crisis services.

Calls received from CIT officers differ somewhat from other calls to mobile crisis dispatch. Heather Strickland, the mobile crisis management supervisor for RHA Behavioral Health Services in Wilmington, North Carolina, notes that these calls are generally about emergency situations and that specific information about the person in crisis is often not available. "We always have clinicians on call, so that these calls are responded to immediately," says Strickland. A mobile crisis management clinician will meet the person in crisis and the CIT officer wherever they are for a face-to-face assessment. If involuntary commitment is not needed, the clinician can assist in transporting the person in crisis to an appropriate location for other assistance.

Corporal Greta Mallard, CIT Coordinator for the Wilmington Police Department, says, "The development of the mobile crisis team has been a great asset to the officers of the Wilmington Police Department. Having the capability of getting a person in crisis assistance, without having to automatically take out involuntary commitment papers, benefits both the police department and the individual."

The success of the CIT and mobile crisis management programs is reflected in a number of outcomes. Success in Southeastern Center's catchment area is particularly evident in a decrease in admissions of local residents to Cherry Hospital, the region's state psychiatric hospital. Local admissions to Cherry Hospital have dropped: 65 people were admitted in the first quarter of 2011, but only 27 in the first quarter of 2012.

Officer Lonnie Waddell of the Wilmington Police Department, who received the National Alliance on Mental Illness—Wilmington's "CIT Officer of the Year" award for 2011, remembers one instance in which involuntary commitment was prevented. A man with suicidal ideation had contacted his mother in Ohio, who then contacted Wilmington police. When Officer Waddell arrived at the man's home, he spent some time talking with him, gathering his medical history and learning that he had not been taking his medication. Concluding that there was no need for an arrest or involuntary commitment, Waddell then called mobile crisis dispatch. "Mobile crisis clinicians have resources that I don't have," he says. "Some people don't need to go to the hospital or jail; the issue can be handled in their home, where they feel safe and comfortable."

Sergeant Mike Howell, CIT Coordinator for the New Hanover County Sheriff's Office, summarizes the importance of the relationship between the mobile crisis management system and CIT officers: "Mobile crisis is a great resource for officers when assisting someone in crisis. Because mobile crisis can more appropriately respond to these types of calls, the relationship with law enforcement results in a better outcome for the consumers and the community at large." NCMJ

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include diversion from 24-hour psychiatric care with a safety plan, referral to a walk-in clinic or service provider, and voluntary or involuntary referral to facility-based crisis services for drug or alcohol detoxification or for inpatient treatment. Safety plans include items such as arranging for care and supervision with safe friends or family members, removing weapons from the environment, follow up by mobile crisis, psychiatric evaluation, or next working day follow up with the primary provider. The majority of individuals needing 24-hour psychiatric care are admitted to a local or regional crisis or inpatient unit within 24 hours. However, individuals who require a hospital bed at a state institution or some other specialized treatment resource often wait days for treatment. ACS sends a daily report to the LME that lists all individuals awaiting inpatient placement.

In fiscal year 2010-2011, a high proportion (46%) of clients served by the ACS mobile crisis system had no health insurance; 26% of clients served had Medicaid only, 7% had Medicare only, 7% had both Medicaid and Medicare, 11% had third-party insurance, and 3% had tribal insurance. Half of clients served had a primary or secondary diagnosis of substance abuse. For 16% of clients, substance abuse was their primary disability; another 34% of clients had both mental health and substance abuse problems; for 48% of clients, a mental health problem was the primary disability; and for 2% of clients, an intellectual or developmental disability was their primary problem.

ACS operates three mobile crisis teams which are each assigned to cover specific counties. However, because demand for crisis services is often uneven, mobile crisis clinicians can respond to any location as needed. The ACS mobile crisis management system relies primarily on active-duty (rather than on-call) staff to ensure a timely professional response. A dispatcher and 2-5 clinicians licensed at the master's or doctoral degree level are on active duty at all times; clinicians at the master's degree level must be licensed clinical social workers (LCSW), licensed personal counselors (LPC), licensed clinical addiction specialists (LCAS), or licensed psychological practitioners (LPP). Clinicians receive extensive training in clinical and risk assessment, medical risk factors, and involuntary commitment procedures, and all eligible staff are credentialed to complete the first exam for involuntary commitment. A psychiatrist is on call at all times and is frequently consulted. Qualified professionals and other unlicensed staff are used effectively for intervention, follow-up, and engagement with individuals judged not to be in need of 24-hour psychiatric care. The crisis director, clinical director, and medical director at ACS are all actively involved in oversight of all crisis programs. Each mobile crisis team has a team leader, and a supervisor is on-call for consultation at all times. Having rapid access to walk-in services, follow-up care provided by qualified professionals, and psychiatric evaluation the next business day makes it possible for mobile crisis clinicians to divert many cases from 24-hour psychiatric care. This structure strengthens safety plans and saves clients from having to spend a long time in the ED awaiting inpatient placement.

The success of mobile crisis teams in a rural setting is predicated on developing positive relationships with community stakeholders, including the LME, hospitals, law enforcement officers, the departments of social services, magistrates, primary care doctors, indigent-care clinics, homeless shelters, urgent-care clinics and other providers of behavioral health care. Mobile crisis team leaders regularly reach out to these stakeholders, marketing their services by attending meetings, making educational presentations, and facilitating stakeholder meetings between mobile crisis, the LME and the local hospital. As many as 70 such marketing events have taken place during a quarter. The goal is to ensure that all parties are in communication regarding systemic challenges and that they are working on developing ways of addressing the needs of high-acuity clients proactively in community settings. High acuity clients include those at substantial risk of harm to self or others, or those who have challenging psychiatric, substance abuse, or medical needs.

Stakeholders are encouraged to call emergency dispatch at the first sign of a behavioral health crisis rather than using the ED. Every effort is made to perform assessments outside of the ED environment and to stabilize the crisis in the least restrictive setting. Prior to responding in a community location, mobile clinicians triage the medical and safety risks to ensure the well-being of staff members and those served. Mobile crisis team members respond in pairs when necessary and are encouraged to seek psychiatric or administrative consultation as necessary. If a determination is made that the client needs emergency medical assessment or 24-hour psychiatric care, only then is he or she referred to the ED. One benefit of performing assessments in a community setting is that if there is imminent need of inpatient placement, the search for a bed can begin immediately. Despite extensive efforts to educate members of the community to call mobile crisis management first, many individuals present to their local ED without having contacted mobile crisis. In these cases, a mobile crisis team will respond after the client has been medically cleared. Inpatient psychiatric facilities will not consider admitting a patient without medical clearance. The mobile crisis clinician can assist in resolving a crisis quickly and can recommend that the patient be discharged from the ED to outpatient services in the community. ACS was the first approved involuntary commitment waiver site in North Carolina. This allows credentialed mobile crisis staff to complete the first exam for involuntary commitment. The disposition of 41% of the nearly 2,500 crises handled by mobile crisis teams in fiscal year 2010-2011 was that a safety plan was devised and follow-up care and outpatient treatment were arranged. In the remaining cases, it was determined that inpatient care was needed. In 67% of these 2,500 events, someone (eg, a friend or family mem-

TABLE 1.
Average Wait Times to Get a Bed at Broughton State Hospital or in a Local Behavioral Health Inpatient Psychiatric Unit or a Local Crisis Stabilization Unit in Western North Carolina

Six-Month Time Period	Average Wait Time to Get a Bed		
	Broughton State Hospital	Local inpatient psychiatric unit	Local crisis stabilization unit
July – December 2010	1.5 days	13.9 hours	7.9 hours
January – June 2011	2.67 days	14.9 hours	6.5 hours
July – December 2011	4.125 days	15.2 hours	7.2 hours

ber) signed a petition stating that an individual needed to be committed involuntarily for inpatient mental health treatment, but in 15% of such cases, it was possible to have the petition terminated and to initiate outpatient services with safety plans.

Mobile crisis supervisory staff members work closely with the LME staff members who provide care coordination. Mobile crisis supervisors are uniquely positioned to identify individuals who are repeatedly presenting in crisis. It is often the case that those who find themselves in crisis repeatedly have not engaged with a primary provider of behavioral health services or lack access to needed services. When the mobile crisis supervisors communicate daily with the LME to let them know how many people are actively waiting in an ED for inpatient placement, they highlight specific cases that are cycling through the crisis system. Mobile crisis team leaders initiate meetings with the LME and any other agencies involved to identify and address the challenges that such cases present. The LME can assist with these cases by initiating disability applications, guardianship proceedings, or authorization for needed care.

In accordance with North Carolina statute, a magistrate must approve petitions for involuntary treatment and issue custody orders for individuals who have a mental illness or a substance abuse problem and are believed to be a danger to themselves or to others. Although involuntary commitment is sometimes necessary, it can be traumatic for clients and is very expensive for local law enforcement and for the hospital. Mobile crisis team members work with magistrates to avoid unnecessary petitions for involuntary commitment. Magistrates are encouraged to contact mobile crisis dispatch before approving such a petition and issuing a custody order, to determine whether that course of action can be avoided. A mobile crisis team can often facilitate a voluntary admission to a facility-based crisis unit or an adult inpatient unit. Most admissions to either type of unit are on a voluntary basis. The mobile crisis management team provides emergency transportation to safely get voluntary clients where they need to go. In one community where mobile crisis team members worked with local magistrates intensively, the number of crisis assessments that took place in a community setting rather than in the ED increased by 50% over a 1-year period.

The mental health system in North Carolina has been transformed over the past decade. Challenges associated with these changes have been well documented. The implementation of mobile crisis management in North Carolina may be seen as one success of mental health reform, but significant problems remain.

In the far western part of the state, by far the most significant challenge for hospitals, law enforcement, and the mobile crisis system is the lack of sufficient inpatient capacity for adults, children, and adolescents whose care needs are such that they would be considered "high acuity" patients. Although in recent years the state has made more private psychiatric beds available through state contracts with community hospitals, wait times for some clients continue to grow. Although a mobile crisis team can resolve many crises, and can facilitate local admission for most adults, the wait time for some populations places a severe strain on hospital EDs, law enforcement (who often wait in the emergency department until a disposition is found), clients and families. For children and adolescents, geriatric patients, individuals who require admission to a state hospital, and those with unstable medical conditions that may complicate treatment such as high blood pressure or diabetes, wait times range from a few days to up to 3 weeks. (In the ACS region, the average wait time for a bed in a state hospital more than doubled over the past 18 months, increasing from 1.5 to 4.1 days; that increase is consistent with trends across the state [2]; see Table 1.) These individuals, whose needs as patients are too great for them to be served by a local private facility, wait in an ED, where they do not have access to the treatment they require. Some individuals cannot be served locally because the services they need are unavailable (such as child crisis stabilization, child inpatient, geriatric, medical/psych inpatient), or because their acuity is too high to be served in local facilities. There is a critical need for a facility-based crisis unit to serve children and adolescents, who currently must be transported to an inpatient unit several hours away from their families.

A rural mobile crisis system also faces transportation and funding challenges. The distance to psychiatric facilities, including Broughton State Hospital, is a significant barrier. Our LME, Smoky Mountain Center, provides some funding for emergency transportation, which helps clients access care on a voluntary basis. Fortunately, Smoky Mountain Center, has long made funding for crisis services a priority; without that funding, the ACS crisis management system would not be possible. Commercial insurance and Medicare do not reimburse for mobile crisis services. Only 26% of those served have Medicaid coverage, and nearly 50% have no insurance of any kind. North Carolina may experience significant cuts in Medicaid mental health funding in the coming years [3]. Further cuts to a system that is already inadequately funded will place additional burdens on local systems of care.

Mobile crisis management, as part of an integrated crisis system, can have a significant positive impact on clients, families and communities by making crisis prevention and crisis intervention readily available. The ACS model, which provides licensed clinicians, emergency dispatch, ED response, facility-based crisis services, and walk-in centers, provides a robust crisis response in a challenging rural setting. This program has proved effective over time in meeting community needs with available resources. With the continued support of policymakers, funders and community partners, we can work together to provide the best crisis care possible to our community. NCMJ

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INVITED COMMENTARY

Primary Care/Behavioral Health Integration Efforts in North Carolina

Regina Schaaf Dickens, Michael S. Lancaster, Kelly Crosbie

Building upon the foundation work begun by the ICARE Partnership in 2006, the North Carolina Center of Excellence for Integrated Care, Community Care of North Carolina, and the North Carolina Division of Medical Assistance have been working together to advance and expand integrated care.

North Carolina is viewed as a leader in the field of integrated primary and behavioral health care. Through the efforts of an array of public and private funders and service delivery partners, models have been developed that demonstrate the culture and process changes necessary to improve patient outcomes and reduce barriers to service delivery. These innovative approaches support the goals of the 1915(b)/(c) Medicaid waiver [1], piloted in North Carolina in 2005 and recently approved by the General Assembly for statewide expansion by 2013. The goal of the expansion is to establish "a system that is capable of managing public resources that may become available for mental health, intellectual and developmental disabilities and substance abuse services" [2]. Consumers of these services need improved access to high-quality behavioral health care and primary care in order to better manage all types of chronic conditions.

Integrated care is a biopsychosocial approach to care planning and service delivery that greatly enhances the transition to a patient-centered medical home or similar structure of care. The evolution of bi-directional care affords a patient an opportunity to receive screening, brief intervention, and appropriate referral to more intense levels of treatment by offering behavioral health services in medical settings and physical health screening in specialty behavioral health provider organizations. Simply increasing collaboration between primary care practices and behavioral health provider agencies has been an important first step in assuring coordinated care. Service delivery models may range from co-location with a specialist offering direct or consultative services to selected patients onsite, to a fully integrated medical and behavioral health team approach where every patient has access to a full array of multidisciplinary providers.

The North Carolina Division of Medical Assistance (DMA), the North Carolina Center of Excellence for Integrated Care (the Center), and Community Care of North Carolina (CCNC) have worked collaboratively to support the advancement of integrated care across the state. By bringing together policy and funding (the DMA), training and consultation (the Center), and applied practice (CCNC), the alliance has achieved significant progress. This is an overview of their cooperative accomplishments during the past 5 years and their vision for the future of integrated care in North Carolina.

The Center of Excellence for Integrated Care

The Center is a program of the North Carolina Foundation for Advanced Health Programs (NCFAHP); it is dedicated to improving patient health and wellness by fostering integrated care for both physical and behavioral concerns. This integration is achieved by ensuring that health care providers collaborate to provide patient-centered care. Working with multiple partners and stakeholders, the Center ensures that consistent, evidence-based standards of care are adopted across health care settings, so that patients receive care that employs best practices wherever they seek treatment.

The Center grew out of the work of the ICARE partnership, an initiative that, between 2006 and 2009, helped North Carolina become a national leader in integrated care. Three-year funding for ICARE was provided by the Duke Endowment, the Kate B. Reynolds Charitable Trust (KBR), AstraZeneca, North Carolina's Area Health Education Centers (AHEC), the North Carolina Department of Health and Human Services, and NCFAHP. In 2010, Governor Beverly Perdue endorsed ICARE, saying that it had set the stage for what we should be doing in health care today. That year, funding was made available to the Center through the North Carolina Health and Wellness Trust Fund, the DMA, and the Office of Rural Health (through a Children's Health Insurance Program Reauthorization Act [CHIPRA] federal grant). Current funding comes from continuance of the CHIPRA grant, new grant funds from KBR, and contracts with the Governor's Institute for Substance Abuse and other agencies of the North Carolina Department of Health and Human Services.

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Integrative Care:
What the Research Shows

John W. Williams Jr

Because the majority of patients with mental illness are treated by generalist physicians, primary care has been described as the "*de facto* mental health system" [1]. Unfortunately, outcomes for patients with common mental illnesses treated in primary care settings are often poor. Fewer than half of patients with depression recover within 6 months of starting treatment, and outcomes are worse for minority and low-income patients [2, 3]. Studies show multiple problems with the quality of care, including underdiagnosis, inadequate dosage and duration of treatment when psychotropic medication is prescribed, and infrequent follow-up [4, 5]. Early attempts to improve patient outcomes focused on improving care for depression through clinician education and depression screening, but these efforts largely failed. However, important lessons were learned, and it was hypothesized that outcomes could be improved by integrating mental health care with primary care and delivering that integrated care in a primary care setting.

Over the past 2 decades, integrated care has been evaluated in a series of randomized controlled trials (the strongest design for testing a new treatment intervention). In the initial studies, including a 1995 study by Wayne Katon and colleagues [2], adult patients with depression were cared for jointly by a mental health professional and a primary care physician at the same location; often the patients alternated visits with the two providers. These studies showed improved outcomes with this approach; however, it was thought to be too expensive and to strain an already limited supply of mental health professionals. The model evolved into a team approach that incorporates specially trained nurses, pharmacists, or health coaches and makes greater use of telephone follow-up to increase the frequency of contact at reasonable cost. These integrated approaches also borrow from Edward Wagner's chronic care model [6], empowering and preparing patients to manage their own health and health care. More systematic follow-up, stepped-care treatment algorithms, disease registries and decision support have been introduced. Decision support often takes the form of having a mental health professional supervise the nurse, pharmacist, or health coach. Various permutations of this integrated care model for depression have now been evaluated in more than 40 trials, some of which have included up to 2 years of follow-up.

