

School-centered approaches to improve community health: lessons from school-based health centers

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Executive Summary

For children to have the best chance of becoming productive and healthy adults, child-serving systems need to coordinate their care and services. Two sectors in particular, education and health, play critical roles in promoting better outcomes for child wellbeing and long-term success. Excluding the home, schools and child health systems have the most direct influence on a child's development. Yet, these two sectors often operate in silos, failing to leverage the resources accessible to each other, and so limiting their impact.

School-based health centers (SBHCs) are an example of how schools and the health care system can collaborate very effectively to address the complex health needs of students. However, the experience of SBHCs also underscores the challenges involved in such partnerships. These challenges range from misaligned missions of health and educational organizations, as well as incompatible financing systems and organizational cultures, to privacy and technical challenges associated with sharing student information.

To realize the full potential of SBHCs as school-health partnerships, steps need to be taken to address these challenges. Among them:

- *More studies of school-based health approaches are needed.*
- *Medicaid reimbursement rules should be refined.*
- *Public funding of SBHCs needs to be more flexible.*
- *Local businesses should partner with SBHCs to improve the use of technology and help with coordination.*
- *The guidance on federal laws governing information sharing requires updating.*
- *IRS requirements affecting hospital-community partnerships need clarification.*
- *Academic institutions and other local organizations should help facilitate collaboration.*

Behavioral Health and Education

The U.S. reports a staggering number of children and adolescents suffer with preventable emotional and behavioral health problems. Estimates consistently show that one in five children exhibit signs and symptoms of emotional or behavioral health problems severe enough to warrant clinical intervention.¹ Retrospective studies suggest that half of adults diagnosed with a mental illness can trace their first major symptom to age 14 and 75 percent of them to age 24.² These statistics underscore the importance of

providing early identification and treatment services to children and youth and the potential for altering lifetime trajectories.

The pervasive impact of trauma in childhood and its effect on wellbeing indicates the depth of the problem. Analyses of the National Survey of Children's Health³ found that parents of this nationally representative sample of youth reported more than half of adolescents experienced at least one adverse childhood experience (ACE), such as losing a loved one or having witnessed or been the victim of violence,

¹ Merikangas, et al., 2010.

² Kessler, et al., 2005.

³ Moore et al, 2014.

and nearly one in ten experienced four or more adverse experiences by their late teens.

These early experiences contribute to the obstacles many children face in completing their school years successfully, and school completion is a critical step in developing the skills needed to move up the economic ladder. Greater exposure to negative experiences has been associated with disengagement from school and lower academic performance as well as negative consequences later in life, such as poor adult health, emotional dysfunction, and higher rates of chronic disease and mortality.⁴

Poor social and environmental conditions may also serve to exacerbate vulnerabilities. Data from the National Center for Education Statistics in 2013, for instance, indicated that more than half of students in public schools now meet federal requirements for free and reduced lunch.^{5,6} The stressors associated with living in disadvantaged environments are linked to poor emotional and behavioral functioning among youth⁷ and also contribute to disparities in educational attainment and overall health.⁸ As a consequence of where they live and learn, these students are at heightened risk of exposure to adversity, for school dropout, and to an accumulation of barriers that limit their potential for success.

Why Offering Health Services in Schools Makes Sense

The primary mission of schools is to promote student academic achievement as a foundation for future attainment. But education

leaders and analysts increasingly recognize that many students cannot take full advantage of what is being taught in schools when they face a multitude of individual, familial, environmental, and social challenges. While these circumstances may place additional burdens on schools, they also suggest that schools themselves are well placed to help address these challenges.⁹ Although behavioral health problems are pervasive, studies reveal that up to 80 percent of students exhibiting these problems do not receive evaluations and care within the preceding year.¹⁰ Even fewer students with substance abuse problems are likely to obtain treatment (estimated at less than 10 percent).¹¹ Yet, the majority of those who seek and receive that care do so in schools.¹²

National movements to offer comprehensive mental health care in schools have flourished since the 1990s. In large part this is because of their ability to effectively reduce historical barriers to care, such as offering free or low-cost services, eliminating the need for transportation or to leave school/work to obtain services, and diminishing the typical fragmentation of care. These movements have also helped to reduce the stigma associated with receiving mental health support and to increase the capacity of educators and other adults in the school to identify and address emerging symptoms earlier.¹³

Seminal reports based on comprehensive reviews of empirical data have identified schools as promising settings for the prevention, early identification, and treatment of behavioral health problems due to schools' potential for providing access to consistent, high quality care.¹⁴ Although not always coordinated with other services offered in schools, many of these school-based programs,

⁴ Felitti, et al., 1998.

