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School-Based Mental Health: A De Facto Mental Health System for Children

Steve Jacob
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ABSTRACT

As the nation's schools seek to fulfill the academic imperatives of the federal No Child Left Behind Act and associated state imperatives, they may be forgetting an important missing element in boosting academic achievement: directly confronting the mental health and psychosocial needs that impede a significant percentage of children and adolescents. This article explores the available research on mental health services in schools and the theoretical basis for multiple approaches to the problem. Creating a comprehensive solution to address mental and behavioral barriers to learning could significantly improve academic performance in U.S. primary and secondary schools.

KEYWORDS: Mental health, children, school health clinic, psychosocial behavior, academic achievement

INTRODUCTION

The 2001 No Child Left Behind Act as well as major government reports—the 1999 Report of the Surgeon General on the Mental Health of the Nation and the 2003 report from the New Freedom Commission on Mental Health—cited School-Based Mental Health (SBMH) services as key to improving academic performance and emotional well-being of schoolchildren (Kutash, Duchnowski, and Lynn, 2006). The 1976 Individuals with Disabilities Act caused a major shift in the child mental health landscape, dictating the educational system's financial responsibility to educate children with emotional and physical disabilities. The legislation firmly placed schools into the mental health services arena but has caused confusion on the roles of schools and community mental health in treating children (Pumariega and Vance, 1999).

The confusion has been exacerbated by the differing approaches, language, and goals of education and mental health systems, hampering the development of an effective collaborative model. Generally, schools seek to improve academic performance by removing psychosocial barriers. Absent those barriers impeding performance, services are not provided because of limited financial resources. Those trained in a College of Education focus on behavior and social learning. In the mental health system, assessment of impairment primarily dictates treatment, along with the source of funding. A child's ability to function at home and in society, as well as in school, is taken into account. Those trained in a College of Arts and Sciences are influenced by theories rooted in cognitive behavior, neurology, and biochemistry (Kutash et al., 2006).

Screening for mental illness differs from early identification of disorders. A screening program would evaluate all students in a given grade. An early identification program involves educating school staff to recognize symptoms or signs of mental illness. Mental health screening tools have been used effectively in physician's offices. But there is insufficient evidence that similar tools can be employed effectively in schools. Mental health screening proposals in schools have also drawn heavy political opposition from those who consider them intrusive.

THE EXTENT OF MENTAL ILLNESS IN CHILDREN

There is ample evidence that suggests the reported increase in prevalence of mental illness among youth is, in fact, an accurate reflection of an actual expansion of mental health problems (Burns, Hoagwood, and Mrazek, 1999; Kelleher, McNerny, Gardner, Childs, and Wasserman, 2000; Coy, 2001; Loeber, Farrington, and Petechuk, 2003). The proportion of pediatric patients in primary care with psychosocial problems has increased to 19% from 7% 20 years ago (Kelleher et al., 2000). The U.S. Surgeon General's *Call to Action to Prevent Suicide 1999*

reported that the rate of suicide by those 10–14 years of age increased 100% from 1980–1996 and 14% for those 15–19 during the same period. The World Health Organization predicts that psychopathology will be among the five leading causes of mortality and disability by 2020 (United States Public Health Service, 1999).

An increase in juvenile delinquents has been blamed in part to diagnosed and undiagnosed mental illness. There has been a 33% increase of children 7–12 years old appearing in juvenile court since 1991 (Snyder, 2001; United States General Accounting Office, 2003). Bullying and school violence have become a virtual epidemic, with 77% of children saying they have been victims of such aggressive behavior (Finn-Stevenson, Ginicola, and Yekelchik, 2005). A mental health survey of 24 Iowa schools found a significant increase in student aggression from 2000 to 2005. Students were asked what they liked and disliked about their school. Unprompted, more than 70% of more than 2000 mentioned problems with bullying in 2005, compared to no such responses in the 2000 survey (Finn-Stevenson et al., 2005).

An estimated 20% of children need active mental health interventions, 11% have significant functional impairment and 5% have extreme functional impairment, according to a U.S. Surgeon General's report on children's mental health. The study showed 13% of children and adolescents had anxiety disorders, 6.2% had mood disorders, and 10.3% had disruptive disorders (United States Public Health Service, 1999).