High-quality systematic reviews [7, 8] have shown that, compared with primary care treatment alone, integrated care for depression doubles the rate of medication adherence and significantly improves symptoms of depression, functional status, and patient satisfaction. In one large trial involving 1,801 older adults, treatment lasting 1 year was shown to have positive effects that were still present at 2-year follow-up, including decreased pain scores in the subset of depressed patients who also had arthritis [9-11]. The results for patients from ethnic minority groups and those with low incomes were as good as or better than those for the group as a whole.

More recent trials have shown that these positive effects extend to depressed patients who have a concurrent condition, such as a chronic medical illness (diabetes mellitus or coronary artery disease, for instance), generalized anxiety disorder, or panic disorder. Integrated care that focuses on mental health outcomes does not have a halo effect that improves general medical outcomes [12]. However, when integrated care uses similar methods for both depression and chronic medical conditions, increasing follow-up and measurement-based care for both, outcomes for both (including measures of disease control such as glycated hemoglobin and serum cholesterol levels) are improved [13, 14]. Integrated, collaborative care of this sort has been shown to be highly cost-effective, and in some subgroups of patients, it has actually produced cost savings [15, 16].

What are the key ingredients of integrated care? An analysis that sought to identify the components of integrated care that have been consistently associated with greater impact on symptoms of depression [17] concluded that the most important features are active care by the primary care physician, collaboration with a mental health professional, adherence monitoring, treatment response assessment using a symptom scale, active support for patient self-management skills, and integrated treatment lasting at least 16 weeks.

How can integrated care for depression be promoted in North Carolina? The state's primary care physicians support integrated care, and the approach described here is consistent with the "medical home" team-based medical care delivery model. However, given current

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Key partners in the early ICARE work included the North Carolina Academy of Family Physicians, the North Carolina Pediatric Society, the North Carolina Psychiatric Association, and Southern Regional AHEC. Today, representatives from more than 30 state agencies and organizations continue to serve on the Center's Advisory Committee to assure ongoing development of, and commitment to, effective patient care by creating locally based, integrated health systems. The Center is a resource for government, hospitals, health systems, the health care industry, Local Management Entities (LMEs), CCNC networks, health care payers, and the public. It serves as a "think tank" in which these stakeholders develop best-practice models that meet the needs of primary care and behavioral health patients and providers in a collaborative, strength-based approach to service delivery. (A strength-based approach builds upon the per-demands on primary care practices and the precarious financial situation of many of them, support for implementation will likely be required. Free online training and support materials are readily available from such sources as the IMPACT (Improving Mood-Promoting Access to Collaborative Treatment) program at the University of Washington [18] and the MacArthur Initiative on Depression and Primary Care [19], but it would be helpful to offer some technical assistance in combination with these. The major challenge to widespread implementation is developing a successful financial model. Large health systems such as those of the Veterans Health Administration and the US Department of Defense have successfully implemented integrated care models [20, 21]. For smaller practices, which may not benefit directly from improved patient outcomes and potentially lower utilization of services, bundled payment approaches are being evaluated in the DIAMOND (Depression Improvement Across Minnesota, Offering a New Direction) study [22]. North Carolina policymakers can learn from this ongoing investigation of a model for primary care management of depression. NCMJ

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son's strengths, rather than focusing on their weaknesses or problems.) The Center's staff members provide onsite and telephonic technical assistance and training. Coaching for practice change and for model sustainability through continuous quality improvement is customized for practice sites and enhanced by the growing use of electronic health records.

Through demonstration projects, models of bidirectional care are being developed to provide appropriate behavioral health services in primary care settings and medical interventions in behavioral health settings. The emphasis is on disease management and early identification of medical and behavioral health issues, with brief intervention and referral to appropriate specialty treatment.

The Center's Web site (www.icarenc.org) is a comprehensive and accessible state-of-the-art information delivery system. The site has had more than 1,139,000 page views and more than 430,000 visitors, and there have been nearly 200,000 downloads of resource materials. The Center regularly updates and expands the substantial resources for health care providers that are available on the site. Those resources include evidence-based tools and techniques, clinical protocols, third-party reimbursement training, information on research in integrated care, training and technical assistance to eliminate barriers to integrating care, implementation guidance, community resources (by county), and models for increased patient access to care.

Community Care of North Carolina

To begin implementing the Center's models for integrated care, CCNC began a Behavioral Health Integration (BHI) program in 2010. The BHI initiative supported the hiring of 19 psychiatrists to work in the 14 CCNC Networks across the state. In addition to these part-time psychiatrists, 14 full-time behavioral health coordinators were hired to support each network's efforts to integrate primary care and behavioral health care. This coordinated behavioral health team was charged with providing support to local care managers, providing education about models of behavioral care to health care practices, and establishing liaisons between the primary care provider community and the behavioral health community, which have long existed as separate silos of care.

The goal of the BHI program has been to break down the primary care and behavioral health care silos by linking the two types of practice. The initial phase of the program focused on identifying the behavioral health resources available to primary care providers in their local communities and providing a liaison between the two. A critical component was to reintroduce to one another the two provider groups, who were serving the same population of patients but had a limited relationship. With the support of the Center, models of co-location have been proposed that range from simple consultation to actual physical location of behavioral health resources in a primary care practice. Adoption of any of these co-location models enhances the ability of health professionals to serve patients in a more effective and efficient manner.

Another focus of the BHI program has been to increase the use of best-practice models of care. With the integration of behavioral health care with primary care, the opportunity to provide prevention and early identification of many health problems has become a reality. Prior to this integration, the behavioral health community focused largely on providing crisis services with the limited resources available. In the current integrated model, the ability to screen for substance use disorders using the SBIRT approach, to identify depression early using a brief patient health questionnaire (the PHQ-2 or the PHQ-9), and to diagnose attention-deficit hyperactivity disorder in children using the Vanderbilt Assessment Scale makes it possible to intervene early in these conditions by beginning treatment in the primary care setting. The BHI initiative provides guidelines and education to help primary care physicians treat these conditions successfully, and it helps identify community resources when it is time to refer patients to psychiatric specialty services.

The BHI initiative introduced motivational interviewing to the care managers of CCNC as a tool to engage and empower patients to assume responsibility for their own care. Motivational interviewing is a best practice that has been shown to impart to patients a sense of empowerment, with the result that they participate actively in their care, become more autonomous in caring for themselves, and adhere better to regimes for chronic disease management (such as smoking cessation, diet, and medication). This type of interviewing is a skill that is learned with much practice and the support of colleagues. CCNC offers its 600 care managers extensive training through webinars, a day-long classroom training, and monthly follow-up that includes coaching and providing technical assistance in a small group setting for 12 months. This training has been provided statewide through North Carolina's AHEC system. Motivational interviewing supplements limited resources in the primary care and behavioral health fields by deploying an untapped resource for care: the patients themselves.

The North Carolina Division of Medical Assistance

Since the 1980s, the DMA has been developing policy to support the use of patient-centered medical homes through multiple managed care initiatives. In 1991, the Centers for Medicare and Medicaid Services (CMS) approved a section 1915(b) Medicaid waiver that allowed mandatory enrollment of select Medicaid eligibility groups into "primary care case management" programs. The first such program was Carolina Access, and then CCNC was added during an expansion in 1998. Both programs allowed open access to primary care and preventive services, and both required primary care physicians to provide and manage specialty medical services for Medicaid enrollees in their practices. These physicians were, in turn, enrolled in CCNC networks, which provided disease management for the entire Medicaid population in a local coverage area. However, early Medicaid policy did not address the fact that a significant amount of mental health treatment was being provided by primary care physicians. In 2009, the DMA updated the CCNC contracts to include additional capitation funding for initiatives aimed at treatment and management of behavioral health conditions at the primary care physician level as well as at the network level.

In the early 2000s, the Medicaid behavioral health benefit began to expand in accordance with mental health reform in North Carolina by creating policy for specialty community-based services delivered by a private provider network. The DMA contracted with LMEs to provide care management to high-cost, high-risk recipients with behavioral health needs and to provide behavioral health care referrals for any

Medicaid enrollee. North Carolina began implementation of a 1915(b)/(c) Medicaid waivers program with a pilot project in 2005 and, in 2009 and 2011, expanded the waivers statewide, with the intent of having a greater number of existing LMEs become DMA vendors for oversight of the specialty behavioral health care system by 2013.

Other DMA policies at the recipient and provider level have evolved to support integrated care efforts. DMA recipient initiatives in recent years have aimed at enrolling additional eligibility groups in the CCNC networks, most notably those eligible to receive Aid to the Aged, Blind, and Disabled—an enrollee group with a high use of specialty behavioral health services and supports. In 2009, DMA began reimbursing co-located mental health therapists for assessments, smoking cessation counseling, and substance abuse screenings using the SBIRT approach. All new clinical policy updates for specialty behavioral health services require coordination with, and in some cases referrals from, the patient's CCNC primary care physician. Through collaborative efforts with the Center, the Office of Rural Health, and CCNC, the DMA developed a "Mental Health/Substance Abuse/Developmental Disability Integrated Care Toolkit" for behavioral health providers. This toolkit offers guidance on coordinating care with the recipient's CCNC physician and explains how to access the recipient's CCNC medical information.

DMA is finding it challenging to keep the momentum of integrated care efforts going, as specialty behavioral health care continues to be carved out and managed by the LMEs apart from the CCNC networks. Some physician practices express concern over the need to enroll their embedded behavioral health staff in an LME network and bill psychotherapy codes to the LME. Part of the answer may lie in the flexible payment structures allowed under a 1915(b) waiver and under the Affordable Care Act. LMEs can incentivize the use of co-located behavioral health professionals by using differential (or higher) rate structures based on episode-of-care or avoidance of higher-levels of care when treatment is provided in the primary care setting. LMEs can offer an expanded unmanaged outpatient therapy benefit when care is provided in a CCNC practice. LMEs are also required (per the DMA contract) to collaborate with the local CCNC networks on care coordination of recipients with serious and persistent mental illness. It is imperative for individual physicians and CCNC networks to see that the LMEs are resources for recipients with complex behavioral health needs who need treatment beyond brief, strategic behavioral health interventions. The success of the health home (medical home) model and the effectiveness of overall holistic health care of the Medicaid recipient hinges on the collaborative efforts of CCNC and the LMEs. To that end, DMA will continue joint workgroup efforts with the North Carolina Center of Excellence for Integrated Care, CCNC and LMEs.

Advancing Integrated Care

North Carolina is well positioned to continue to be a leader in the field of integrated care. Building on the significant work accomplished through the collaboration of the DMA, the Center, CCNC, and additional public and private stakeholders, we can leverage the principles of health care reform into the future. Adoption of high-quality, performance-based approaches to prevention, early intervention, and chronic disease management is a critical component of innovative models of care. As provider practices become certified as patient-centered medical homes, they must establish models of collaborative, team-based care. Meaningful use of health data will offer opportunities for examination of the impact of integrated practice across health care settings. New models of funding to support an effective care management system are emerging through pilot programs supported by public and private payers. The Center plans to continue to convene a wide array of stakeholders to serve as the think tank for advancing the vision of integrated care in North Carolina. NCMJ

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INVITED COMMENTARY

Prevention, Treatment, and Recovery Supports for Those with Substance Use Problems:
Opportunities for Enhanced Access and Quality of Care

Thomas O. Savidge, Flo Stein

Substance use disorder is one of our nation's most significant public health problems. If unaddressed, an individual's addiction will negatively impact the family, community and the health care system. Despite major strides in the field of addiction treatment, major barriers still exist preventing the problem to be addressed. We propose some recommendations to help improve access to care.

The North Carolina public and private system for the treatment of persons with substance use disorders continues to face many challenges, the most important of which is the need to remove barriers confronting those seeking access to care. However, we are cautiously optimistic that the Affordable Care Act and the state's recent legislation expanding the managed care Medicaid waiver statewide will improve the overall service delivery system for those in need of substance abuse treatment.

The challenges currently facing substance abuse professionals as well as the organizations and programs that provide treatment have been present for many decades. Most of them are attributable to unnecessary barriers to appropriate access to care, including gaps in insurance coverage for substance abuse services in some plans, reimbursement rates that do not support the required professional credentials to provide treatment, social stigma of people with substance use disorders, and denial. The mainstream media now more than ever glamorizes binge drinking and the use of illicit drugs. Portrayals of a lifestyle of nonstop partying reach an even younger audience than in the past, thanks to omnipresent access to the Internet. Young people get the impression that if one's lifestyle gets out of hand, then all that is needed is an intervention, followed by a ride to the nearest rehab facility. The media portrays substance abuse rehabilitation as easily accessible, and they minimize its seriousness, implying that it is simply a normal part of growing up. The realities of addiction and of its impact on individuals, families, and society are glossed over.

Great strides have been made in achieving parity between coverage for mental health and substance abuse treatment and coverage for medical and surgical treatment. However, the coverage offered by most insurance plans is still limited, and both premium costs and the costs of care is quite costly. Cost, fear of withdrawal, and the stigma associated with substance abuse continue to deter many individuals from seeking treatment.

In comparison with other states, North Carolina is generous when it comes to providing state funding for the uninsured or underinsured to receive substance abuse treatment. But although funding is available, care is difficult to access. This is clearly evidenced by a long history of state allocations being underutilized.

There are multiple systemic problems that contribute to difficulty in accessing treatment for substance abuse. Providers and organizations that receive state or federal substance abuse funding are required to give pregnant substance users and injecting users priority admission. Although pregnant women and those who inject drugs do have fairly good access, the majority of all others in need of treatment are usually unable to attain it. The Local Management Entities (LMEs) conduct a needs analysis for each county on an annual basis. They identify groups in need, and in conjunction with the state, try to target those in need by allocating funds accordingly. Yet their desire to be good stewards of taxpayer dollars has led them to create an eligibility and authorization process that is complicated to navigate. Different funding sources have different requirements before a person can be approved for treatment (for example, a failed attempt at Alcohol or Narcotics Anonymous, length of time or amount of use, or income). While the addicted person is awaiting "approval" to receive services, more often than not the small window of opportunity for engagement will close, as addiction cravings overrule the person's desire for treatment. The emphasis on managing limited substance abuse funds conservatively has been taken to an extreme, which has resulted in funds not being utilized and those in need not getting treatment. This has to change. It would be much more beneficial

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for those in need if the system required that all available funds be exhausted. Any eligible person, regardless of the severity of his or her addiction, should be given immediate access to treatment if he or she requests it. If an epidemic of swine flu were to break out, we would not address it by requiring those who need treatment to go through a labor-intensive process to get approval to receive it. At a recent lecture, the presenter discussed the phenomenon of society spending vast sums to rescue people who get lost on rock-climbing or camping excursions. More than a million dollars may be spent on a rescue mission to retrieve one individual lost in the woods, emphasizing the high value we place on a life. Yet a person seeking treatment for substance abuse may have great difficulty in getting society to pay $19.05 so that he or she can receive an hour of group therapy. This is the amount that Medicaid and the state Division of Mental Health, Developmental Disabilities and Substance Abuse services authorizes for group therapy. In some instances it seems as though more money is being spent on efforts to avoid spending treatment dollars than is being used to provide services.

The state's initial efforts to accomplish mental health reform in 2001 were admirable; unfortunately, the state did not accurately gauge the potential for such problems as provider fraud and abuse to arise. The irresponsible and unlawful behaviors of a few ultimately made it more difficult for substance abusers to access care, because in an attempt to address the fraud and abuse, excessive rules and regulatory requirements were put into place. This has dramatically shifted the focus of attention away from those in need, as the organizations that provide treatment services have been forced to give priority to regulatory bodies instead. We are currently operating in a system that values regulatory compliance more highly than quality of care.

The list of problems is daunting, but opportunities for improving the system of care are abundant. The Affordable Care Act (ACA) and the development of state managed care organizations required as part of the expansion of the state's Medicaid waiver are focusing many management efforts on improving patient outcomes. If this focus replaces the unnecessary rules and regulations, providers of services will be able and willing to place much greater emphasis on developing systems for measuring the outcomes of various treatment interventions. These measurements will accelerate the integration of evidence-based practices into the treatment continuum.

The use of electronic health records will greatly enhance the ability of all health care providers to develop more effective treatment interventions, for example, by having point-in-time information and recognizing patterns of inappropriate behavior such as doctor shopping for prescriptions. In addition, the controlled-substance reporting system will make it easier to hold physicians accountable for their prescribing practices and to identify patients making excessive use of prescribed medications. This will allow for more-immediate interventions and better coordination of care. The emerging practice of co-location substance abuse services with primary care holds great promise for ensuring that all of an individual's needs get addressed. This is particularly important because substance abuse problems are frequently triggered by other medical problems.

As these new systems are put into place, it will be important to monitor the impact that cost reductions have on patients and providers. Currently the lack of coordinated care results in unnecessary duplication of care. Eliminating this duplication will result in increased competition among providers for patient loyalty. The key to preventing this will be through the development of new business models that address the needs of all involved stakeholders.

Providers in North Carolina and across the nation are cautiously anticipating a new, more inclusive system. The ACA and the Mental Health Parity and Addiction Equity Act offer hope for improved coverage of services and improved access for those needing services. Those two laws have a number of provisions that address impediments to care for people with substance use disorders: Those with pre-existing conditions are being given immediate access to care, lifetime caps on insurance coverage have been eliminated, and access to free preventive care, including screening for alcohol and drug misuse, will be required. The ACA also encourages payers to reimburse evidence-based services and supports. In August 2011, John O'Brien, then senior adviser for health finance at the Substance Abuse and Mental Health Services Administration, stated that "the new system of care should use information and science to deliver care. Services that are proven effective or show promise should be funded and taken to scale" [1]. Guidance will be forthcoming providing states with information about the evidence base for services that are recommended to be included in benefits plans for mental health and substance use services.