⁵ The National School Lunch Program is a federally assisted meal program operating in public and nonprofit private schools and residential child care institutions. Children from families with incomes at or below 130 percent of the poverty level are eligible for free meals. Those with incomes between 130 percent and 185 percent of the poverty level are eligible for reduced-price meals. Source:

<http://www.fns.usda.gov/sites/default/files/NSLPFactSheet.pdf>

⁶ Southern Education Foundation, 2015.

⁷ Rudolph, et al., 2013.

⁸ Masi and Cooper, 2006.

⁹ Horn, et al., 2015.

¹⁰ Katoaka, et al., 2002.

¹¹ Sterling, et al., 201.

¹² Costello, et al., 2014.

¹³ Weis, 1997 and Stephen, et al., 2007.

¹⁴ Office of Surgeon General, 1999.

both within and outside of the U.S., have yielded a number of positive behavioral health outcomes.¹⁵

For example, reviews of universal school-based strategies to prevent violence have been shown to be effective at all school levels, and studies have found these interventions also reduce student violent behaviors, lower truancy rates and improve school achievement, attention, social skills, and internalizing problems.¹⁶ It is true that studies of the impact of interventions provided to students experiencing greater risks, or presenting with clinical symptoms, are mixed,¹⁷ but when there has been better implementation and trained providers, empirical results are more consistently positive.

So while education systems were not designed to play a major role in addressing student health and social service needs, historically schools have in fact been well-utilized hubs for providing physical, behavioral, and social support for students and their families. Frameworks have developed to build on this function. One example is the Community School model in which partnerships are forged between local schools and community resources to integrate multiple services and create a network of support and opportunity for youth and families. Community Schools are increasing in popularity thanks to the growing evidence of their impact.¹⁸ The Communities in Schools model is a variant of the community school approach that utilizes intermediaries for the purpose of assessing needs and brokering relationships between the schools and community agencies. This latter model places trained site coordinators in schools to help build a network of support for students and their families. Such school-community approaches are now supported by numerous organizations, including federal agencies (such as the US Department of Education) and private foundations that promote

them as a way to help address barriers to learning and ultimately achieve better educational outcomes.

Building Capacity to Address the Depth of Need

Compelling arguments have been made that closing the achievement gap requires education systems to work with governmental and community-based partners to address the physical and emotional health needs plaguing many students.¹⁹ It is well understood that schools alone are not capable of addressing the complex needs presented by students and their families and that effective solutions require collaboration with health care networks, hospital systems, and community health providers. Moreover, the fiscal, political, and social drivers in health care frequently differ from those that drive decision-making and resource allocation in education. An example of where these challenges have been addressed, and the potential of school-based approaches to be realized, can be seen in school-based health centers.

What Are School-based Health Centers? (SBHC):

- SBHCs provide convenient, accessible, and comprehensive health care services to students in grades pre K-12 through partnerships between schools and sponsoring agencies utilizing an interdisciplinary health provider team co-located and integrated within the school setting.
- In addition to primary care services for acute and chronic conditions, SBHCs often provide services, such as mental health care, oral health care, health education, case management, substance use treatment, as well as screening and preventive interventions.

Refer to <http://www.sbh4all.org/resources/core-competencies>

¹⁵ Barry, et al., 2013.

¹⁶ CDC, 2007.

¹⁷ Roness and Hoagwood, 2000 and Farahmand, et al., 2011.

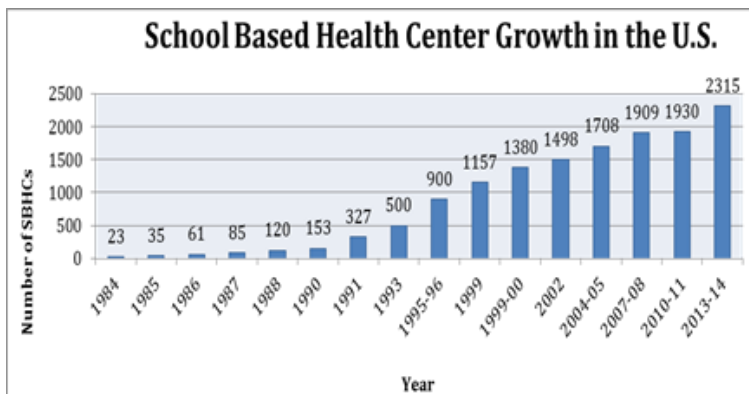
¹⁸ Frankl, 2016.