Adults with mental health disabilities reported the onset at around 14 years old, according to a 2005 study (Kessler et al., 2005). Risk behaviors are another potential indicator of mental health. A Centers for Disease Control and Prevention survey of youth risk behavior reported 30% of youth engaged in episodic heavy drinking, 14% used cigarettes frequently, 24% used marijuana

in the past month, and 9% attempted suicide in the previous 12 months (Centers for Disease Control and Prevention, 2000).

MENTAL HEALTH AND ACADEMIC PERFORMANCE

Studies have found that social and emotional competency is predictive of academic success (Wilson, Gottfredson, and Najaka, 2001). Children with high psychosocial skills are more academically engaged, have better attendance and classroom behavior, score higher on standardized tests, and have higher graduation rates (Hawkins, Guo, Hill, Battin-Pearson, and Abbott, 2001; Wilson et al., 2001; Durlak and Weissberg, 2005). On the other hand, poor emotional and social skills have a strong association with poor academic performance, absenteeism, truancy, and dropout rate (Birch and Ladd, 1996; McDougall, Hymel, Vaillancourt, and Mercer, 2001). Caprara et al. found that eighth-grade academic achievement can more accurately be predicted by third-grade social-emotional skills than by academic performance in the same grade (Caprara, Barbanelli, Pastorelli, Bandura, and Zimbardo, 2000). Experts emphasize the importance of the universal support and effort at all levels, including the school, the district, community, and favorable governmental policies and funding (Greenberg et al., 2003; Fixen, Naoom, Blase, Friedman, and Wallace, 2005).

INTERVENTION STRATEGIES

School is seen as an ideal setting for mental health services. And it is clear that schools are the major providers of mental health services, but it is unclear exactly what those services consist of (Rones and Hoagwood, 2000). There are several advantages to basing mental health services at

schools. School is a familiar setting for students, easing the stigma and intimidation often felt in more traditional mental health settings. The setting's convenience and comfort may encourage a stronger commitment to completing recommended therapy. The access-to-transportation barrier is virtually eliminated. Schools can observe a student's functionality as they deal with physical and social challenges, interpersonal relationships, and extracurricular activities during the school day. Cost of care has been found to cost less in schools, compared to private or community-based services (American Academy of Pediatrics, 2004).

There are several competing definitions of the school-based mental health strategies schools employ to combat mental and emotional challenges. Weisz, Sandler, Durlak, and Anton (2005) expanded definitions originally developed by the Institute of Medicine (IOM) in the 1990s to delineate levels of prevention and treatment:

1. Health promotion/positive development strategies target an entire population to enhance positive development and reduce risks of aberrant behavior.
2. Universal prevention strategies are designed to address risk factors without targeting those with anticipated higher risk factors.
3. Selective prevention strategies zero in on at-risk groups with a significant risk factor and attempt to counteract that risk.
4. Indicated prevention strategies are aimed at those with significant symptoms of a disorder, but do not meet the diagnostic criteria for the disorder.
5. Treatment interventions single out those with high symptom levels or diagnosable disorders (Weisz et al., 2005).

An estimated 80% of students do not have behavioral or mental health issues, for whom universal interventions are sufficient. About 15% are considered at-risk candidates for selective strategies that often can be administered in group settings. About 5% require individualized interventions (Kutash et al., 2006). This coincides with findings that about 20% of children have a diagnosable disorder at any given time and that 5% have serious, ongoing disorders (Friedman, Kutash, and Duchnowski, 1996).

Less than one-third of children who need mental health services are receiving them. But Catron and Weiss (1994) discovered that when mental health services were introduced in a school setting, 98% of referrals obtained service, compared to 17% of students to traditional clinic-based programs. The school health system is often considered a “hidden system” of care. It is often not operated by traditional healthcare organizations, often not reimbursed by third-party payers, remains largely unscrutinized by major health research journals, and lacks clear and systematic guidance on services, finances, and outcomes. School health systems are often under-managed, inhibiting strategic thinking and outreach efforts for community collaboration (Lear, 2007).

SERVICE DELIVERY

Nationally, there are 99,000 counselors, 56,000 nurses, 30,000 school psychologists, 15,000 social workers, and a smattering of dental hygienists, dentists, physicians, and substance abuse counselors to attend to the total health needs of 50 million U.S. schoolchildren. In part because of increased state funding, school-based health centers have increased from fewer than 100 in the late 1980s to more than 1700 in 2005 (Lear, 2007). Indeed, a 1995 study concluded that schools function as the defacto mental health system for children and adolescents. Between 70 and 80%

of children with a mental health problem were seen by school personnel—usually guidance counselors and school psychologists—and for most of them school was the sole source of care. This certainly raises the question whether school personnel with limited mental health expertise can adequately meet the clinical demands of treating emotionally and mentally disturbed school children (Burns et al., 1995). In school-based health clinics, a mental health problem is the second most common complaint (Lear, Gleicher, St. Germaine, and Porter, 1991).