One of the most significant changes is the extension of Medicaid coverage to include low-income, childless adults. As Steven Rosenberg, president of Community Oriented Correctional Health Services, has observed, "For the first time, Medicaid expansion will support the delivery of community-based behavioral health care that can reduce the use of jail beds as well as other costs to society" [2]. Currently, childless adults with substance use disorders are not eligible for Medicaid, regardless of how low their income might be. This lack of coverage has acted to restrict care, with the exception of emergency services, and it has limited the development of necessary provider capacity. It is estimated that nationwide, 14.6% (2,909,294) of the total number of people who are expected to be eligible to buy insurance coverage on the health insurance exchanges established by the ACA (by virtue of having an income that is at least 138%, and not more than 399%, of the federal poverty level) will have substance use disorders; it is likewise estimated that 14.2% (2,603,405) of the total number of people who will become newly eligible for Medicaid coverage (as result of its expansion to include adults with incomes up to 138% of the federal poverty level) will have substance use disorders [3]. So the ACA will result in thousands of North Carolinians with substance use disorders being included in the health care system for the first time, creating an opportunity to improve the health outcomes of individuals, families, and communities. NCMJ

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INVITED COMMENTARY

Mental Health Recovery

Debra G. Dihoff, Michael Weaver

North Carolina has new opportunities for orienting its mental health care system toward client recovery as the system shifts to managed care with the possibility of offering more innovative services. Ways of accomplishing this reorientation are explored and instances of progress are noted.

Recovery is quite the mental health buzzword these days. But recovery is more than just "the process of combating a disorder" [1]. What are the essential components of mental health recovery? And what opportunities currently exist for changing our mental health care system in ways that will promote recovery?

A group of experts convened by the Substance Abuse and Mental Health Services Administration (SAMSHA) in 2004 produced the following consensus statement on recovery:

> Mental health recovery is a journey of healing and transformation enabling a person with a mental health problem to live a meaningful life in a community of his or her choice while striving to achieve his or her full potential [2].

The consensus statement goes on to describe 10 fundamental components of recovery: (1) Recovery is self-directed; those with illnesses "lead, control, exercise choice over, and determine their own path of recovery." (2) Recovery is individualized and person-centered. (3) The person in recovery is empowered "to choose from a range of options and to participate in all decisions." (4) Recovery is holistic; it "encompasses . . . mind, body, spirit, and community . . . and embraces all aspects of life." (5) Recovery is nonlinear; it is "not a step-by-step process but one based on continual growth, occasional setbacks, and learning from experience." (6) Recovery is strengths-based, building on the "capacities, resiliencies, talents, coping abilities, and inherent worth" of the person in recovery, rather than focusing on correcting deficits. (7) Peer support and the sharing of experiential knowledge encourage recovery. (8) The person in recovery deserves respect, acceptance, and appreciation. (9) The individual takes responsibility for his or her own self-care and recovery. (10) Hope is "the catalyst of the recovery process."

Recovery is a way of thinking that can be adopted both by the individual in recovery and by the mental health care system. It differs greatly from the approach of having an expert, generally a psychiatrist, control and direct the treatment. In fact, it turns that approach upside down by putting the person with the illness at the center of all decisions. Professionals are part of the recovery team, but they function more as consultants. Services and supports become oriented around what really works for the consumer, based on his or her strengths.

Recovery Stories

At age 36, Jon returned home to live with his parents after having spent many years living in low-income housing or on the streets, with periodic enrollment in college. As a person living with schizophrenia, the voices he heard and the tactile hallucinations he felt were so troubling to him that he could not tolerate being around people. By the time he moved back in with them, Jon's parents had graduated from the National Alliance on Mental Illness (NAMI) Family-to-Family psychoeducation program. Jon underwent peer training and is now working 24 hours a week as a recovery educator and peer support specialist. He has overcome his fear of crowds and of driving on the highway. He makes presentations to audiences frequently and enjoys being in a band. The costs to the system are much less (eg, he has had fewer hospitalizations and trips to the ED, and fewer police interventions), and his family is paying less of an emotional cost. Jon is recovering.

Janice had dyslexia early in life and did not to learn to read until she was in her 20s. Her learning difficulties were compounded by bipolar disorder and substance abuse. She was put into group and foster homes because of her behavior and was restrained and secluded frequently. She had 4 children and lost custody of them all. At age 40, she started to experience hope and began her recovery journey when she began to attend classes to learn more about her illness. She became a peer support specialist and now serves on a NAMI affiliate board. She learned how to drive and got a full-time job. Now, at age 46, she owns a house and a car, has gotten married, and has regained custody of most of her children. She has decreased her dependence on public services and manages her own recovery.

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George's life was decimated by a troubled home life, schizophrenia, and crack cocaine use. During inpatient treatment, he was frequently restrained and put into seclusion, which aggravated his symptoms. Finally, he was exposed to a self-advocacy approach and learned how to make a recovery plan that included managing his symptoms. (Recovery plans are written by the person with mental illness. The plans typically include strategies to keep the person healthy, as well as tactics to identify and de-escalate situations that can exacerbate symptoms of their illness.) He has become a leader in promoting a system based on ideas of hope, empowerment, education, choice, and support. He is a leader in government and advocacy organizations. He still receives publicly funded mental health care, but at a minimal level.

These 3 individuals are experiencing recovery because of effective professional intervention and the existence of role models of recovery in their communities. One of the beliefs that supports self-directed recovery is that people need to see recovery as part of their lives, and to do this, "they need to be surrounded with possibilities of recovery" [3].

Opportunities to Create a Recovery-Focused Mental Health Care System in North Carolina

By 2014 North Carolina will have made changes to comply with the Affordable Care Act. In addition, because of state legislative changes, its mental health care system will have transitioned to a fully capitated, managed care model. What are the opportunities to move toward a system that supports recovery? In order to live within their capitated budgets, managed care organizations (MCOs) will be motivated to provide services and supports that help people get well and stay well. Under the old fee-for-service system, billing had no capitated limit each year. The new system will offer an incredible opportunity to make recovery the focus of care by giving the people who need help a personal stake and role in maintaining their own recovery. Lessons learned from people like those in the stories above can be applied.

Reinvestment of savings. MCOs must manage their state and Medicaid funds in order to achieve the best possible health for those in need within a capitated amount. They must pay for all of the needs of the population within their region with that pot of money. What a terrific opportunity this presents for moving from a provider-defined system to a system that compiles data about which services really work and which providers achieve the best outcomes. In this new system, the MCO can attract high-quality providers because they can pay them more and can limit the total number of provider contracts. Since there will be fewer providers, the communication between the MCO and provider will be enhanced. If the contracted providers support recovery, they will have more successful outcomes. It will be difficult to shift priorities and sever old contracts in favor of services and providers that are focused on recovery, but doing so is essential to achieving this vision. The MCOs will have the tools to restrict the number of providers and to adjust rates; these are big changes.

Former LMEs that convert to MCOs will have to determine which services will help promote patient self-directedness, empowerment, and responsibility, as well as the other characteristics of recovery. People with mental illnesses want decent housing, and for many of them jobs are both necessary and appropriate. Hospitalizations must be planned for, but in the community, recovery services are most important—and most lacking. Supported housing, employment, psychoeducation (to help patients and their families better understand their illness), and specialized peer support are services that MCOs should endeavor to add to their array. Previous rules prevented spending funds on housing per se, but with the opportunities afforded by managed care, savings from a better-managed system can be reinvested in housing. Ensuring that people with mental illness have safe and affordable housing greatly contributes to stability; doing so results in savings, as does helping people avoid hospitalization.

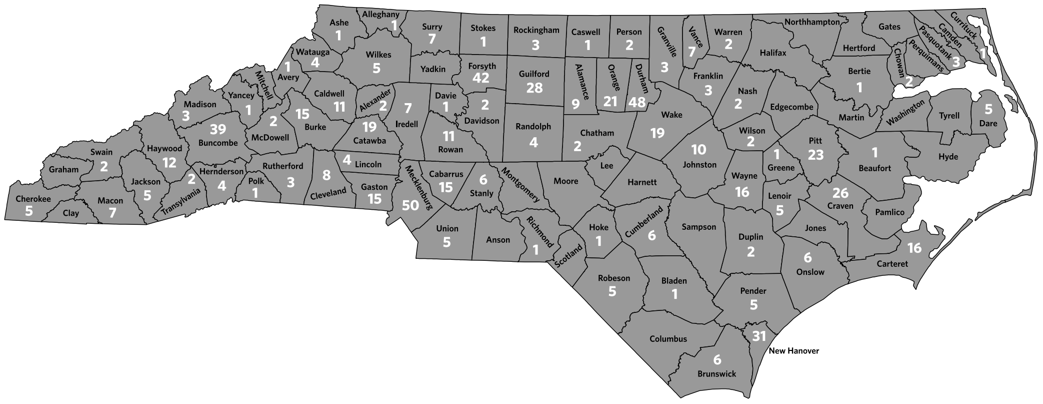
If money is spent to support people in finding and keeping jobs, everyone wins. People who were once consumers of government subsidies achieve taxpaying status. Trained individuals who have experienced mental illness are paired with people who have recently been hospitalized or have spent time in jail or prison, and help them transition back to wellness. No one can offer credible, relevant assistance as well as someone who has been through the same thing.

The freedom to adjust rates is one of the tools available to MCOs. Instead of paying providers based solely on the number of visits, the MCO can reward those providers who achieve the best outcomes by paying them at a higher rate. MCOs should also contract only with those providers who do a good job of keeping people at home (out of the hospital and out of jail) and helping them find jobs, decent housing, and meaningful relationships. This is a win-win-win approach for those living with an illness (who get to live as they wish, rather than being confined), for the MCO (which saves money by avoiding unnecessary hospitalizations), and for the providers (who get paid at a rate commensurate with their performance).

The MCOs can also examine local conditions to see what needs to be changed. Trying to find out why the same people cycle in and out of hospitals or jails would be a great place to start; then the MCO could try to design a system that would break those cycles. Changes that might help accomplish that include providing housing supports and case management services in addition to ongoing medication and therapy. Sometimes people land in a hospital bed because they couldn't afford to refill a prescription.

Provider monitoring. North Carolina's mental health care system needs to take definite steps to ensure that providers are offering recovery-focused treatment. Provider monitoring should include some examination of whether recovery principles are being adhered to; tools such as the Recovery Oriented Systems Indicators Measure (ROSI),

FIGURE 1.
Number of Certified Peer Support Specialists Residing in Each North Carolina County



Note. As of April 23, 2012, there were 649 certified peer support specialists residing in North Carolina as shown here. These numbers are updated weekly.

which includes both a consumer self-report survey and an administrative-data profile, can be useful in this regard. Feedback from people living with mental illness and their family members can be a useful measure of the success of providers in establishing a recovery organization. Here are some questions monitors may want to ask: Does the provider organization include people with mental illnesses or their family members on its board of directors or its staff? Are paid peers among those providing services? Do staff and board members understand and accept recovery principles? Do treatment plans reflect a consumer-driven process? Are all printed materials and policies aligned with recovery principles? Are the recipients of services interviewed about whether their treatment has been based on the 10 principles of recovery? Both the funder (the state) and the provider organizations themselves should be interested in knowing the answers to these questions. A focus on recovery must be reflected throughout the agency—in its policies, the composition of its board, and the way its staff members interact with consumers. The ultimate measure is how well the person receiving services has been supported in finding his or her own path toward wellness.

Progress in North Carolina

North Carolina is definitely making progress in orienting its mental health care system toward recovery. NAMI North Carolina offers free to family members and those living with mental illness a number of psychoeducation programs and support groups—including Connection, a NAMI support group run by people who are themselves living with mental illnesses. The peer-to-peer psychoeducation program helps people develop a crisis plan that serves them well; the crisis plan can include the development of their own advance directive, in addition to other general recovery strategies. We are beginning to see more paid peer support specialists throughout the North Carolina system. It is encouraging that a peer support specialist was recently hired at Cherry Hospital; now the other state hospitals need to follow suit. There are a number of wellness centers and recovery centers in the state that offer psychoeducation and other educational programs. There is talk of including recovery language in the statutes defining mental health services in North Carolina. A legislative study commission is considering a requirement that local MCO boards contain consumers of behavioral health care and their family members. And under the managed care Medicaid waiver, MCOs can offer a Medicaid-reimbursed individual peer-support service.

The North Carolina Division of Mental Health, Developmental Disabilities, and Substance Abuse Services contracted with the Behavioral Healthcare Resource Program at University of North Carolina at Chapel Hill to manage the North Carolina Certified Peer Support Specialist program. From February 2007 through February 2012, a total of 649 individuals were certified, roughly 47% of whom were living in recovery from a mental illness; another 38% were living in recovery from a substance abuse disorder, and 15% were living in recovery from both a mental illness and a substance abuse disorder. These peer-support specialists have widely varying educational backgrounds. Half (50%) have a high school diploma, 7.3% have a GED, and 2.9% are not high school graduates. The remaining peer-support specialists have education beyond high school. Specifically, 5.6% have an associate's degree, 4.1% have some college, 22.5% have a bachelor's degree, 5.5% have a master's degree, and 1.7% have a doctoral degree. Only 55.6% of the total number of peer-support specialists are employed, so there are many certified individuals who could be hired by providers to further the use of recovery techniques in their agencies. Figure 1 shows how many trained peer support specialists live in each county in the state [4].

Meeting the goal of orienting North Carolina's mental health care system toward recovery will take time; it is a lengthy process, not to be achieved by a certain date. But we must work toward that goal by holding the Division of

Mental Health, the MCOs, and providers accountable for reshaping the system to adhere to the 10 principles of recovery. And perhaps the most important task of all is to involve those with illnesses in directing their own recovery. NCMJ

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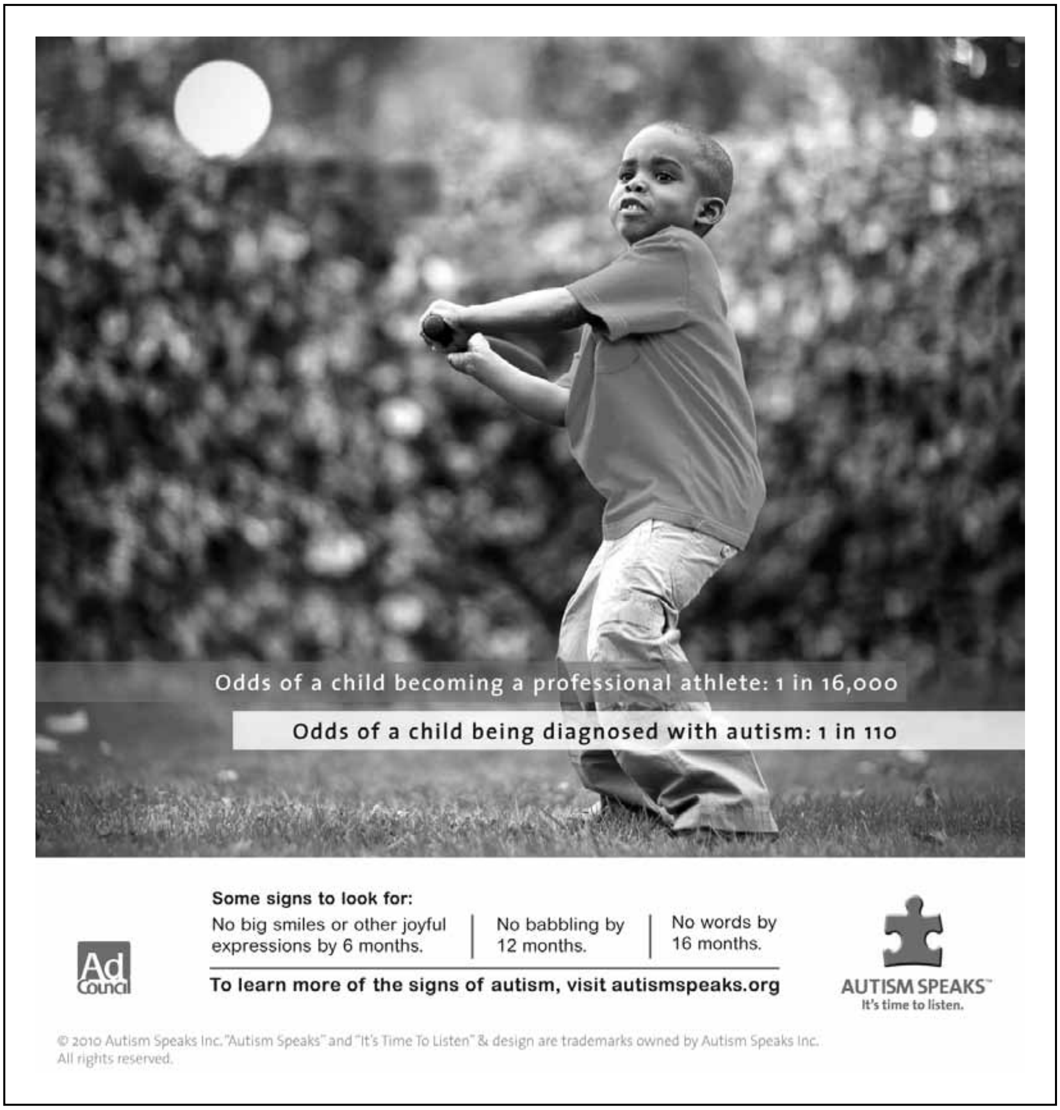

Some signs to look for:

No big smiles or other joyful expressions by 6 months. | No babbling by 12 months. | No words by 16 months.