¹⁹ Basch, 2011.

School-Based Health Centers

Over the past 50 years, beginning with social innovations from the 1960s and 1970s, comprehensive service delivery models have been developed and tested in educational settings across the country. One such model, school-based health centers (SBHCs), promotes the delivery of an array of services to youth in a proactive, easily-accessible, and integrated manner, with an emphasis on linking youth and families to other community supports as necessary. Due in large part to funding from private philanthropy, state funding, and recent federal support for SBHCs, these centers have grown in number since the 1980s (See Table 1). A survey of the centers, administered by the School-Based Health Alliance, notes that SBHCs reach more than two million children and adolescents in over 2300 centers nationwide.²⁰

Table 1. School Based Health Center Growth in the U.S



Center for Health and Health Care in Schools and School-Based Health Alliance, <http://www.healthinschools.org/en/School-Based-Health-Centers/School-Based%20Health%20Center%20Growth.aspx>

The driving force behind the development of SBHCs was to ensure all students in public schools had access to primary care and preventive services.²¹ Today, SBHCs offer an expanded scope of care for students in public and public charter schools. In some locations, such as in the Denver Public Schools, SBHCs are open to all students regardless of where in the district they

²⁰ School-Based Health Alliance 2013-2014 Digital Census Report. Source: <http://censusreport.sbh4all.org>

²¹ Lear, 2007.

go to school. Within the same school district, a SBHC may serve students from multiple schools within a targeted neighborhood or may offer care only to students enrolled in that specific school building.²²

Types of Centers. SBHCs employ one of three general staffing profiles, all of which must include a medical professional.

- The most common profile includes a primary care provider (typically a nurse practitioner or physician assistant) offering an array of medical services to students enrolled in that SBHC.
- Another SBHC profile includes a primary care provider and a behavioral health provider (typically a clinical social worker or licensed counselor), who offer primary and behavioral health care to students in need.
- The most comprehensive SBHC profile includes primary care and behavioral health professionals who are joined by other providers, such as oral health providers, optometrists, or substance abuse counselors.
- Across this variety of SBHC profiles, health educators, case managers, or nutritionists frequently supplement the services offered to students. The availability of services will differ by professional availability, sponsor resources, and student needs.

The primary recipient of SBHC medical services is the enrolled student. But in many cases some care is made available to siblings or parents of that child, especially if that care is likely to enhance outcomes for the student of concern. For example, *Linkages to Learning*, the SBHC program operating in seven public schools across

²² See: <http://www.denverhealth.org/medical-services/primary-care/our-services/school-based-health-centers/our-locations>

Montgomery County in Maryland encourages participation in family therapy or in parenting classes, and the SBHCs link parents to social services such as workforce training, housing support, or financial services to help stabilize and empower the family. In addition, in this county undocumented siblings of enrolled students can receive their medical care, including preventive care, such as physicals or immunizations, in the SBHC.²³

School-based tele-health is an emerging model of care that has linked technology to SBHCs to build the capacity of and access to qualified providers in health professional shortage areas. Rural and frontier areas of the US have demonstrated the value of tele-health while removing the barriers of distance and time by connecting hospital-based or community-based medical providers to remote locations. Urban areas are also exploring the potential benefits of school-based tele-health initiatives given their apparent cost-effectiveness, but funding and operational challenges hinder their growth. Tele-psychiatry has been especially promising in making psychiatric care accessible to those living in areas with extremely limited numbers of child psychiatrists.

Organization and Funding. While SBHCs are located within schools, typically they are not fully integrated with schools in an organizational or funding sense, but normally are sponsored by a community health institution, such as a community hospital or neighborhood health center. SBHC personnel are not employed by the school, but through the sponsoring health care institution, and therefore the centers are not often funded through school budgets. This health care institution typically is responsible for providing the personnel and other costs associated with the centers. So the administrative and funding arrangements result in programs operated by entities that may

²³ Source: <http://www.montgomeryschoolsmd.org/uploadedFiles/LTLStratPlan-2015.pdf>

have distinctly different organizational and budgetary goals than apply to, say, school nurses.