There are generally five formats by which SBMH services are delivered:

1. School-financed student support services—These include school psychologists, counselors, and social workers who attend to psychosocial and mental health problems, either centrally located in a district or based in schools.
2. School-district mental health unit—While a few U.S. school districts operate mental health units with clinic facilities, this mechanism usually takes the form of a school-based health clinic with mental health services as a significant element.
3. Formal connections with community mental health services—This can include agency personnel located in schools; a formal link to improve access and service coordination off-site; a formal partnership between the schools and the agencies, or contracting with community providers to supply needed services.
4. Classroom-based curriculum and special group intervention sessions—Most schools seek to promote appropriate social and behavioral conduct as part of their curriculums either as part of regular classroom content or as a special program conducted by specially trained personnel.
5. Comprehensive, multi-faceted and integrated approaches—A few school districts have blended their school support services with community resources and have integrated the

effort into instructional efforts to enhance healthy development (Adelman and Taylor, 2002).

Zins, Weissberg, Wang, and Walberg (2004) report a typical school approaches SBMH with 14 separate programs, most of which are not empirically based or do not reflect a cohesive strategy. Rather, each program is designed to attack a specific problem (Zins et al., 2004). School-based mental health also faces an uphill battle with convincing school administrators, who are already dealing with other imperatives and limited resources, that successful programs can positively impact academic achievement. Many school-based efforts exist largely because of grant-funding and dedicated, externally supplied mental health professionals (Kutash et al., 2006).

A national survey funded by the U.S. Center for Mental Health Services attempted to determine the problems encountered in U.S. schools and the mental health services provided.

Among the findings:

1. About 73% of the schools reported that social, interpersonal, or family problems were the most frequently encountered mental health problems.
2. The second and third most frequent problems for males were aggressive or disruptive behavior associated with neurological disorders. For females, the next highest-ranked problems were anxiety and adjustment issues.
3. All students, not just those in special education, were eligible to receive mental health services in 87% of schools.
4. About 20% of students on average received some type of school supported mental health services in the school year prior to the study.
5. Virtually all schools reported having at least one staff member whose responsibilities included providing mental health services. The most common types of school mental health

providers were school counselors, followed by nurses, school psychologists, and social workers. School nurses spent approximately a third of their time providing mental health services.

6. More than 80% of schools provided assessment for mental health problems, behavior management consultation, and crisis intervention, as well as referrals to specialized programs. A majority also provided individual and group counseling and case management.
7. Financial constraints of families and inadequate school mental health resources were the most frequently cited barriers to providing mental health services.
8. Almost half of school districts (49%) used contracts or other formal agreements with community-based individuals and/or organizations to provide mental health services to students. The most frequently reported community-based provider type was county mental health agencies.
9. One-third of districts reported that funding for mental health services had decreased since the beginning of the 2000–2001 school year, while over two-thirds of districts reported that the need for mental health services increased.
10. Sixty percent of districts reported that since the previous year, referrals to community-based providers had increased. One-third reported that the availability of outside providers to deliver services to students had decreased (Foster et al., 2005).

COST OF SERVICES

There is little reliable information regarding the cost of SBMH nationally. One estimate of mental health services for children in all settings was \$11.68 billion, or \$172 per child (Ringel and Strum, 2001). A national survey indicated that 58% of SBMH budgets were devoted by

paying staff salaries while 26% paid community-based organizations who supplied their services to schools (Foster et al., 2005).

A pilot program in a low-income, largely Hispanic neighborhood in New York City middle school, screened all students in grades 6–8 for anxiety, depression, and substance use disorders over a 3-year period. Students needing treatment were referred to the school-based treatment program, where social workers offered individual and group counseling. Screening costs ranged from \$106,000–\$172,000 and treatment cost ranged from about \$420,000–\$468,000. Screening costs per student ranged from \$149–\$234 while treatment costs were \$90–\$115 dollars per session (Chatterji, Caffray, Crowe, Freeman, and Jensen, 2004).