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INVITED COMMENTARY

The "Crisis" Crisis:
Emergency Department Use and Community Resources in North Carolina's Behavioral Health Crisis System

Mike Vicario

An unprecedented number of North Carolinians are coming to hospital emergency departments with behavioral health needs. There are significant delays after emergency treatment as the patient awaits placement in an inpatient facility often requirig the patient to be "boarded" in the hospital. Any viable solution to this "crisis" crisis will require significant community collaboration.

A recent report from the North Carolina Division of Mental Health, Developmental Disabilities, and Substance Abuse Services "From Crisis to Recovery: Strategic Planning for Response, Resilience and Recovery," contains recommendations to address the unnecessary use of emergency departments (EDs) in acute care hospitals to house behavioral health patients for whom treatment in a community setting cannot be found [1]. It is a problem that North Carolina's hospitals are all too familiar with.

North Carolina's Mental Health Reform Bill of 2001 [2] was based on the US Supreme Court's Olmstead decision of 1999 [3], which held that behavioral health patients are best served in their communities, close to their families, friends and support system. The reform bill proposed increased provider choice for at least some of these patients, through a privatized system of care overseen by Local Management Entities (LMEs). The reform effort touted caring for behavioral health patients in their communities as a cost-saving proposition. Savings would be attained by reducing the number of state hospital beds. However, the reform failed.

Between 1992 and 2011, 1,879 beds closed at the four state-operated psychiatric facilities [4, 5]. The reform bill established a statewide Mental Health Trust Fund to finance the transition of mental health services from institutions to community providers. However, as the result of the shortfall in the 2001-2002 state budget, most of the money in the fund was diverted to other purposes and was unavailable to develop the community system of care [6]; thus insufficient resources were available to develop the community system of care. The provision of unproven, and sometimes fraudulently billed, community support services followed, at a cost to North Carolina taxpayers of more than $400 million [6].

LMEs were directed to submit detailed reports outlining plans to develop and bolster crisis-specific services [7]. Unfortunately, in many areas, a key element of the plan adopted was that the person in crisis should call 911 or go the ED. Consistently available services for those in mental health or substance abuse crisis and recovery never evolved. Instead, multiple providers offer limited bundles of outpatient services. It remains unclear who is accountable to ensure access to a continuum of behavioral health services to residents that present to the ED in a mental health crisis situation.

Prior to passage of the 2001 reform bill, area mental health programs provided clinical care and other community services to most communities from a few familiar locations. Although the bill's call for a privatized system may have expanded the overall number of private providers, because the services made available were fragmented in nature, access did not improve for those in greatest need or for uninsured populations. Services such as community support were not shown to be effective in treating those with severe mental illnesses. For many high-need consumers, the safety net disintegrated. North Carolina's sustained population increases, along with job losses, state budget cuts, changes in leadership, and program cuts further stressed the behavioral health system. When in crisis, more patients turned to the hospital ED, a site without the staff and resources to provide the care they need. From 2008 to 2011, the number of patient visits to EDs with a primary diagnosis of a mental health or substance abuse problem increased by more than 38% [8, 9], compared with a 6% increase in the total number of ED visits (M.V., unpublished data).

State hospitals are full, community inpatient beds are scarce, and federal "antidumping" laws ban the transfer of patients from EDs to nonhospital settings, even if those settings are designated by the state for behavioral health care. Of the 116 medical-surgical hospitals serving North Carolina, 42 operate inpatient behavioral health units that provide

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acute care for psychiatric or substance abuse patients. One also operates an ED that is open 24 hours a day and that is designated for behavioral health patients [10]. Most hospitals with behavioral health units lack the staff to provide psychiatric coverage for the ED 24 hours a day. A few of the 72 hospitals that lack inpatient behavioral health units have psychiatrists or clinical specialists to treat psychiatric illnesses, but the rest can only treat any immediate medical conditions and provide a safe boarding area until a bed in a behavioral health facility opens. Last year, patients with behavioral health needs waited, on average, for nearly 10 hours in the ED [11]. It is not uncommon for any hospital, large or small, to have been forced to board a patient for a week or more. Through personal communication with hospital administrators, some hospitals that have high numbers of boarded patients noted that additional behavioral health patients are also being cared for in medical-surgical units, intensive care units, and observation areas. One hospital with a full inpatient psychiatric unit recently estimated that at least as many behavioral health patients were housed in emergency and acute care areas of their facility as were admitted to their psychiatric unit.

Behavioral patients boarded in EDs suffer from treatment delays that can result in dangerous conditions for both patients and staff members, as well as for any other patients who might have to be diverted from the ED because of overcrowded conditions. Assaults by patients on other patients and on hospital staff are becoming more common. In response to this increased danger, hospitals have spent millions of dollars on measures to increase security and have brought sworn police officers into their facilities.

Some hospitals have addressed this crisis by creating behavioral units within the ED. Forsyth Memorial Hospital in Winston-Salem has a locked unit within its ED that has private rooms and a dedicated behavioral staff; it offers pharmacy services, evaluation, and therapy. The unit in the ED works in conjunction with the inpatient unit to reduce the average census in the ED and the number of hours that patients needing behavioral health care spend in the ED. Another smaller hospital without a psychiatric service depends on a psychiatrist from an LME-contracted provider to conduct regular assessments in its ED. The psychiatric consultation includes assessment and treatment of ED patients with behavioral problems, and it can help the hospital physician reach a decision to discharge the patient when appropriate outpatient and support services are available. ED length of stay continues to be a problem at both of these hospitals. Part of their strategy to improve conditions is to collaborate with the LME and contractors. A promising telepsychiatry pilot program in the EDs of Vidant Health hospitals in several communities—a program created by the Albemarle Hospital Foundation and funded by a grant from The Duke Endowment—is enabling psychiatrists to remotely assess patients in the ED and to work with emergency physicians to treat and discharge those patients whose needs can be appropriately met by available and suitable outpatient alternatives. This is discussed more fully by Davies in the Philanthropy Profile in this issue of the NCMJ [12]. Mobile crisis management teams may be accomplishing similar results for a limited number of patients in some areas.

If the vision of successful treatment in less restrictive, community-based settings is to be realized, agencies, organizations, and facilities that provide behavioral health care must have adequate resources for, and accountability for, the provision of all services needed to prevent inappropriate ED utilization and, ultimately, hospitalization. Access to services ranging from basic transportation and housing to care coordination and timely physician visits must be improved. All components of the behavioral health care system must both communicate and collaborate. The array of crisis services available should be based on the recognition that a behavioral health visit to the ED is a sign of that system's failure.

Providing patients with community services that can help them avoid the ED must be a primary focus of North Carolina's 11 LMEs as they convert to LME managed care organizations (LME/MCOs) during 2012. They will be taking on the new role of at-risk payer for the behavioral care of Medicaid enrollees, while retaining the responsibility of managing community programming for all patients with behavioral health needs in their catchment areas. The LME/MCOs need to develop arrangements for service alternatives that are accessible to all consumers, such as walk-in and facility-based crisis centers; they then need to work closely with hospitals, community providers, law enforcement and other entities to strengthen and promote these alternatives to inappropriate ED visits. Several LME/MCOs have begun to track ED wait times and other data required to measure progress as they undertake this process.

For patients with severe and/or persistent behavioral health needs, inpatient care may be the only reasonable option. A combination of short-term beds in community hospitals and longer-term beds in the state hospital system provides the best opportunity for effective, local treatment. In 2008, funding was appropriated for additional capacity in community hospital psychiatric units; the funding was increased a year later, and there are now a total of 121 funded beds [13]. Referred to as "3-way contract beds" because of the agreements the hospital has with its LME and with the Division of Mental Health, Developmental Disabilities, and Substance Abuse Services, these beds are located in communities across the state, and funding for the services can be "relocated" to meet the changing needs of communities. Not all units can provide services for those patients whose need for behavioral care is most acute, however. A workgroup sponsored by the North Carolina Department of Health and Human Services is evaluating how existing beds may be better utilized to meet the needs of patients boarded in EDs. Hospitals, in conjunction with the Division of Mental Health, Developmental Disabilities, and Substance Abuse Services and the Division of State-Operated Healthcare Facilities, will need to continue to look closely at patient needs as they try to achieve the right mix of long-term and acute inpatient care in North Carolina.

Ultimately, however, the problem of ED overutilization will not be successfully solved by randomly adding services or beds. Any viable solution will require thoughtful and strategic planning of service provision in a community-based system to supplant or supplement inpatient hospitalization for crisis and emergency care. Carefully evaluating the LME/MCOs' progress in addressing this issue and holding them accountable for their performance are critical aspects of any resolution of this crisis. The North Carolina Hospital Association and its member hospitals are committed to reducing the unnecessary use of EDs by patients needing behavioral health care and will continue to collaborate with community stakeholders to improve access to crisis and recovery services in community settings, empowering patients to quickly receive the specialized care they need in the least restrictive setting. NCMJ

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Acknowledgment

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North Carolina's Institutional Bias:
Enforcing the ADA's Integration Mandate

Vicki Smith

Last year, the US Department of Justice determined that the state of North Carolina was violating the Americans with Disabilities Act by inappropriately institutionalizing people in adult care homes rather than providing them with housing and appropriate supports in the community. The state's long-standing institutional bias must now be corrected.

Decline in Mental Health Services for North Carolina Adults

In 2001, North Carolina undertook a massive effort to reform mental health care. Steps taken included the privatization of many mental health services and the creation of regional management entities which replaced local county mental health agencies. The result was North Carolina's State Plan 2001: A Blueprint for Change, which emphasized the need to provide meaningful integrated services in accessible community settings for adults with severe and persistent mental illness.

The promise of a robust system of community-based services for people with mental illness has gone unfulfilled. Many of the new Medicaid services that were developed and designed to help build infrastructure for individuals requiring services in the community have been eliminated or have been limited by redefinition. For example, the previous definition of personal care services (PCS) allowed reimbursement for an aide to run errands such as transporting an individual to a medical appointment. Errands are no longer a reimbursable activity. And the state has failed to devote significant resources to the development of a system in which integrated housing would be readily available for people with mental illness.

More than 20 years after the passage of the Americans with Disabilities Act of 2001 (ADA), and more than 10 years after the US Supreme Court's decision in Olmstead v. L.C. (which found that the unjustified institutionalization of people with mental illness or intellectual disabilities violates the Americans with Disabilities Act) [1], the state of North Carolina continues to rely on institutional placements for the long-term care of many adults with disabilities, including those with severe and persistent mental illness.

Institutions versus Community Settings

There are stark differences between living in an institution and living in a more integrated setting in the community. In an institution, schedules are determined by staffing needs. Institutional residents typically eat meals at the same time every day. They have limited choice. Their freedom of movement is restricted. Decisions are frequently made on their behalf—decisions about what they eat, how much food they are allotted, with whom they spend their time, what activities they engage in, and the like. Their roommates are assigned. Their personal relationships often are restricted or controlled. They have little privacy. Institutions establish rules to suit the majority and not the individual. Staff members make decisions based on what they believe is best for the majority of residents, given the resources available.

In more integrated settings, schedules are driven by the needs and preferences of the individual resident. Individuals develop independent living skills. They learn how to shop and cook and decide what, when, and where to eat. They set their own schedules. They can choose whom they live with and control their personal space. They have much more control over their own lives. An integrated setting does not separate people from community life but includes them in it.

The state of North Carolina classifies adult care homes (ACHs) and other large group homes as "community settings." In practice, however, these facilities are institutions with a high bed capacity whose residents lack individual autonomy and are isolated from the general community.

Three Aspects of North Carolina's Institutional Bias

Today, North Carolina faces three distinct challenges relating to how it provides services to citizens with mental illness. First, the state is in immediate jeopardy of losing Medicaid payments for ACHs that are deemed to be Institutions for Mental Disease (IMD). Second, the state's system for providing personal care services (PCS) and in-home support to eligible Medicaid recipients has not yet been approved by the federal Centers for Medicare and Medicaid Services (CMS). Finally, in response to a com-

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plaint filed by Disability Rights North Carolina (the state's Protection and Advocacy system, established by federal law to protect people with disabilities from abuse and neglect) [2], the US Department of Justice (DOJ) has issued a Letter of Finding concluding that the state is violating the ADA by inappropriately housing people with mental illness in ACHs.

Institutions for Mental Disease

A simplified definition of an IMD is any facility with more than 16 beds, 50% or more of whose residents have been placed there because of their mental illness. Residents of IMDs are not eligible for Medicaid. ACHs are licensed assisted-living facilities that, at a minimum, provide one meal a day, housekeeping services, and personal services to at least 7 residents; many house a much larger number of residents. North Carolina state law forbids admitting residents to an ACH for the "treatment of mental illnesses."

The federal regulation prohibiting Medicaid funding for those living in IMDs has been part of the Medicaid system since 1978. North Carolina's use of large ACHs to house people with mental illness violates this regulation, and the CMS is unwilling to ignore this violation any longer. The state, at the direction of the CMS, has identified at least 25 ACHs as potential IMDs. If they are found to be IMDs, that would render all of their residents ineligible for Medicaid. These ACHs have been operating on Medicaid dollars for years; without Medicaid funding, they will be forced to close their doors, with little time for residents to find alternative living arrangements.

Personal Care Support Services

The CMS started asking questions about the handling of personal care support services in North Carolina almost 2 years ago, when the state asked permission to make it harder for individuals living in their own home to get Medicaid reimbursement for PCS. According to the North Carolina Medicaid State Plan, such services are intended to provide person-to-person hands-on assistance with the common activities of daily living (ADLs), such as eating, dressing, bathing, toileting, and mobility. Under the state's proposal, an individual living at home would receive Medicaid reimbursement for PCS only if they needed help with at least 2 ADLs. The state proposed this change as a way to save money and balance the state budget.

The eligibility criteria for receiving PCS in an ACH or other group home are far less stringent than the criteria for receiving them at home. This means that, on average, an individual in an ACH receives more of these services, at a higher cost to the state, than does an individual living in the community who has the same needs. An individual in an ACH can be authorized through a nonspecific assessment by an ACH employee to receive PCS using eligibility criteria as basic as a combination of needing assistance with medication administration and general ongoing supervision.

Although personal care services are not specifically services for individuals with mental illness, many such individuals need these services, because their mental illness affects their ability to independently conduct the activities of daily living. By reducing the availability of community PCS, the state is creating a bias in favor of ACH placement. The state's elimination of various community support services and its encouragement of the use of ACHs violate the important principles affirmed in the Olmstead decision. A person no longer considered eligible to receive PCS in the community could walk in the door of an ACH and qualify to be a resident and receive personal care services there. An individual could thus be forced into an institutional setting because of his or her personal care needs, even if he or she did not need the supervision and other restrictive aspects of an ACH. By severely limiting the availability of community PCS, the state is unnecessarily putting thousands of North Carolinians at risk of institutionalization at a huge cost to the state. Providing in-home PCS will keep these individuals in the community and will cost less than serving those individuals in ACHs [5].

After months of negotiation, the CMS gave approval for a short-term service called In-Home Care for Adults (IHCA) to be effective from June 1, 2011 to February 29, 2012. This service was offered while North Carolina developed a new application for Home- and Community-Based Services called the 1915(i) option for Medicaid [3]. The CMS has warned that the disparities in the service definitions for IHCA and ACH PCS leave the state vulnerable to the claim that it is violating the ADA. Nevertheless, the state has chosen to proceed with the IHCA definition, which is currently being challenged in federal court, as well as with its application for the 1915(i) option. In late April 2012, the state submitted it final version of the 1915(i) option to the CMS and is current working with the CMS to finalize the option and plans for implementation.

DOJ Findings

In a complaint filed in 2010 with the DOJ, Disability Rights North Carolina asked the DOJ to investigate whether North Carolina's reliance on placement in institutions such as ACHs constitutes a violation of the ADA under the principles referred to as the Integration Mandate, articulated in the Olmstead decision. At the time the DOJ complaint was filed, a total of 26,040 North Carolina residents lived in ACHs, 24.7% of whom had a mental illness [4]. By early January 2011, the number of people living in ACHs had grown to more than 28,000 [5]. Some ACHs exclusively serve elderly adults, adults with mental illness, or adults with Alzheimer's disease or other memory disorders; other ACHs serve a combination of these populations.

In its July 28, 2011, Letter of Finding, the DOJ determined that North Carolina "fails to provide services to individuals with mental illness in the most integrated setting appropriate to their needs in violation of the ADA. The State plans, structures, and administers its mental health service system to deliver services to thousands of persons with mental illness in large, segregated adult care homes, and to allocate funding to service individuals in adult care homes rather than in integrated settings"[6]. The state and the DOJ now are negotiating to develop a plan for addressing the needs of people with mental illness that complies with the ADA. In a similar case, the DOJ entered into a comprehensive settlement agreement in October 2010 to transform the state of Georgia's mental health and developmental disability system. Negotiations with the Commonwealth of Virginia on the same issue are ongoing.