For the more than 2,300 SBHCs in operation, numerous partnerships exist between sponsoring health providers (including hospitals, Federally Qualified Health Centers (FQHCs), public health departments, community health and/or behavioral health agencies, etc.) and schools. Over the last decade, FQHCs and community health centers have become the most common sponsor of SBHCs, whereas partnerships with hospitals systems had previously been more widespread. Thus, although in 2001-2002, 32 percent of SBHC sponsors were hospitals or academic medical centers, the latest census indicates that substantially fewer hospitals have been forging or maintaining partnerships with schools to operate SBHCs than in prior years (now 19 percent of the sponsors). Currently, just over 100 hospital systems sponsor approximately 330 SBHCs (of the 2300) across the country.²⁴

Two long-standing hospital systems, Baltimore Medical System in Maryland (staffing SBHCs since 1987 and now sponsoring seven SBHCs in Baltimore City) and Advocate Health Care in Illinois (which opened its first SBHC in 1996 and now utilizes their three SBHCs as training sites for residents in adolescent medicine and community-oriented primary care) are good examples of this partnership arrangement. In general, sponsorship entails the deployment of professionals from the clinical work setting (e.g. a hospital or community center) to the schools in which services are provided in a coordinated fashion to students whose parents or guardians consent to the provision of care in schools.

Sponsors of SBHCs have had to look to multiple sources of funding to maintain service levels in their schools. State funding for SBHCs has been a key source of support, with approximately 70 percent of SBHCs receiving state dollars to aid with operations. Of these state dollars, general funds represent the largest

²⁴ Source: <http://censusreport.sbh4all.org/>

funding source (8 percent of total SBHC funding), followed by federal Title V Maternal and Child Health Services Block Grant money awarded to states. In states with strong SBHC advocacy, state Medicaid officials have changed state plans to reflect their support of SBHCs, such as defining them as eligible provider types, waiving preauthorization for SBHCs or for specific services they provide, or requiring Managed Care Organizations to reimburse or contract with SBHCs.²⁵

Approximately one third of SBHC administrators report financial support from their school district and another third receive county or city government funding, such as local levies or property taxes. Meanwhile, almost all SBHCs have business models that also rely on patient revenue, either through third-party insurers or patient fees, with 90 percent of SBHCs seeking reimbursement for services from public and private health insurers. Medicaid constitutes the largest patient-related revenue source, which is perhaps unsurprising given their presence in low-income communities.²⁶ While fee-for-service remains the standard payment method for SBHCs (78 percent), some centers receive monthly or annual capitated payments for primary care (35 percent) or for care coordination (19 percent), or “pay for performance” supplements (27 percent). Although these payment systems create an incentive to effectively utilize the school connection, the traditional billing infrastructure for most SBHCs produces a reliance on more transactional forms of payment.

Besides patient revenues, federal grants remain an important supplemental source of funding for SBHCs, especially for non-reimbursable, prevention-related costs. In 2010, through the Patient Protection and Affordable Care Act (ACA), Congress appropriated \$200 million for fiscal years 2010-2013 for the

construction, modernization, and equipment needs of SBHCs. While SBHC advocates celebrated this federal support as a significant step forward, disappointment remained that these funds could not also be used to pay for the provision of services.

Outcomes. Regardless of staffing configuration or breadth of services, SBHCs have improved access and eliminated many barriers to physical and behavioral health care, as well as reduced emergency room visits and health care costs.²⁷ This is especially true for students exhibiting high-risk behaviors²⁸ and those known to underutilize health services, such as ethnic minority youth and boys.²⁹

The impact on utilization can be quite dramatic, with some studies reporting youth were 10 times more likely to utilize SBHC services for behavioral health needs than to visit traditional medical sites or even community health centers.³⁰ In addition to improving access to care, SBHC services have been shown to lead to better health and education outcomes.³¹ Evidence of their ability to promote health equity has been substantial enough such that the Community Preventive Services Task Force recommends implementing school-based health services nationwide, particularly in low-income communities.³²

Endorsements of SBHCs have come from multiple levels of government. Federal government agencies, for instance, have encouraged greater integration between health and education systems and the increase of SBHCs. Through a letter from the U.S. Department of Health and Human Services (HHS) and Education (ED), agency officials recently identified a number of “high impact opportunities” to ensure success for children and youth through

²⁵ Source: <http://www.sbh4all.org/school-health-care/aboutsbhcs/school-based-health-care-state-policy-survey>

²⁶ Source: <http://www.sbh4all.org/school-health-care/school-based-health-care-financing>

²⁷ USDHHS, 2015.