THREE DOMINANT SBMH MODELS

Kutash and colleagues identified three dominant models of SBMH in an attempt to explain the differences in approach: the Mental Health (MH) Spectrum, Interconnected Systems, and Positive Behavior Support (PBS) (Kutash et al., 2006).

The MH Spectrum (Figure 1) considers the range of services for children considered to have a mental or emotional disturbance, or to be at risk of developing one. The model draws heavily on the mental health field and is evidenced especially when SBMH is supplied by community mental health centers. They employ methods and technique traditions and psychological and behavioral training not necessarily specific to an educational setting. The focus is on diagnosable, specific mental health disorders, such as depression.

FIGURE 1. Mental health spectrum model. Reprinted with permission from Weisz, Sandler, Durlak, and Anton (2005). American Psychological Association. [PLACE FIGURE 1 HERE]

A second model is called Interconnected Systems (Figure 2), most forcefully advocated by the Center for Mental Health in Schools at UCLA and the Center for School Mental Health Assistance at the University of Maryland. UCLA's Adelman and Taylor (2004) argue that schools marginalize all efforts other than those designed to improve direct instruction and school management. *FIGURE 2. Interconnected systems for meeting the needs of all children. Used by permission from the School Mental Health Project, Dept. of Psychology.* [PLACE FIGURE 2 HERE] They call for a third, equally weighted component—called an enabling component—to address barriers to learning and promote healthy development to be firmly embedded in the schools' basic mission (Figure 3). They envision schools and communities weaving services and programs comprehensively to combat barriers to learning, personal development, parenting, and teaching. They contend that silo programs have been created to combat categorical problems such as substance abuse, violence, dropouts, delinquency, and teen pregnancy. The result competition for limited resources has created a lack of cohesiveness and prevents optimum effectiveness (Adelman and Taylor, 2002).

A third model is PBS, whose principles are grounded in using positive reinforcement and stimulus control to produce socially important behavior changes. Research has shown that PBS has been effective in reducing problem behavior and increasing learning capacity (Nelson, Martella, and Marchand-Martella, 2002). School-wide PBS seeks to create a positive school environment. The model assumes not all students have learned appropriate behavior to succeed in school. The universal approach is a prophylactic attempt to foreclose future discipline referrals and facilitate more specific interventions for students with disruptive behavior. To succeed, PBS requires the support of about 80% of the school staff to learn and implement the model (Kutash

et al., 2006). Horner, Sugai, Todd, and Lewis-Palmer (2000) identified several key aspects of an effective PBS plan: understand the ways the targeted children view the world and mold the message accordingly; systematically teach positive replacement behavior to replace those being expunged; reinforce the replacement behavior, while withholding reinforcement for undesirable behavior; and be systematically prepared for particularly intense episodes of inevitably aggressive behavior (Horner et al., 2000). *FIGURE 3. Moving from a two- to a three-component model for school improvement. Used by permission from the School Mental Health Project, Dept. of Psychology, UCLA. [PLACE FIGURE 3 HERE]*

CONCLUSION

With the emphasis on partnership and collaboration, school-based programs have the potential to benefit the children and families, schools, communities, and managed-care organizations. The provision of access and early intervention is cost-effective in the long run, and research indicates SBMH service is as effective as that of a community-based clinic. Collaboration, partnership, and bridging systems and cultures can create integrated systems of care.

There is a paucity of research—and obvious interest in—the cost of SBMH. Cost-benefit analyses would be particularly useful in demonstrating to school administrators an idea of potential return on investment. There is also a lack of documentation on the impact of the few fully integrated programs advocated by the UCLA and Maryland centers. These studies should demonstrate the incremental gains in academic achievement, if any, produced by the programs. There should be a greater exploration of migrating successful mental-health screening tools being used successfully in primary-care physician offices. Finally, as noted earlier, the school-

based health system is largely hidden from scrutiny by major health research journals and would benefit from guidance on services, finances, and outcomes.

There is ample evidence that there is an association between physical fitness and academic achievement. Reformers alarmed by rising child obesity have recited such evidence forcefully in successfully pursuing state and federal legislation to combat the problem. School-based mental health advocates have not enjoyed comparable success despite equally compelling evidence that early intervention raises academic achievement and forestalls greater problems in adulthood. Finally, there is an intersection of interests between the mental health community and schools that can advance the cause of SBMH. Mental health practitioners must align interventions with the chief concern of school administrators—academic achievement. Likewise, schools must realize that mental health strategies will improve instruction and academic achievement.

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