Going Forward

As the state proceeds with addressing each piece of this conundrum, we must acknowledge that each of the 3 challenges is part of a larger evolution toward community-integrated services and housing for all people with disabilities. Although CMS regulations, US Supreme Court opinions, and legislative actions set the rules by which such integration will be accomplished, the driving force must be respect for the inherent dignity and value of the people involved. NCMJ

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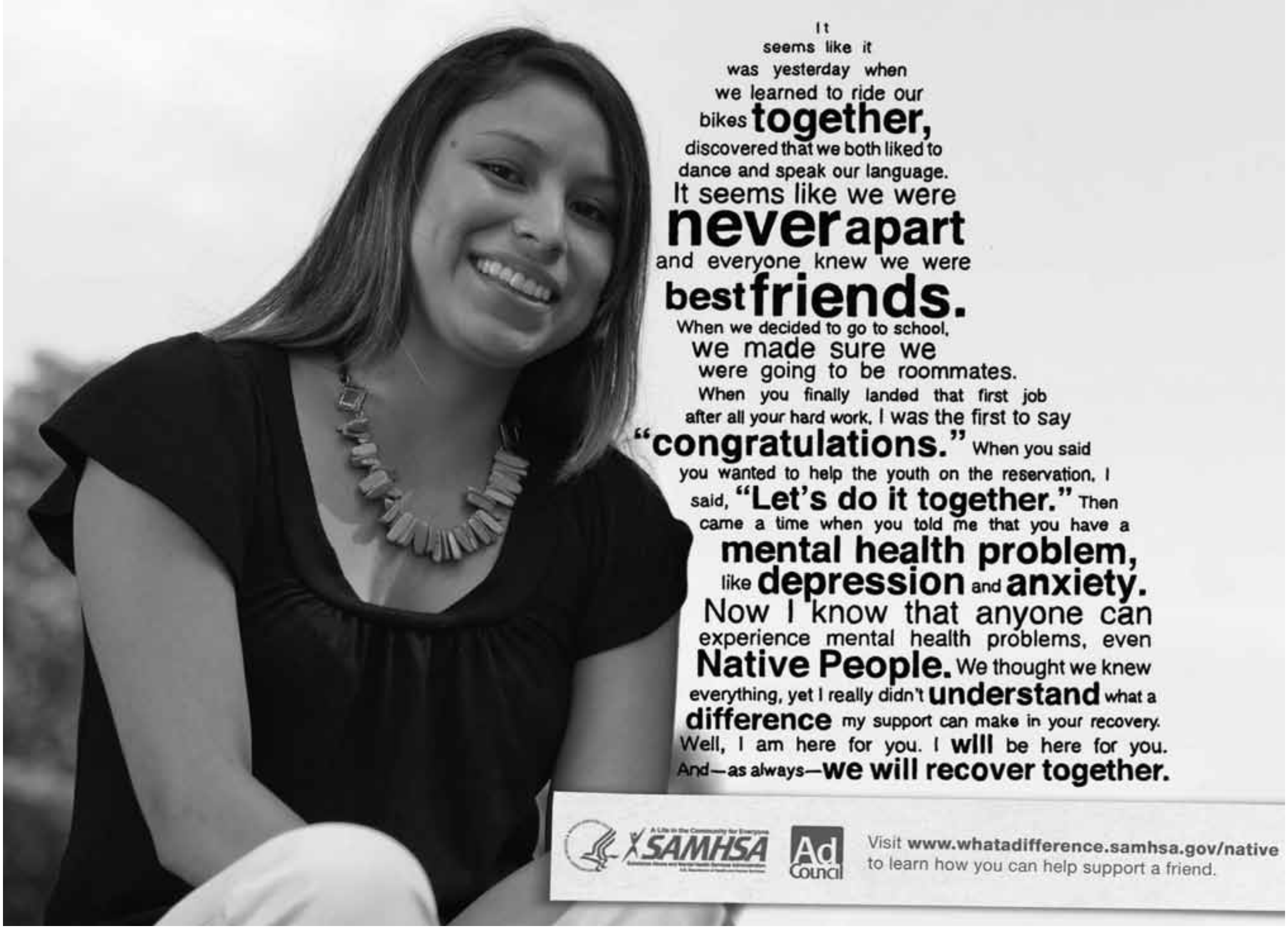

INVITED COMMENTARY

Meeting the Challenges of Community-Based Care

Beth Melcher, Michael Watson

North Carolina is responding to multiple and interrelated challenges associated with the housing and support services for individuals with mental health needs, particularly those currently living in Adult Care Homes. Addressing the concerns raised by federal agencies provides an opportunity to reshape community mental health services.

North Carolina is currently confronted with multiple challenges related to the provision of housing and support services for vulnerable individuals across the state especially in adult care homes (ACHs). These challenges have grown out of an array of policy and funding decisions made over the past 2 decades, as well as the lack of affordable housing for individuals with disabilities in North Carolina. Recently, the US Department of Justice's Civil Rights Division (USDOJ) and the Centers for Medicare and Medicaid Services (CMS), have raised issues regarding institutional bias and the ability of individuals with disabilities to receive equal housing supports in the community. The concerns expressed by the USDOJ and CMS have to do with a complex set of interrelated issues that affect ACHs and their residents. Addressing these issues will require a comprehensive effort over the next few years and will necessitate changes in policy, funding mechanisms, and philosophy.

On July 11, 2011, the USDOJ sent North Carolina Attorney General Roy Cooper a findings letter [1] outlining concerns about the state's compliance with the Title II of the Americans with Disabilities Act of 1990 (ADA) [2] as interpreted by the US Supreme Court's Olmstead decision [3]. The letter focuses on the needs of the large number of adults with mental illness who currently reside in ACHs. The USDOJ contends that large ACHs do not meet the ADA requirement that people receive community-based care in the least restrictive setting possible. In the findings letter, the USDOJ also alleges that North Carolina's State-County Special Assistance for Adults program creates a financial incentive for individuals to reside in ACHs rather than remaining in their own homes.

One of CMS's concerns is that some of the ACHs in North Carolina, based on their size and concentration of mentally ill residents, may well be classifiable under federal rules as institutions for mental disease (IMDs). CMS does not allow the use of Medicaid funding for individuals living in an IMD. Another of CMS's concerns is that in North Carolina, eligibility requirements for personal care services (PCS) make it easier to qualify for such services if you live in an ACH than if you reside in your own home. In addition, CMS has issued new guidelines requiring that individuals receiving home and community-based services must live in residences having characteristics that reflect the home- and community-based living standards that HCBS funds were designed to support. Some ACHs in North Carolina today may have difficulty meeting these home and community-based living standards without making changes to their facilities and their operating models.

The Americans with Disabilities Act

The ADA prohibits public entities from discriminating against individuals with disabilities by excluding them from participation in, or denying them the benefits of, services. The federal government has issued regulations implementing the ADA that require public entities to administer services in the most integrated setting—that is, the setting in which individuals with disabilities interact with individuals without disabilities to the "fullest extent possible."

In 1999, the US Supreme Court found in the Olmstead case that the state of Georgia had not allowed 2 women to move from an institution and live in the community even though medical professionals had determined that these women could live safely in the community. In deciding the case, the court held that under the ADA, public entities must provide community-based services to persons with disabilities when those services are appropriate, are unopposed by the person with a disability, and can be reasonably accommodated.

USDOJ Findings Letter

In its findings letter, the USDOJ alleges that ACH residents with mental illness could be served in more integrated settings in the community, and that state policies

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and actions have led to people with mental illness being "confined . . . indefinitely and unnecessarily in adult care homes" [1]. The USDOJ also alleges that the reliance on unnecessary institutional settings violates the civil rights of people with disabilities. North Carolina and the USDOJ are currently involved in a negotiation process that seeks to create a settlement agreement to address these issues. These discussions have been taking place since the fall of 2011 and have involved the North Carolina Attorney General's Office and representatives from the North Carolina Department of Health and Human Services. It should be noted that over the past several years, the USDOJ has reached settlement agreements with a number of other states regarding similar ADA/Olmstead allegations. Those settlement agreements have focused on the development and implementation of effective measures to prevent inappropriate institutionalization and to provide adequate and appropriate public services and supports in the most clinically appropriate integrated setting to meet the needs of persons in a defined target population (eg, adults with mental illness currently residing in ACHs).

Based on previous USDOJ settlement agreements in other states, it is anticipated that a potential settlement will include the following measures: identifying a specific target population; implementing a process for screening entrants to large facilities and congregate living settings, and ensuring that those entrants have other smaller community options for residential placements; requiring a multiyear response and commitment for system change and additional state funding; expanding community services (including crisis services, supported employment, and community-based supported housing alternatives) to support individuals living in the community; providing extensive education, "in-reach," and treatment planning to actively encourage long-time residents to move to smaller community living situations and out of larger congregate settings; implementing extensive quality management and monitoring programs; and federal oversight of the state's compliance with the settlement agreement.

Regardless of whether a settlement is reached, North Carolina is taking steps to address potential concerns about ADA and Olmstead issues by working proactively on initiatives for all individuals living in institutions. Those steps include actively identifying existing resources—such as Medicaid, block grant, housing and Money Follows the Person funding—whose use could be expanded to support individuals with disabilities living in integrated community settings; updating the state's Olmstead plan; committing savings achieved through the implementation of the 1915(b)/(c) Medicaid waiver to provide additional home- and community-based slots in the Community Alternatives Program waivers for individuals with intellectual or developmental disabilities; developing integrated settings (such as targeted and pre-financed housing units) for individuals with disabilities; and creating financial incentives under the 1915(b)/(c) waiver for local management entities to provide services for individuals in community settings rather than in institutions.

Special Assistance. North Carolina spends $144 million in State-County Special Assistance funding each year; $118 million of this is for people living in ACHs, nearly $16 million is for those living in a Special Care Unit within an ACH, and $10 million supports the Special Assistance In-Home Program. Both the USDOJ (in its findings letter) and CMS have raised concerns that the State-County Special Assistance for Adults program (which provides cash supplements for low-income individuals living in ACHs) creates an incentive for individuals to reside in an ACH or other congregate setting rather than in their own home. Special assistance funding is mandatory for individuals in ACHs; however, the in-home program is optional, and 9 counties do not offer in-home assistance. The level of funding support for an individual in the in-home program is also lower than that for an individual residing in an ACH. Changes to address these disparities will require a statutory change by the North Carolina General Assembly.

Adult Care Homes as Institutions for Mental Disease

An institution for mental disease (IMD) can be defined as any facility with more than 16 beds, where at least 50% of residents have a mental illness, and where the facility has attributes that indicate it is a psychiatric facility. North Carolina has 436 ACHs that have more than 16 beds. Those homes have a total of more than 27,000 licensed beds, but fewer than 14,000 of those beds are occupied by residents who receive Medicaid. According to data from the NC Division of Medical Assistance (DMA), approximately 3,350 of those residents receiving Medicaid are individuals with mental illness diagnoses (DMA, unpublished data). This number does not include individuals with developmental disabilities. CMS believes that some ACHs may have so many residents with mental health diagnoses that their federal status should be changed to IMD. CMS generally does not pay for disabled adults living in IMDs, and those institutions that are determined to be an IMD lose federal funding for all residents in that facility. CMS is requiring North Carolina to conduct facility reviews and determine whether ACHs with more than 16 beds are IMDs. This IMD determination process requires the state to take into account the overall attributes of the facility itself as well as whether more than 50 percent of the residents have a mental disease other than dementia or Alzheimer's.

Based on a North Carolina Department of Health and Human Services' initial analysis of ACHs, 25 facilities and more than 700 residents are being assessed. The state has agreed to complete initial reviews no later than June 30, 2012. All ACHs will be reviewed for IMD status by September 1, 2012. Individuals in ACHs that are determined to be IMDs may be transitioned to alternative housing options if they choose to move to a non-IMD setting. The ACH also may make the necessary changes to no longer be identified as

Preparing to Come Home:

Recommendations for Transition Planning from North Carolina's Money Follows the Person Demonstration Project

Trish Farnham

When Christina moved back home to live with her family after years of residing in an institution, her mother noted, "She's so much happier now." When Ronald transitioned back into his community after years in a state hospital, he soon became a regular at his local Starbucks. After Jabreel moved out of an institution and into an apartment with a support companion, his mother observed, "My son now has a warm, broad network of people in his life."

These life-changing experiences were facilitated by the state, regional and local partners of North Carolina's Money Follows the Person (MFP) Demonstration Project. The federal MFP program has since its inception in 2005 become an increasingly robust vehicle that North Carolina and other states have used to strengthen and expand their home- and community-based service structure. It is used to help Medicaid recipients transition from institutions back to the community. In North Carolina, MFP participants have priority access to certain community-based support services; currently, all of them qualify for one of the Community Alternatives Programs or the Program of All-Inclusive Care for the Elderly [1]. They also have access to additional resources, such as "start-up funds" and transition coordination services.

MFP assistance is available only to individuals who meet the project's federal criteria; to qualify, an individual must be Medicaid-eligible and have resided for at least 90 days in a skilled nursing facility, an intermediate care facility for individuals with intellectual or developmental disabilities, an acute care hospital, or a psychiatric facility (if they are under the age of 21 or over the age of 65) [2, 3]. However, the practices that have been developed and adopted by the project can be used in transition efforts of all kinds. Many of these practices are based on experience gained in earlier transition efforts (such as North Carolina's Nursing Home Transition Grant) and were recommended in reports from the North Carolina Institute of Medicine [4], Mathematica Policy Research [5], and other organizations [6, 7]. These practices are grounded in basic, common-sense principles that serve as the foundation of every quality transition experience: person-centered transition planning, establishment of a clear locus of responsibility, continuity of care, and clear communication among transition team members.

Insights gained during the implementation of North Carolina's MFP Demonstration Project can help shape the state's transition practices as the state renews its commitment to provide community-based services to persons with disabilities (as required by the US Supreme Court's Olmstead decision [8]) and works to strengthen its home and community service options for individuals in adult care homes.

Recommendations Based on Lessons Learned From MFP

Learning from its own experience and the experience of other transition initiatives, the North Carolina MFP project has come up with 11 suggestions for those supporting individuals to transition from an institution to home- and community-based supports. (1) Keep the person who is transitioning at the center of the transition effort by supporting his or her active participation in the planning process and empowering him or her to assume responsibility for completing transition-related tasks whenever possible. (2) Have a clearly designated, well-trained transition coordinator who enjoys supporting people as they return to their communities and has a strong understanding of both the formal services and the informal resources available. (3) Have a clear, documented transition plan that addresses the person's community-based needs; it should not only plan for the "essentials" (housing, medical care, and attendant care) but also explore employment, transportation, and financial management options, consider the needs of family caregivers, and build a community net-

an IMD. Federal Medicaid funding for a facility will cease the day it is determined to be an IMD. A transition plan and process are in place to help individuals identify alternative living arrangements and to support their transition to a new setting.

Personal Care Services

CMS alleges that North Carolina's eligibility criteria and payment rates for Personal Care Services (PCS) are not "comparable" between ACH and in-home settings. A combined total of approximately 45,000 individuals receive such services at an annual cost to the state's Medicaid Program of more than $400 million (DMA, unpublished data). North Carolina has worked with CMS to develop a 1915(i) Medicaid state plan option that will address these comparability concerns and try to meet the demands for PCS across both settings while meeting state budget expectations. The state's agreement with CMS and its plan of correction allow the current PCS program to operate through the end of December 2012. Effective January 1, 2013, a new PCS program operating under the 1915(i) authority will be in place. This new PCS program will address the "comparability" issues by basing PCS eligibility on a set of target population criteria and by requiring work. (4) Set up agreements and schedules that ensure ongoing conversation among transition team members and make it clear who is doing what. (5) Because strong collaboration between those providing medical and social supports is essential for individuals with complex support needs, make sure the person in transition is enrolled in Community Care of North Carolina (CCNC) and signed up for behavioral health services (if those are needed) before discharge. (6) Engage peer support wherever possible. Recently transitioned individuals say that access to peers—individuals who have also transitioned—is useful while they are adjusting to being back in a community setting. The peer support model has been demonstrated to be particularly effective with individuals experiencing severe and persistent mental illness [9]. (7) Finding affordable accessible housing is often the biggest barrier to transition. In addition to applying for subsidized housing, members of the team should explore other services and supports (such as shared living arrangements, adult foster care arrangements, and telesupport options if appropriate) that may help meet the transitioning person's housing needs. (8) Give people in the community who will be assisting the person after transition—attendant care staff, therapists, and other clinicians—an opportunity to get to know the individual before the transition happens. To better ensure continuity of care, staff training and consultation should take place before the transition occurs. (9) Procure start-up funding before the transition takes place. Start-up funds are often used to pay rent deposits or to meet other household needs, but consider using them to fund additional pre-transition training and consultation. (10) Have transition coordinators follow an individual's progress for several months after transition occurs. Individuals often experience unforeseen challenges immediately after the transition is made. (11) Do not rush. North Carolina's MFP program has made its biggest mistakes when it allowed the sense of urgency that is inevitable in any transition endeavor to eclipse the principles and practices outlined here.

Although each transition will have its unique elements and individual dynamic, these practices and principles form a strong, unifying foundation that ensures successful, effective transitions for people wishing to return to their homes and rejoin their communities. NCMJ

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ACHs to meet the standards for home- and community-based care. An independent assessment will be required to receive PCS under the 1915(i) state plan option.

Standards for Home- and Community-Based Services

CMS has issued a proposed rule requiring that individuals receiving funding for home and community-based services (HCBS) live in residences that have an environment that is not institutional in nature [4]. The proposed rule specifies that PCS funding can only be used in residential settings that reflect the requirements contained in HCBS. North Carolina has worked with CMS to develop an understanding of HCBS that will meet the new requirements, which include the expectation that facilities be integrated into the community and the expectation that residents be allowed the same freedom to exercise personal choice that is typical of home settings. For instance, residents must be allowed to choose treatment providers, roommates, and room decorations, and to decide when and where to go on community outings, when to eat and sleep, and when to receive visitors and engage with others.