²⁸ Bains and Diallo, 2016.

²⁹ Sterling, 2012.

³⁰ Weinstein, 2006

³¹ Strolin-Goltzman et al., 2014.

³² Community Preventive Service Task Force, 2016.

stronger connections between health and education. The letter included a joint recommendation to chief state school officers and state health officials to “build local partnerships with school-based health centers or developing partnerships with local non-profit hospitals based on specific community health needs”.³³ In spite of the robust evidence of impact, economic evaluations of the fiscal savings attributed to SBHCs are scant.

Challenges and Opportunities

The experience of SBHCs highlights the potential of integrated health and education partnerships to make significant contributions at individual, school, and community levels. However, these experiences also point to some of the challenges that health care and school partnerships face, impeding the ability of school-community approaches to grow and prosper. The most important challenges are associated with misaligned missions, limited financing, confusion about privacy and information sharing, and difficulties inherent in cross-sector collaboration.

Misaligned Missions. Unlike SBHCs that were developed using mainly public health models aimed at improving child health outcomes,³⁴ hospital systems operate as businesses that must be highly attuned to meeting a financial bottom line. Thus, it is usually difficult for hospitals to support activities outside their walls unless it leads to revenue or reduced costs. For instance, readmission penalties imposed by Medicare encourage hospital investments in community supports for elderly patients, but these penalties do not affect children and, moreover, generally do not trigger long-term prevention strategies in conjunction with the community.³⁵ A recent news

³³ Source: <http://www.hhs.gov/healthcare/facts-and-features/factsheets/hhs-and-ed-partner-develop-toolkit-support-healthy-students.html>

³⁴ Lear et al., 1991.

³⁵ Source: <http://www.brookings.edu/research/opinions/2015/11/12-can-hospitals-create-healthy-neighborhoods-butler>

story about the Nemours child health care system in Delaware illustrates how a large hospital system felt compelled to eliminate their community outreach and prevention-oriented programs precisely because they were not revenue-generating initiatives.³⁶

Given the weak or negative business incentive for hospitals to support SBHCs and similar forms of community outreach, a more promising development might be the direct legal requirement for some hospitals to invest in their communities. One such requirement was enacted as part of the ACA wherein non-profit hospitals that claim 501(c)(3) tax-exempt status must now conduct a Community Health Needs Assessment (CHNA) at least every three years and—importantly—invest in strategies to address the community’s most pressing needs. The CHNA pushes hospitals to identify intersections where schools can help health systems meet community benefit mandates catalyzing partnerships between the health system, local public school districts, and other community organizations to undertake investments and coordinated solutions. For example, Indianapolis-based Community Health Network, a non-profit health system with more than 200 sites throughout central Indiana, used findings from their CHNA to inform a decision to dedicate community benefit dollars to help establish school-based clinics across the area.³⁷ The same can be said of the Henry Ford Hospital System in Detroit which complied with CHNA requirements by helping to establish and broadly communicate outcomes associated with the SBHCs in the system’s local school district.

These health and education system partnerships have broad benefits. They do not simply improve access to care, particularly to specialty care, but can also begin to chip away at the social and environmental determinants that

³⁶ Source: <http://www.delawareonline.com/story/news/2016/01/08/nemours-restructures-operations/78525104>

³⁷ Source: <https://www.ecommunity.com/s/community-benefit/community-health-needs>

prevent children and their families from maintaining good health. Some medical systems have this as a key part of their mission. For example, Montefiore Medical Center, a large health system located in the Bronx area of New York City, has a strong tradition of improving clinical outcomes by targeting efforts to strengthen community health and wellness. Montefiore's community health strategy is driven by a belief that environmental factors have a significant impact on residents' health and that access to high-quality care is key to securing this outcome.³⁸ Montefiore's commitment has led to the development of one of their signature programs, the Montefiore School Health Program, the largest comprehensive school-based health center program in the United States. The program currently operates in 22 locations serving 74 elementary, middle and high schools across the Bronx and offers a full array of services from general adolescent health services and asthma care, to behavioral health, dental care, nutrition, and fitness education.³⁹

Financing Alignment Issues. Regardless of available funding sources, SBHCs are not known as revenue-generating endeavors and can appear to be costly ventures if such things as long-term savings associated with student health and academic improvements are not considered in the calculation of a return on investment. Indeed, a general concern for health and school partnerships is whether the incentives and investment and payment stream related to the funding model are aligned with the long-term objectives of the partnership, in this case providing health services so that a student is treated for conditions that can cause his or her health to decline over time, allowing for a better educational outcome for that student. This is a common problem with community-based partnerships. When the broad and long-term impacts are not fully taken into account in the funding cycle, and

the structure of payments and funding is not aligned to these broader impacts, the investment in the partnership tends to be well below the level needed for greatest efficiency.