In order to continue to receive Medicaid funding, ACHs will need to attest that they meet HCBS characteristics by

June 30, 2012. The state will monitor ACH compliance with these CMS standards.

Conclusion

North Carolina is committed to supporting individuals with disabilities in the most integrated, community-based setting of the individual's choice. Transitioning our current system of housing and supports to meet that commitment and to satisfy the requirements of our federal partners is a complex and challenging process. Our success must be founded on partnership with providers, advocates, local community agencies, and the General Assembly. We are confronted with a complex and interrelated set of issues that must be understood and addressed. The task ahead is difficult and not without consequences. However, we have the rare opportunity to set in motion events that will reshape and revitalize our community mental health service system. NCMJ

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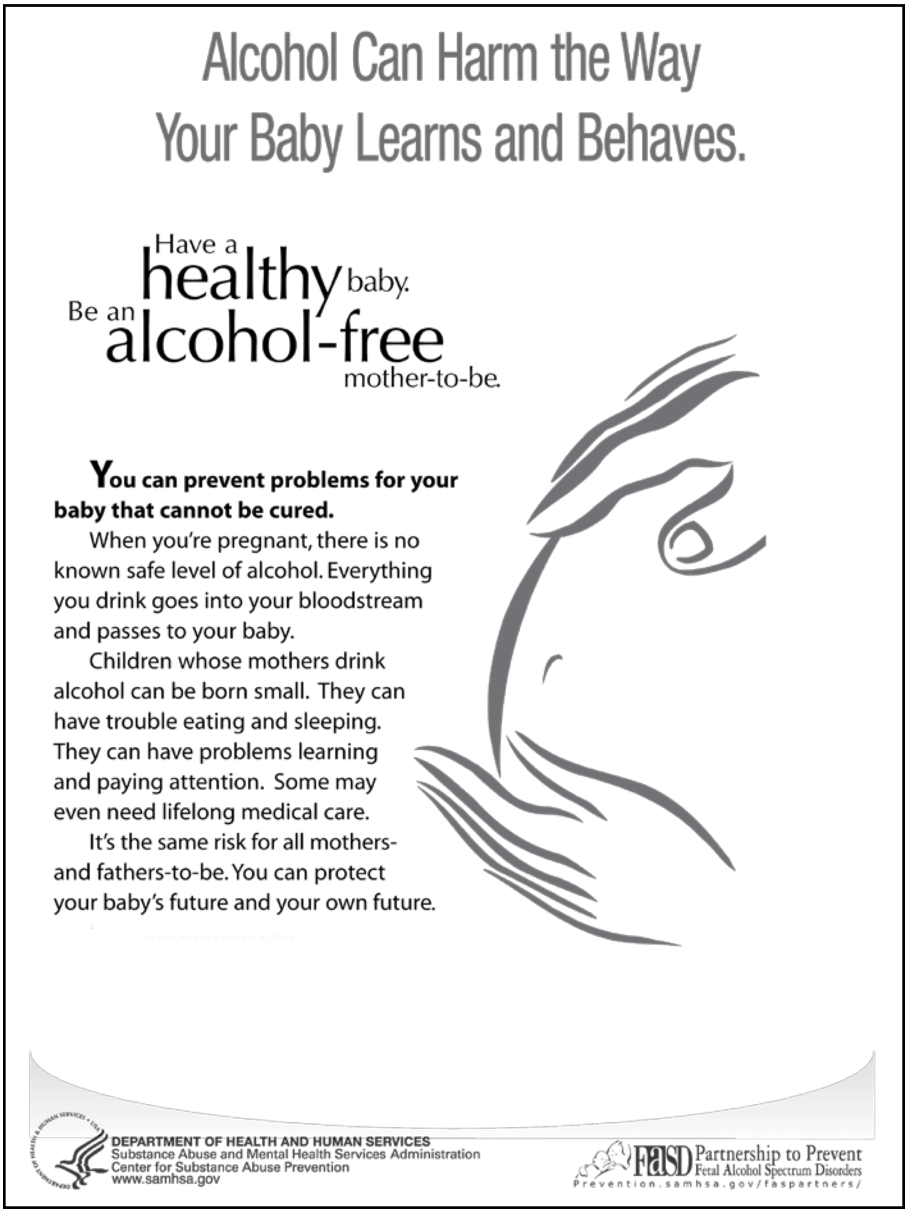

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Philanthropy Profile

A Hospital Driven Telepsychiatry Initiative to Improve Patient Care and Reduce Costs

Hospital emergency departments across the country are struggling with the challenges of providing specialized psychiatric care in a cost-effective manner [1]. In North Carolina this challenge has led to lengthy visits for patients in rural hospital emergency departments, ranging from numerous hours to multiple days [2]. Data collected by the North Carolina Division of Health Service Regulation documented that, during the first 6 months of calendar year 2010, more than 3,000 behavioral health patients waited in excess of 2.6 days in North Carolina emergency departments for specialized treatment or inpatient placement. Additionally, over 200 of those patients waited in excess of 7 days, with the largest lengths of stays occurring in rural hospitals [3]. The problem with extended lengths of stay is not just an issue of the quality of care received, but also an issue of cost and financial burden for hospitals.

Telepsychiatry Project Overview

In late 2010, the Albemarle Hospital Foundation, part of Albemarle Health in Elizabeth City, North Carolina, received a grant from The Duke Endowment (TDE) to implement telepsychiatry in Vidant Health hospital emergency departments. Year 1 of the project was designed to establish telepsychiatry in 7 Vidant Health hospitals: Albemarle Health (Elizabeth City), Vidant Bertie Hospital (Windsor), Vidant Chowan Hospital (Edenton), Vidant Duplin Hospital (Kenansville), Vidant Edgecombe Hospital (Tarboro), the Outer Banks Hospital (Nags Head), and Vidant Roanoke-Chowan Hospital (Ahoskie). Two new hospitals, Vidant Beaufort (Washington) and Vidant Pungo (Belhaven), joined the Vidant Health system in late 2011, with telepsychiatry services implementation projected for late spring 2012. Year 2 of the grant expands the project's focus to serve non-Vidant Health hospitals.

Telepsychiatry is the use of 2-way, real time, interactive audio and video. It is run on a secure network, which meets all confidentiality standards, where a psychiatric provider in one location provides services to a patient in another location. Telepsychiatry has been found to be especially useful in rural areas where access to specialty care is limited or non-existent [4].

Under the Vidant Health/TDE project, mobile video conferencing units have been placed in 7 hospitals and desktop video conferencing systems have been placed at the psychiatric practice that performs the patient consults/assessments. This practice, Coastal Carolina Neuropsychiatric Center (Coastal Carolina), is located in Jacksonville and was selected as the psychiatric contractor because of the agency's experience, capacity, and record of quality psychiatric service delivery.

The primary objective of the Vidant Health/TDE telepsychiatry project is to make psychiatric assessments readily available for all patients presenting to the emergency department with behavioral health related issues. Additional goals and objectives include: increase the number of patients receiving comprehensive psychiatric assessments utilizing telemedicine technology; secure better quantitative information on the diagnosis of mental health, substance abuse, and co-occurring disorders; reduce the average length of stay (LOS) in the emergency department; reduce the cost of mental health care to the community by decreasing the utilization of sheriff deputies, probate judges, and designated examiners; reduce unnecessary involuntary commitments; reduce financial burden to hospitals from extended emergency department LOS; improve patient outcomes through early initiation of specialized treatment, and; improve community discharge planning for both outpatient and inpatient follow-up services as needed.

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Project Implementation and Operations

Albemarle Hospital began piloting the use of telepsychiatry in May 2011 for several months. Between September and October 2011 the remaining 6 Vidant Health hospitals initiated telepsychiatry services. Coastal Carolina providers offer telepsychiatry assessments/consults in each of the 7 hospitals 7 days a week from 8am to 6pm. While the project was initially designed for the emergency department, hospitals expressed a need to conduct assessments for admitted patients as well. Coastal Carolina providers now have privileges to provide telepsychiatry services for both inpatient units and the emergency departments.

To initiate a telepsychiatry assessment, an order is placed by the physician at the hospital where the patient is located and a telephone call is placed to Coastal Carolina. Intake specialists at Coastal Carolina are able to access the patient's electronic medical record (EMR) and prepare for the assessment. The psychiatric assessments take between 45 minutes to an hour and at the conclusion of the assessment, the Coastal Carolina provider makes a disposition and medication recommendation. The disposition and medication recommendations are documented by the Coastal Carolina provider in the EMR. Following disposition and recommendations, the Coastal Carolina provider conducts a peer-to-peer telephone follow up with the patient's onsite physician to ensure delivery of recommendations and to answer questions. The entire process takes approximately 60-90 minutes.

Initial Outcomes of the Project

The early outcomes of the project look very promising. Various data indicators and measures are tracked including patient and provider satisfaction, patient lengths of stay, number of involuntary commitments overturned, 30 day recidivism rates, and payer mix. Electronic surveys are distributed quarterly to providers and staff at Coastal Carolina and the participating hospitals, and the feedback received to date is very positive. Responses indicate a high level of comfort with using the technology and with the quality of the assessments being delivered via telemedicine. Providers in the emergency departments indicate high satisfaction with timely access to specialized psychiatric treatment for the patients. Data are also collected on patient satisfaction via telephone satisfaction surveys. The survey responses reveal that 86% of patients report having a good experience with telepsychiatry and that the services they received were helpful.

Table 1 provides Vidant Hospital emergency department data since telepsychiatry services were implemented. One of the biggest early successes of the project has been the reduction in patient lengths of stay in the emergency department. The initial goal for the project was to reduce patient lengths of stay to less than 48 hours. Since the implementation of telepsychiatry, the average patient length of stay for the 7 participating hospitals has been reduced to 22 hours. Another early outcome that has a significant potential to reduce state costs associated with inpatient psychiatric treatment is the reduction of unnecessary involuntary commitments. Since the inception of telepsychiatry, 87 involuntary commitments have been overturned after the psychiatrist's assessment. Instead of needing to be sent to inpatient treatment, the psychiatrists determine they are candidates to receive treatment locally and do not need to be committed to an inpatient facility. In the first ten months since implementing telepsychiatry at Albemarle Hospital, rough calculations, based on a per diem inpatient psychiatric rate of $1,080 and a 5-day inpatient treatment stay, indicate a potential savings of $469,800 through the elimination of 87 unnecessary commitments to the state facility. This is based on the per diem Medicaid rate of inpatient psychiatric services of $665.71, an average 5 day inpatient treatment stay, and a 45% self pay population.

TABLE 1.
Vidant Health/TDE Project Initial Outcome Summary

Measure	Value
Total number of ED telepsychiatry consults	878
Average number of telepsychiatry assessments per month (all 7 hospitals combined)	158
Average length of stay in hours (from time of ED admission to time of patient discharge from ED)	22
Number of involuntary commitments admitted to ED (all 7 hospitals combined)	318
Number of involuntary commitments overturned after telepsychiatry assessment	87
Percent of involuntary commitments overturned	27%

Note. Timeframe for data collection is from implementation of telepsychiatry up through February 29, 2012. Albemarle Health began services in May 2011. The remaining 6 hospitals began services in October 2011.

Project Funding and the Future

While early measures indicate strong project success, several additional measures and plans are being developed to ensure the project's sustainability once the grant funding ends. One area of focus is measuring the financial impact telepsychiatry is having on emergency department costs by reducing patient lengths of stay. Current sustainability planning of the project requires each hospital to pay a monthly subscription fee (based on each hospital's volume of use) to bridge the gap between the cost of the service and the amount of reimbursement collected. The project is tracking reimbursement rates and comparing those with telepsychiatry related expenses for each hospital as well as comparing projected cost savings from length of stay reductions. It is anticipated that the hospitals will actualize significant cost savings which will more than cover the monthly subscription fee each hospital pays for the telepsychiatry service.

As noted in the project overview, an additional focus of the project is to extend the telepsychiatry network to non-Vidant hospitals beginning in 2012. As of this publication, Carteret General Hospital in Morehead City will be the first non-Vidant hospital to join the telepsychiatry network. It is anticipated that telepsychiatry services will begin at Carteret General Hospital by summer 2012. Additionally, 4 other non-Vidant hospitals in North Carolina have expressed interest in joining the telepsychiatry network this year.

Conclusion

The Vidant Health/TDE telepsychiatry project is making promising strides in reducing patient lengths of stay, initiating early treatment, and improving care for patients presenting in the emergency department with an acute behavioral health crisis. Early findings indicate the development and implementation of this hospital driven telepsychiatry network is a promising means of addressing the challenge of providing specialized psychiatric emergency care in a cost-effective manner. NCMJ

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Potential conflicts of interest. S.F.D. has no relevant conflicts of interest.

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It's time for us to stand up and confront the issue of mental health problems in our community. Go to storiesthatheal.samhsa.gov for more information about mental health problems, and to hear the rest of Susan's story.

Spotlight on the Safety Net

A Community Collaboration

Durham System of Care: Creating a Foundation for Community Change

System of Care (SOC) is an organizational philosophy that promotes collaboration across agencies, families, and individuals for the purpose of improving access to and coordination of behavioral health care. It is designed to enhance the provision of evidence-based, culturally and linguistically competent services and supports for our most vulnerable adults, children, and families.

Durham County adopted the values and principles of SOC as a way of doing business in 2002 with our child-serving partners. This major paradigm shift was prompted by Durham County expenditures of over $2 million in court-ordered out-of-home placements in 2001 with little evidence that placements had improved life outcomes. Leaders from the community convened and quickly recognized that the "siloed" systems did not communicate well and did a poor job of coordinating services, even when they all shared the same child or family.

With no new dollars, The Durham Center led the development of SOC. Staff was hired to begin the process of creating an SOC infrastructure, promoting a community-wide approach, and developing community-based alternatives which have since resulted in Durham County spending no money on court-ordered out-of-home placements in the last several years. These efforts were recognized nationally in 2006 with the Excellence in Community Collaboration Award from the National Council for Community Behavioral Healthcare and have since received a variety of other state and local awards.

Drawing on the success of SOC for children, in 2007 Durham County decided to expand SOC to our adult-serving partners, making Durham one of the first communities in the country to begin integration of the SOC values and principles into adult services. In 2010 child and adult SOC was fully integrated fiscally, programmatically, and with co-located staff.

To be successful and sustainable, SOC must establish itself as meaningful and relevant across multiple systems and with non-traditional mental health partnerships. While there is an emphasis on mental health conditions, it is critical to establish the applicability of shared values and principles across systems. Strategically it is also important to strike a balance between system reform efforts and improving individual life outcomes–ultimately the system is changed one valuable person at a time.

Each year Durham System of Care hosts a Steps Forward event to engage the community in a dialogue to identify system priorities and to develop an action plan. These priorities are aligned around the 8 service dimensions of SOC–mental health, substance abuse, social services, education, vocational training, health, recreation and, operational services [1].

In Durham, the SOC approach served as a catalyst for several major federal grants, including a multi-million dollar, multi-year Substance Abuse and Mental Health Services Administration (SAMHSA) grant to work with disconnected youth. (Disconnected youth are those with a serious mental illness who have become disconnected from needed services and supports, such as school, employment, or community or family support.) We also host trainings, work groups, an online resource directory called Network of Care, cross-system studies, and the Community Collaborative, which is a monthly meeting of all SOC partners who inform and promote the SOC approach.

One of the most successful activities is the implementation of "Care Review", a multi-disci-

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plinary, collaborative process between professionals, the client, and members of their support team to increase access to needed services and supports. The planning process is based on motivational interviewing, self-determination, and recovery–with the client present to tell their own story, assemble their own support team, and identify their own needs and desires.

The goals of Care Review are to improve timely access to needed services and supports and to enhance retention in services and supports. It is an opportunity for comprehensive and holistic planning that breaks down system barriers and, through the collection of data, facilitates a better systemic understanding of what did and did not work and why.

In FY 2011 SOC facilitated over 225 Care Review meetings highlighted by 2 core teams focusing on children/adolescents and adults, and 4 specialty teams focusing on transition age youth, persons who are homeless and living in a shelter, juvenile justice-involved individuals, and the Latino/Hispanic population.

Here is an example of how Care Review works: 'Rhonda' was 17 years old when she and her mother were referred to Care Review to request a residential substance abuse placement. Rhonda had become non-compliant with all treatment services, had stopped going to school, admitted to smoking marijuana every day to self-medicate for traumatic memories, and had begun exhibiting more reckless and threatening behaviors. Despite many personal strengths she had become withdrawn and despondent.

At her first Care Review meeting she refused to make eye contact or to participate at all except to object to an out-of-home placement, even though her mother had increasingly become a target of her anger. Due to concerns for her safety and her escalating substance use, the Care Review team, with her mother's urging, supported a recommended placement in a residential facility.

Rhonda was given several options for treatment programs and she agreed to call each program to ask a list of questions generated during the Care Review to help her establish a sense of control. She selected a program but, promptly upon admission, got into a physical altercation with staff, which led to criminal charges and transfer to the local detention center. When she returned to Durham, her Care Review team reconvened and this time Rhonda was an active participant in the planning process. She articulated insight into her mental health and substance abuse needs and discussed recommendations with the Care Review team. A plan was made and one year later Rhonda is substance free, is a student in the Gateway to College program, works part time, and has been a youth consultant with the SAMHSA grant.

When Rhonda was publically recognized for her achievements she stated, "When someone listens to what you want, everything changes and you start to believe in yourself again and you want a better life."

That's what System of Care is all about. NCMJ

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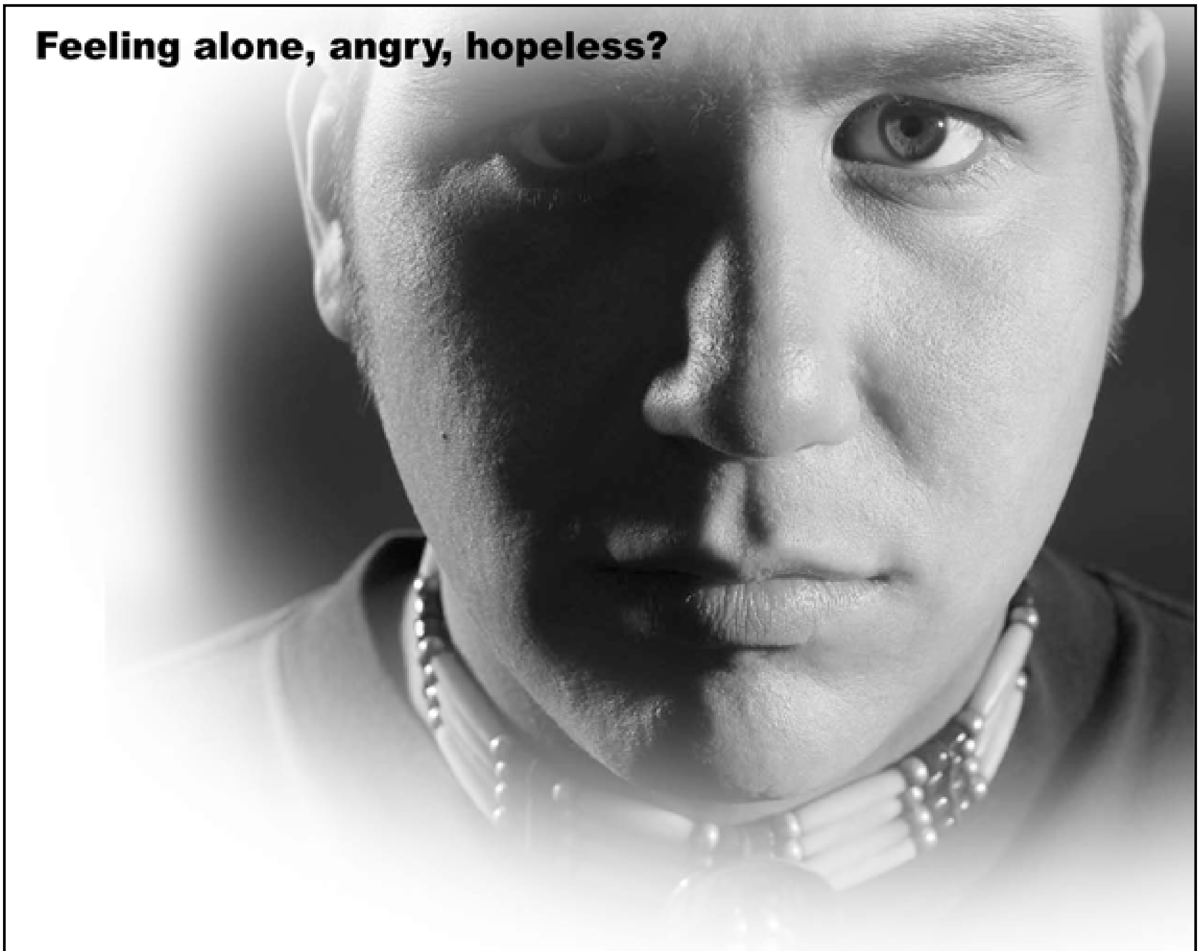
Feeling alone, angry, hopeless?



When it seems like there's
no hope, there is help.

It's important to talk to someone. You can call right now. We are available all hours of the day and night, and the call is completely free and confidential.

If you or someone you know is thinking about suicide,
call the National Suicide Prevention Lifeline:

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Running the Numbers

A Periodic Feature to Inform North Carolina Health Care Professionals About Current Topics in Health Statistics

A Snapshot of North Carolina's Public Mental Health, Developmental Disabilities, and Substance Abuse Service System

The move to operating North Carolina's public mental health, developmental disabilities, and substance abuse (MHDDSAS) service system within a Medicaid managed care framework under the 1915(b)/(c) waiver is an enormous shift for individuals, providers, and local management entities (LMEs). Coupled with efforts of the North Carolina Department of Health and Human Services (NCDHHS) to prepare for health reform and to respond to the reduced resources and increased need that resulted from the nation's economic downturn, the changes impacting the public service system are daunting. NCDHHS must be able to understand the impact of these shifts and respond quickly to emerging successes and challenges in informed ways if it is to ensure adequate care for individuals who depend on the outcome of these endeavors.

A snapshot of the current system provides a point of reference for evaluating changes expected to occur over the next few years. The following information provides a baseline for this evaluation. It includes data on services funded by county and state appropriations, federal block grants, and Medicaid funds, which the NCDHHS regularly collects and reports.

Who Needs MHDDSAS Services?

Estimates of persons who experience a condition severe enough to require services from the specialty MHDDSAS service system vary by age and condition. Approximately 11 out of every 100 of North Carolina's children experience a severe emotional disturbance in a given year. About 5.4% of North Carolina adults experience a severe and persistent mental illness, such as bipolar disorder or schizophrenia [1], and approximately 7.8% of North Carolina's youth and adults abuse or are dependent on alcohol and/or illicit drugs [2]. Approximately 1.42% of North Carolina children and 0.79% of North Carolina adults have an intellectual disability (formerly known as mental retardation) or a developmental disability such as autism [3].

In addition, many people experience mild or short-term depression, anxiety, or other conditions that are treated outside the specialty care system. While 16% of adults in the United States received mental health services from a specialty provider in 2005, approximately 23% of adults were treated by primary care physicians and 15% were treated by human service providers or complementary medical providers for mental health problems [4].

Who Currently Receives Services from the Public System?

The public mental health system is intended to serve those with the greatest need and the most limited resources. Individuals not served by the public system receive services through primary care, privately funded specialty providers, or they go without services altogether. Table 1 shows the percent of North Carolina residents aged 3 and above who received publicly-funded services in the past state fiscal year [5].

With the implementation of the Patient Protection and Affordable Care in January 2014, insurance coverage for health services, including MHDDSAS services, is projected to grow to include an additional 1.1 million uninsured, non-elderly North Carolina adults by 2019. Most of these individuals would receive services through private providers; however, as many as 536,000 of them could be eligible for Medicaid services [6].

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TABLE 1.
Publicly-Funded Services to North Carolina Residents with Mental Illness, Developmental Disabilities, or Substance Abuse Conditions, July 2010 – June 2011

	Number of persons in need	Number of persons served	Percent served of those in need (range among LMEs)
Mental health: youth	207,227	116,754	56% (37%-75%)
Mental health: adult	401,860	210,710	52% (31%-79%)
Developmental disabilities: youth	62,415	13,080	21% (13%-35%)
Developmental disabilities: adult	60,398	24,165	40% (26%-63%)
Substance abuse: youth	44,268	4476	10% (5%-16%)
Substance abuse: adult	595,244	70,730	12% (6%-19%)

How Long Does It Take to Get Services?

National standards for timeliness of care recommend that individuals experiencing an emergency be seen within 2 hours [7]. Persons in an urgent, but not life threatening, situation should be seen within 48 hours, and those needing routine care should be seen within 14 days of their request. Between April-June 2011, almost all individuals contacting the LMEs for emergent MHDDSAS care received it within 2 hours (statewide average = 100%, range 96%-100%). Over three-fourths of those requesting urgent care from the public system received an initial visit within 48 hours (statewide average = 81%, range among LMEs = 44%-100%), or routine care (statewide average = 75%, range 44%-97%) in accordance with accepted standards [8].

However, 1 timely visit is not enough to address serious MHDDSAS conditions. National research and recommendations suggest that individuals experiencing behavioral health problems need at least 2 visits with a professional in the first 2 weeks (initiation) and an additional 2 visits in the following 30 days (engagement) to have the best chance to benefit from treatment and move towards recovery [9]. Over the same time period, April-June 2011, 43% of people with need for mental health services statewide received 2 visits in the first 30

TABLE 2.
Wait-listed Services for North Carolinians with Intellectual and Developmental Disabilities, June 30, 2011

Requested service	Number of persons requesting service	Percent of persons on wait list
Targeted case management	858	8.5%
Day services	2,472	24.5%
Community-based services	3,588	35.6%
Respite services	2,622	26.0%
Residential services–child	259	2.6%
Residential services–adult	1020	10.1%
Behavioral services	1,332	13.2%
Specialized services for school-age children	1,262	12.5%

Note. Data are for 10,076 individuals who were waiting for public services and supports for IDD conditions as of June 30, 2011, as reported by Local Management Entities to the North Carolina Division of Mental Health, Developmental Disabilities, and Substance Abuse Services. Totals exceed 100% since individuals can request multiple services.

TABLE 3.
Providers of Public Mental Health, Developmental Disabilities, and Substance Abuse Services, July 2010 – June 2011

	Number of providers	Average cost per person
Mental health: youth		
Medicaid	6,064	$5,932
State-funded	1,123	$1,833
Mental health: adult		
Medicaid	6,131	$2,405
State-funded	2,531	$1,302
Substance abuse: youth		
Medicaid	865	$2,515
State-funded	223	$3,670
Substance abuse: adult		
Medicaid	2,308	$2,102
State-funded	1,597	$1,770
Developmental disabilities: youth		
Medicaid	2,338	$14,838
State-funded	436	$5,518
Developmental disabilities: adult		
Medicaid	2,415	$48,211
State-funded	1,254	$10,290

Note. Most providers serve both Medicaid and state-funded individuals. Data are from analysis of Medicaid and state service claims paid through February 29, 2012.

days (range 31%-69%), and 27% received an additional 2 visits in the following 30 days (range 20%-33%). For those with substance abuse problems, 64% met the initiation standards (range 37%-87%), and 46% met the engagement standards (range 22%-58%) [8].

Individuals with intellectual or developmental disabilities (IDD) need regular supports as well. The frequency and intensity of support needs vary, depending on the severity of their condition. After a thorough assessment to determine the level of need, individuals may receive services under the 1915(c) waiver or receive available state-funded supports while waiting for waiver services. As of June 2011 there were 10,076 persons waiting for services for IDD conditions (64.1 persons per 10,000 Medicaid enrollees). At least 2,600 of these individuals were receiving state-funded services while waiting. The most requested services are shown in Table 2.

What Services Do People Receive?

The public service system offers an array of services ranging from screening, referral, and medication assistance from primary care physicians and intensive community-based services from specialty providers to crisis intervention, inpatient, and residential treatment from both private and state-operated facilities. The service mix varies across the state with the availability of certain types of services, population density, and cultural expectations.

The adoption of the 1915(b)/(c) waiver allows each LME to manage the size and mix of its provider network to help improve cost-effectiveness while ensuring that individuals have a choice of providers for all services available. The North Carolina Division of Medical Assistance requires the local management entity-managed care organizations (LME/MCOs) to enroll at least 2 providers for each service type and specialty and to conduct annual analyses to identify and address service gaps and surpluses. Competition among providers in a network without a monopoly in any 1 service type or specialty is expected to produce quality services while ensuring reasonable costs. Savings realized by limiting the size of the provider network can be funneled into additional services.

The intensity, frequency, and length of services vary by condition and level of functioning. The

TABLE 4.
Care Coordination for Individuals Who Received Inpatient or Crisis Services, July – September 2011

This table is available in its entirety in the online edition of the NCMJ.

Note: Crisis services and community hospitalization measures do not include data from PBH, the one LME/MCO operating in North Carolina.

public system is designed to provide a continuum of care to allow individuals to move from one level of care to another as needs change. Medicaid and state funds provide the same service array to different populations. The current number of providers and average annual costs for each age-disability group are shown in Table 3. However, because eligibility requirements for Medicaid and state-funded services differ, caution should be exercised in comparing the data in Table 3 across payer sources.

The LME/MCOs will be paid at a fixed (capitated) rate based on per-member-per-month costs for 3 years of historical Medicaid claims. All Medicaid recipients who fit the medical necessity definition must be provided services by the LME/MCO from this monthly capitation. Over time, this is expected to reduce the average cost per person, as LME/MCOs manage Medicaid-funded services as closely as they have historically managed state-funded services.

In state fiscal year 2010 the costs for Medicaid mental health and substance abuse services under fee-for-service arrangements were twice as high as the managed care costs for PBH, the one LME/MCO operating in North Carolina ($89.93 per-member-per-month compared to $43.22 respectively). Medicaid fee-for-service costs for individuals with IDD were $71.66 per-member- per-month compared to PBH's managed care costs of $59.65 [10].

What Happens When an Individual Leaves or Changes Services?

Coordination of care is critical to support individuals' recovery of control over their lives and determination of their decisions if they have a behavioral or developmental disability. Specifically, it is important that individuals who experience a crisis receive prompt follow-up care from a community resource. The LME/MCO is responsible for ensuring good coordination of care for consumers in its catchment area. Table 4 (online version only) provides information on individuals served by LMEs who received timely follow-up care in the first quarter of this fiscal year [11].

What Impact Do Services Have on Individuals' Lives?

Quality services must address symptoms and problematic behaviors. Efforts to prevent crisis episodes and support stable, self-directed lives are equally as important. Among individuals in LME/MCO catchment areas who were discharged between April 1 and June 30, 2011, approximately 6% received inpatient care from the state psychiatric hospitals. Ten percent of persons receiving psychiatric care in community hospitals were readmitted within 30 days. During the same period, state hospital readmissions ranged from 0% to 19% among LMEs. Community hospital readmissions ranged from 6% to 19% [11]. The expectation is that better care management under the waiver model will reduce the need for readmissions over time.

The most important service outcome is improvement in the quality of life for individuals who receive services. Figure 1 (online version only) provides information on mental health and substance abuse consumers' perspectives on how services have impacted their lives [12]. Between 40% – 60% of individuals surveyed reported that the services they received were very helpful in improving their quality of life, increasing hope for the future, and increasing control over their lives. Figure 2 (online version only) shows the perspectives of individuals with intellectual and developmental disabilities who receive publicly-funded services, compared to individuals in other states [13]. North Carolina survey respondents were a little less likely to report that they could choose where they wanted to live, staff who help them at home, place of work, or staff

FIGURE 1.
North Carolinians with Mental Health and Substance Abuse Conditions Reporting Public Services are Very Helpful in Their Lives

This figure is available in its entirety in the online edition of the NCMJ.

Note. MH=mental health, SA=substance abuse.

FIGURE 2.
Individuals with Intellectual and Developmental Disabilities Reporting Having Choice in Major Life Decisions

This figure is available in its entirety in the online edition of the NCMJ.

who help them at work than individuals surveyed in other states.

The NCDHHS will be tracking the information above, as well as other information, over the upcoming years, as health reform is implemented and as LMEs transition to operating in a managed care framework. Over time, each LME/MCO will be compared to its pre-MCO performance, as a way to monitor the impact of the changes. While it is tempting to compare LME/MCOs to each other, this cannot be done adequately without taking into consideration environmental factors such as the length of time in operation and geographic, economic, and cultural differences across the state. However, more detailed evaluation of LME/MCOs that successfully implement the Medicaid waivers can inform policy decisions to improve the service system as a whole. NCMJ

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The Affordable Care Act:
Improved Options for North Carolinians with Mental Illnesses

Allison A. Wishon Siegwarth, Chris Koyanagi

The Affordable Care Act, the health reform law enacted in 2010, offers new options to improve the quality of and access to mental health care for North Carolinians. This commentary will discuss provisions of the law that have the potential to enhance the lives of individuals with mental illnesses.

The North Carolina Division of Mental Health, Developmental Disabilities and Substance Abuse Services estimates that 393,151 adults living in North Carolina have a serious, disabling mental illness and that 246,230 children and youth have a serious mental, behavioral, or emotional disorder [1]. Countless other North Carolinians experience mental health conditions that are less severe but may nonetheless significantly affect their quality of life [2]. Individuals with mental illnesses often have difficulty accessing appropriate services because of problems with insurance. Private insurance frequently does not cover mental disorders or limits access to care, offering only a narrow range of services. In addition, public mental health systems have suffered from major budget cuts and outdated service arrays for many years.

The Affordable Care Act (ACA), the health reform law passed in March of 2010, has the potential to address a range of problems and needs experienced by individuals with mental illnesses [3]. This commentary will discuss some of the provisions of the act that have the most potential to improve the quality and availability of care for North Carolinians with mental disorders.

Essential Health Benefits

Historically, one of the greatest barriers to care for individuals with mental illnesses has been inability to obtain insurance coverage for mental health services. The ACA aims to address insurance access issues in the private insurance market by establishing state-based Health Benefit Exchanges through which individuals and small businesses may purchase insurance coverage. Insurers who wish to offer plans through the exchanges must cover certain specific categories of services collectively termed the essential health benefits (EHB) package. Mental health and substance use disorder services must be covered, and, importantly, must be covered at parity with medical and surgical care to meet standards in federal and state parity laws. Insurers must also cover preventive and rehabilitative services which could include screening for mental health conditions and psychiatric rehabilitation services. The law also prohibits defining the benefit package in a way that would discriminate against individuals with disabilities, including mental illnesses. Certain insurance purchased outside the exchanges need not provide coverage for the full range of essential benefits. Additionally, the EHB requirement does not apply to plans in effect on the date of enactment of the ACA ("grandfathered" plans) for as long as the plan does not change substantially and maintains its "grandfathered" status.