As noted earlier, SBHCs typically receive funding from outside the school system. The advantage of this is that the centers do not have to compete directly with education programs for the same stream of dollars, unlike, for example, school nurses employed by the school district and who may face reductions in force when district budgets are cut. On the other hand, when funding comes from a non-school source with a primary focus on student health rather than education needs, there can be competition for attention within the school. It also means that the long-term economic, educational, and social value of improving the health of students is not necessarily the focus of return-on-investment decisions for SBHCs.

SBHCs rely heavily on reimbursement from third-party payers, particularly Medicaid, for services provided. This can have some downsides, such as services being deemed ineligible because they are delivered in school settings and reimbursement rates not covering full costs associated with delivering comprehensive care. Case studies of successful school behavioral health finance approaches do offer some promising directions, such as proactively meeting with representatives from the third party payers, developing a process for resolving billing and reimbursement issues before they emerge, and maintaining open lines of communication with key financial administrators from partner organizations.⁴⁰ But regulatory issues associated with school health programs continue to create hurdles.

Clashing goals. Recently a major hurdle to SBHCs' ability to secure Medicaid reimbursement for care was reduced when the federal Medicaid office clarified its position on the "free care" rule, a

³⁸ Source: <http://www.montefiore.org/inspired-december-2012>

³⁹ Source: <http://www.montefiore.org/school-health-program>

⁴⁰ Behrens, et al., 2012.

Medicaid regulation that had been seen as a significant barrier to securing reimbursement in many jurisdictions. The rule prevented schools and qualified providers offering care in schools (such as school nurses or clinicians employed by sponsors of SBHCs) from seeking Medicaid reimbursement for services rendered to eligible beneficiaries if the same services were provided to other students for free. The aim was to make sure Medicaid was not essentially cross-subsiding the provision of services to non-Medicaid students. But without the opportunity to seek Medicaid funding, for instance because some children had private health insurance coverage, many school-based providers in disadvantaged areas were financially unable to deliver or maintain services for students in a school setting. Fortunately, in response to this unintended consequence, the Center for Medicare and Medicaid Services (CMS) published guidance late in 2014 to explain that the free care rule does not apply to school-based care. The guidance outlined that Medicaid reimbursement is available for covered services under the approved state plan for Medicaid beneficiaries, regardless of whether there is any charge for the service to the beneficiary or the community at large.⁴¹

The free care rule issue illustrates how goals can clash within a partnership when the objectives of two sectors do not seamlessly connect. The opportunities for sustaining SBHCs are dictated by details in the state Medicaid plan, which means solutions will differ across states. The same is true of private and nonprofit health funding. For example, it might make sense in principle for larger hospital systems with an emphasis on children and a presence in multiple states (such as the Nemours Children's Health System) to support the costs associated with operating SBHCs. But they are also structured and required to meet national standards tied to accreditation that may not easily accommodate

this state-by-state variability that will directly affect their revenue potential. Moreover, incurring the cost of funding a separate institution in the school, without a direct return or visible saving to the hospital, can be hard for the chief financial officer to justify.

Prevention services. For prevention services offered through SBHCs a significant problem is that traditional payment structures do not reimburse for many preventive interventions. As a result, SBHCs have to be creative in securing funding streams that support their full range of services. But that strategy can lead to uncertainty in funding, especially if the rules governing sources are unclear. Consider one important source of funding, namely federal education funding authorized by the Elementary and Secondary Education Act (ESEA). Officially this Act has been used to support health-related prevention interventions offered in schools. Indeed, a funding guide of the top fifteen ESEA-funded programs, with explicit or implicit authority to support implementation of evidence-based programs in school settings, was developed to address the scarcity of funding for prevention and population-based approaches.⁴² Moreover, the recent reauthorization of ESEA, now called the Every Student Succeeds Act (ESSA), gives state education agencies greater latitude in how federal dollars can be used and signals the potential for leveraging other block grant dollars that may be available at the state level. Still, no one funding source has proven sufficient to maintain a full array of support provided through SBHCs, and guidance on how to blend or braid funding, either across sectors or levels of government, is hard to find. Without explicit direction administrators are unlikely to consider innovative financing strategies that may lead to accusations of misappropriation of funds.

⁴¹ Although school health advocates applauded this action by CMS, the implications of rule clarification are not yet fully understood, and its impact has yet to be fully realized.

⁴² Stark, et al., 2014.

Sharing Patient Information. Sharing health and educational data across systems and providers is essential to effective planning, monitoring, and care coordination. As indicated by the latest SBHC census, the majority of SBHCs now use Electronic Health Records (EHR) to document care, coordinate services within and outside of the SBHC, and exchange information with relevant partners. Improvements in physical infrastructure in schools and development of hundreds of EHR software programs have helped drive down the costs of these data systems and make them more accessible to cash-strapped organizations. On the other hand, the increasing number of software programs brings with it its own challenges. Hospitals are made up of various facilities, specialty offices, and business units and so choose an EHR, not just to track patients' health, but also to augment billing capacity, achieve high-level record keeping, and help meet compliance regulations. Unfortunately, the goals for a hospital system may conflict with the primary reason administrators in other health care settings choose an EHR, such as to better integrate care and improve patient outcomes.⁴³

Additionally, interoperability issues inherent in many health information systems mean providers across systems often cannot easily share information. This can be a particular problem with an SBHC that is managing a student population that sometimes requires different information needs from that of a hospital. The consequence of this communication mismatch is acutely evident when students return to school following a health crisis that resulted in hospitalization. Unfortunately, discharge planning rarely involves the school professionals who are best positioned to ensure the successful reintegration of the child back to the school environment. Primary barriers to this reintegration include a failure to share discharge instructions (i.e., as they relate to medications, side effects, or medical contacts) with school health professionals

⁴³ Source: <http://healthaffairs.org/blog/2014/12/16/the-strategic-challenge-of-electronic-health-records>

who may not be regarded as the student's primary care provider.

In addition to the technical issues that may prevent health and education systems from communicating important information, legal and ethical issues with information sharing also pose challenges to SBHCs. SBHCs are located in settings (schools) where student educational records are governed by FERPA (The Family Educational Rights and Privacy Act),⁴⁴ and where parents have the right to access information in their child's educational record (even if the information is health-related). Meanwhile, health records created by SBHC staff are subject to the Health Insurance Portability and Accountability Act (HIPAA) Privacy Rule as with traditional primary care settings. This poses obstacles for SBHC personnel seeking to discuss cases with teachers and school administrators and is further complicated when teaming approaches promoted by SBHCs generate or disclose information where both school-hired and hospital-hired professionals are working together to address a student's needs.

Since 2008 the federal Department of Education and the Department of Health and Human Services have tried to improve communication, for instance by disseminating the *Joint Guidance on the Application of the Family Educational Rights and Privacy Act (FERPA) and the Health Insurance Portability and Accountability Act of 1996 (HIPAA) to Student Health Records*. However, confusion remains about which law applies around disclosing information, issues of confidentiality, privilege, and consent—especially when student-centered plans are developed and implemented by multidisciplinary teams.⁴⁵

Differences in Organizational Cultures. Even if legal and practice obstacles were eliminated, simply bringing together two systems with such

⁴⁴ 20 USC. § 1232g; 34 CFR Part 99.

⁴⁵ Source: <http://www2.ed.gov/policy/gen/guid/fpco/doc/ferpa-hipaa-guidance.pdf>

distinct organizational cultures makes collaboration and integrated care difficult to achieve. The most dedicated primary care or behavioral health providers can experience “culture shock” when they recognize that working in schools means practicing health care in nontraditional ways by proactively and continually engaging multiple stakeholders outside the clinic walls.

One way to address the challenge of linking two very different organizations together is by introducing an intermediary as an institutional bridge and to carry out certain technical functions that are not the strength of either institution.⁴⁶ Indeed, useful frameworks and resources do exist to help bridge the divide between SBHC providers, educators, and others. Proven partnership models such as PROSPER (PROmoting School-community-university Partnerships to Enhance Resilience) have brought together public school systems with university-based researchers and other community providers and service agencies to enhance development and improve health through the implementation of evidence-based programs. In this case, the approach has partners form small, strategic teams that are supported by university researchers to ensure the teams adhere to the highest implementation standards, therefore increasing the likelihood of positive results. Until recently the PROSPER Network Organization did not readily engage comprehensive health systems, but a pilot project is currently underway that includes involvement of one to three leading hospitals in each participating state. The effort seeks to expand positive adolescent and family health impacts through the community benefit requirements of the ACA, however preliminary findings are not yet available.⁴⁷