The Secretary of Health and Human Services has discretion to define the EHB, but the law requires that the scope of these benefits equal that provided under a "typical" employer plan. The US Department of Health and Human Services (DHHS) has released guidance to states on the EHB package; however, instead of creating a comprehensive federal standard, as many policymakers and advocates expected, DHHS has offered states great latitude in defining the EHB using a "benchmark" approach [4]. This approach allows states to select an existing health plan in the state to use as a benchmark to determine the scope of services for their exchange plans.

States may select one of the three largest small-employer plans, state or federal employee plans, or the largest health maintenance organization (HMO) plan offered in the state to serve as their benchmark. States must supplement the plan if it fails to include any of the essential benefits required under the law. This is particularly relevant for mental health services, as coverage for these services is often offered minimally or not at all in small-employer plans.

Currently, most of the small-employer plans that states may select are not subject to the federal mental health parity law and will therefore need to be altered to comply with the EHB parity requirement. The Mental Health Parity and Addiction Equity Act of 2008 requires employer plans

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that cover more than 50 employees to ensure that financial requirements and treatment limitations applicable to mental health or substance use disorder benefits are no more restrictive than the requirements or limitations applied to medical and surgical benefits [5].

The benchmark approach to defining the EHB package is likely to result in marked variability in mental health coverage in exchange plans across the country. It is moreover quite complex for states, which must select a benchmark plan and evaluate its details in order to add benefits that are missing to comply with the nondiscrimination rule and mental health parity. When the process is complete, however, individuals and small businesses will have ready access to health insurance (with subsidies available for many).

Medicaid Benchmark Benefits

In addition to making reforms in the private health insurance market, the ACA also makes important changes to the federal-state Medicaid program. Beginning in 2014, Medicaid eligibility will be expanded to cover all individuals with incomes at or below 133% of the federal poverty level established by the DHHS. This means that people will soon qualify for Medicaid based solely on financial factors; individuals will no longer need to meet criteria for one of the specific Medicaid eligibility categories, such as having dependent children or receiving Supplementary Security Income. Those newly eligible will include a substantial number of individuals with significant mental health care needs, including currently homeless individuals, whose needs for both health and mental health care are substantial.

Many states, including North Carolina, have provided little or no Medicaid coverage for adults without children. The North Carolina Division of Medical Assistance estimates that between 500,000-600,000 North Carolinians are expected to enroll in Medicaid as a result of the Medicaid expansion [6]. Medicaid will be the primary source of coverage for individuals with mental illnesses who gain insurance under the ACA, because these individuals are more likely to have low incomes than are those without mental illnesses [7].

States have been given flexibility with respect to the covered benefits for newly eligible Medicaid beneficiaries. At a minimum, benefits must cover the same services as the state's EHB package for exchange plans. As long as they meet this minimum requirement, states may define a very different, and potentially more limited Medicaid benefit for newly eligible adults than for others on the program (children have special protection under the ACA and would be entitled to all Medicaid-covered services). However, this flexibility also allows states to offer the full or even an enhanced state Medicaid plan to newly eligible adults. States have had the flexibility to provide different benefits for other groups enrolled in the Medicaid program for several years, but few have chosen to do so and some have provided expanded, not reduced, benefits [8].

Some people who fall into the newly eligible income range may also qualify for the program under current Medicaid rules. These individuals may enroll in the state's standard Medicaid plan, which will generally offer a broader and more appropriate array of the critical mental health, rehabilitation, and long-term care services needed by individuals with serious mental illnesses. States have an obligation to assess individuals as they apply for the program to determine whether they meet the eligibility rules for the regular program or are to be enrolled in a benchmark plan [9].

Although it is impossible to predict how states will use this flexibility, it may be that the administrative complexity of assessing individuals for and operating a separate, benchmark plan will be very burdensome. The additional complexity of two parallel Medicaid programs would also be onerous for providers and beneficiaries. Without question, some individuals in the newly eligible group will require intensive community mental health services and supports that are covered in standard Medicaid but are unlikely to be covered in a benchmark plan based on private insurance. Unless these services are covered under Medicaid, states may be forced to pay for them out of state funds. Providing full standard Medicaid will facilitate a more streamlined administrative process and will ensure that states are able to draw down federal funds for services that may otherwise have to be funded solely with state dollars.

Additional Opportunities

Many of the protections and reforms provided by the Affordable Care Act will benefit children, individuals with mental illnesses, and providers of mental health care in North Carolina. A few of the Medicaid provisions that are particularly well situated to enhance the lives of people with mental illnesses are discussed below.

New options for home- and community-based services. The ACA amends a key provision in Medicaid that allows states to provide home- and community-based services as a regular state plan option, instead of only allowing those services through a complex waiver as provided for under section 1915(c) of the Social Security Act. The state plan option provided for under section 1915(i) offers states the potential to cover a wide range of services and supports that can enable individuals with serious mental illnesses to reside in their communities. Originally authorized in 2005 [10], section 1915(i) bases eligibility for services on function—not on risk of institutionalization, as is required under a waiver. This permits states to provide services and supports to individuals with mental illnesses of all ages and prevents states from being required to ensure that services are provided at less cost than institutional care.

Before health reform was enacted, only a handful of states utilized section 1915(i). However, several important changes were made to this section by the ACA, which may make the option more appealing to states, advocates, or potential beneficiaries. States are now permitted to have more than one 1915(i) state plan option and are allowed to target 1915(i) services to specific populations, such as to individuals with serious mental illnesses. The range of services that may be provided has also been expanded to include any service that could be approved under a waiver. And under the ACA, states must provide services statewide without waiting lists or limits on the number of individuals eligible to receive 1915(i) services.

Section 1915(i) is now an important option for meeting the needs of children and adults with mental illness. States may cover a broad array of evidence-based, recovery-focused mental health services, such as peer support, respite care, all of the costs associated with supported employment programs, supportive housing (possibly including deposits and first month's rent), and other supports. Using a section 1915(i) state plan option, states may be able to get federal Medicaid funding for services that are now being paid for solely with state funds. The option also encourages the use of innovative reimbursement strategies, such as paying for services in a bundled manner through daily or case rates, instead of traditional fee-for-service payment methodologies. Together with the Rehabilitation Option, 1915(i) allows states to fund a comprehensive system of care for individuals with mental illnesses. The Medicaid Rehabilitation Option is a category of Medicaid services that allows states to provide certain rehabilitative services, and is primarily used to furnish mental health services to individuals in their communities. There are, however, restrictions on the types of services that may be covered under the option. Using the Rehabilitation Option in tandem with 1915(i) allows states to fund a comprehensive system of care for individuals with mental illnesses [11]. To date, 8 states (not including North Carolina) have an approved section 1915(i) state plan option in place [12].

Medicaid "health homes." The ACA creates a new Medicaid state option to fund health homes, which are intended to improve the quality of care for Medicaid beneficiaries with chronic conditions, including mental illnesses. States may allow certain people with chronic conditions, or those with a serious and persistent mental health condition, to designate a provider as their "health home."

Health homes provide comprehensive care coordination and other supportive services. Community mental health centers are specifically listed in the law as eligible for designation as a health home. Such arrangements allow necessary primary care services and linkages to specialty care to be provided through the mental health agency where an individual is receiving regular services, thus offering maximum care coordination and management of co-occurring physical illnesses, which people with mental illnesses have an increased risk of experiencing [13, 14]. Mental health professionals may also participate as part of any health home clinical team.

North Carolina has received a health home planning grant from the federal government and has submitted a state plan amendment seeking to enable the state to provide health home services statewide through the Community Care of North Carolina program [15].

Challenges Ahead

The ACA is a lengthy statute with many innovative provisions that can improve Medicare, Medicaid, quality of care, cost controls, and private insurance coverage. The inclusion of mental health and substance use disorder services at parity in the EHB and the infusion of many aspects of the law with opportunities to improve the quality of mental health care signal a clear recognition of the importance and effectiveness of addressing the mental health needs of Americans who have mental illnesses. In order to ensure that individuals with mental illnesses fully benefit from these reforms, it will be important for stakeholders to advocate for robust mental health benefits in the exchange plans and, most importantly, in Medicaid. The potential of the ACA will only be realized if states take full advantage of the innovative options in the law, such as the Medicaid section 1915(i) state plan option and the Medicaid option to provide health homes. **NCMJ**

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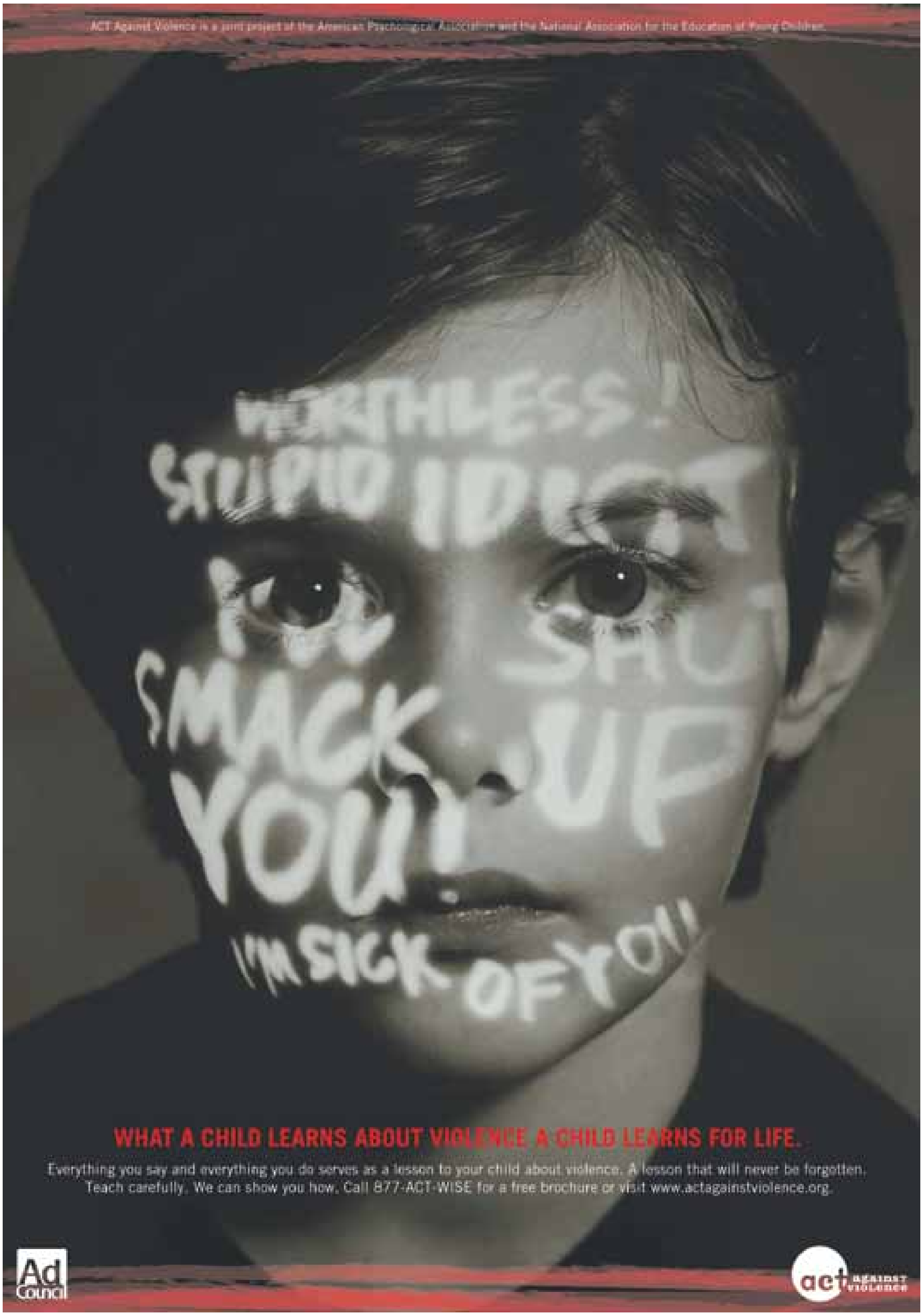

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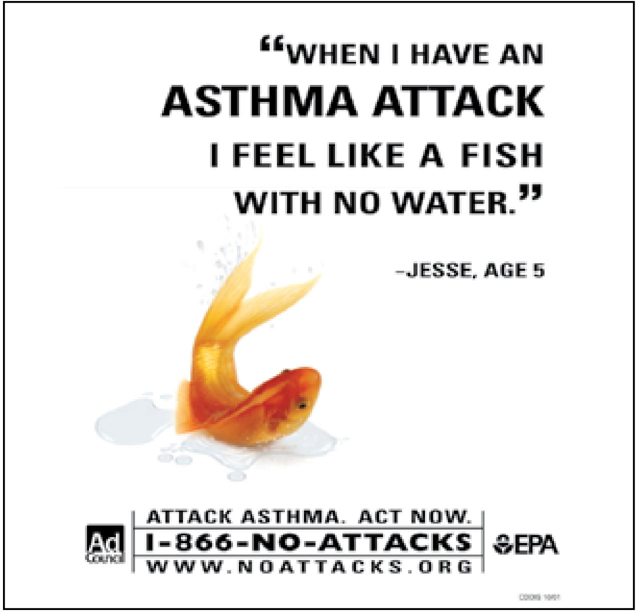

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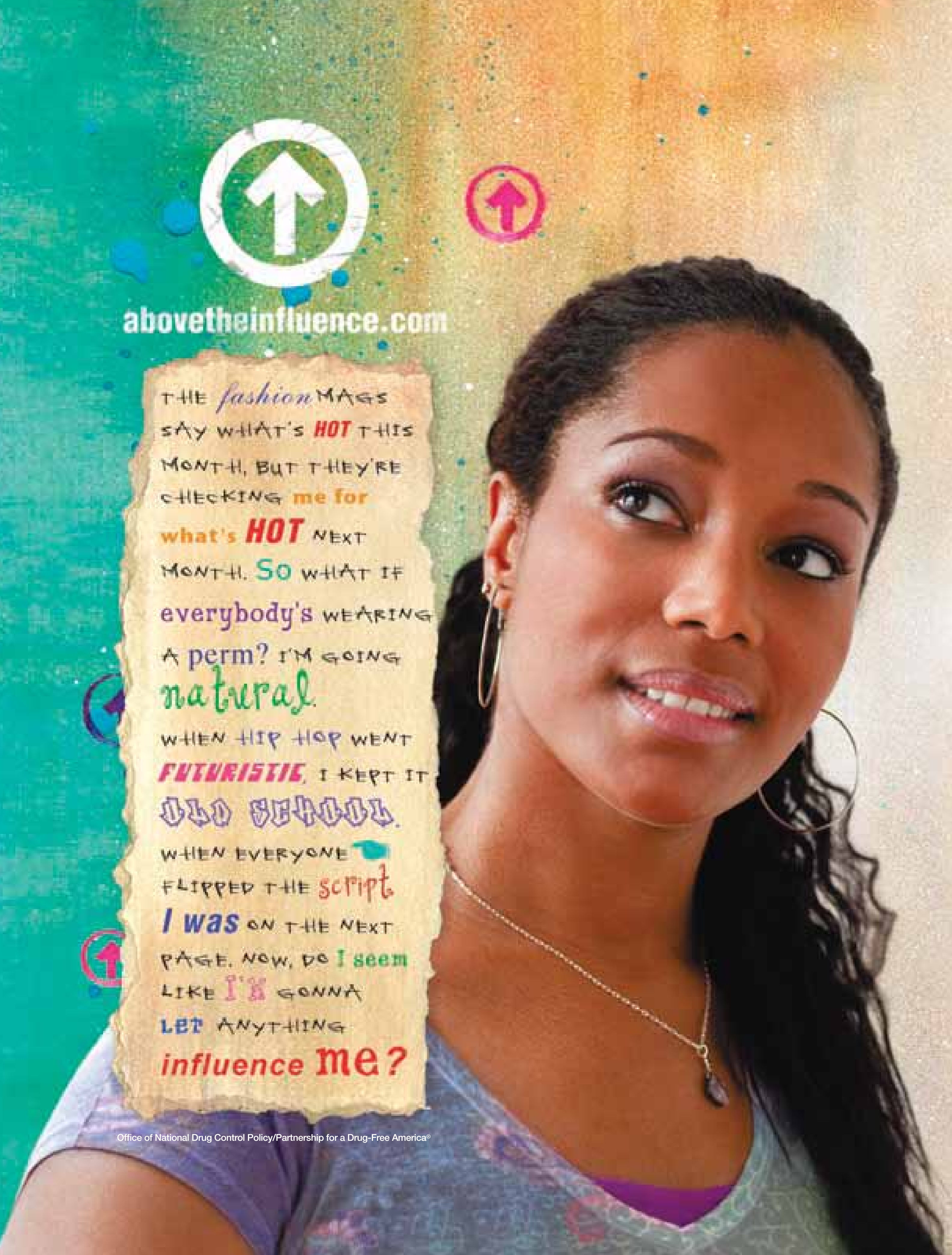

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