Web-based tools are also available to support community partners through a development process to facilitate long-term sustainability of school-connected interventions,

such as SBHCs. One such tool, *Partner Build Grow*, also referred to as the Action Guide,⁴⁸ provides guidance to school administrators, program directors, hospital leaders, and other stakeholders on how to work collaboratively to map community assets, illuminate the policy advocacy steps necessary to mobilize key allies, develop a call to action based on knowledge of existing resources, and access viable financing and regulatory approaches. The resource is being used by a cohort of five pediatric hospital systems partnering with community organizations and schools to coordinate efforts and address the root causes of adversity and toxic stress pervasive in communities through a project called the Building Community Resilience (BCR) collaborative.⁴⁹

Recommendations for Action

By linking school students and their families to the broader health system, School-Based Health Centers play an important role in building a culture of health in communities. But as noted, they face obstacles in achieving their full potential. By taking a number of steps, however, policymakers can help these collaborative models of health care realize broader public impact.

1) Fund more studies to examine the cost-effectiveness of innovative school-based delivery models like SBHCs to help build the case for adopting school-community approaches supporting student health and academic achievement. There is strong evidence on the effectiveness and impact of these approaches, yet more studies are needed to improve our understanding of their broader economic and social value and the optimal design. It’s true that studies using randomized designs would allow even stronger conclusions to be drawn about their causal effects, but these study designs are very difficult to undertake given how SBHCs are implemented in the real

⁴⁶ Horn, et al., 2015.

⁴⁷ Source: <http://helpingkidsprosper.org>

⁴⁸ Source: <http://actionguide.healthinschools.org>

⁴⁹ Source: <http://movinghealthcareupstream.org>

world. On the other hand, research on cost savings, benefit-cost analyses, or return on investment studies does not exist and is sorely needed to show policymakers the broad value of SBHCs and to make the budgetary case. Private philanthropy and government should support economic evaluation research in order to help make the financial case about the value of SBHCs. The findings from such studies would help improve and expand financial support, training, and technical assistance for SBHCs to enhance results and ultimately reduce the costs associated with poor education and health status. In addition to supporting research, private philanthropy can also play a catalytic role by funding the dissemination of economic evaluation results to state and local decision-makers who allocate both financial and non-financial resources across their jurisdictions.

2) Identify the barriers to reimbursement of school-based health services in state Medicaid plans and develop a set of strategies to improve the revenue available for effective school-based health care. There are numerous possible methods for systematically examining pathways for improving public financing of SBHCs, and policy research organizations as well as government researchers can thus help encourage the spread of SBHCs. One way would be to conduct a landscape assessment of existing state laws and regulations to identify relevant policy levers across multiple states. Another would be for researchers to inquire about the knowledge that state Medicaid directors have of the “free care” rule as it pertains to schools and to educate them of changes that may be required to fully implement this new guidance. An additional approach would be to identify successful locations where progress on Medicaid reimbursement has been achieved and interview stakeholders about good strategies for others to follow. Meanwhile the Center for Medicare and Medicaid Innovation could support testing novel health care payment structures for

entities partnering with school systems to deliver health care services.

3) Allow greater flexibility in the use of public funding to promote the expansion and maintenance of comprehensive SBHCs. To address siloed funding that makes partnerships difficult, steps are needed to bring together a variety of funding sources to support multiple interventions. These can be combined from different sources (known as “blended funding”) or woven together while maintaining separate reporting and accountability processes (known as “braided funding”). Examples of such strategies used to advance school-connected prevention interventions in local communities are limited but growing.⁵⁰ The federal government has taken a few welcome steps. For instance, the Consolidated Appropriations Act (of 2014, 2015, & 2016) has authorized the pooling of discretionary funds from various federal streams to be used to test innovative, outcome-focused strategies. Like the Performance Partnership Pilots (or P3), designed to allow states and localities the flexibility to improve outcomes for disconnected youth,⁵¹ a similar approach could be used to blend federal dollars to improve access to quality physical and behavioral health care for school-aged youth.

Private philanthropy can complement the actions taken by Congress by convening finance experts and financial officers from state and local government agencies to help map innovative financing strategies from pooled funds. Another approach, led by the public sector, would be for states to replicate the state of Maryland’s use of county level local management boards. These are public or nonprofit bodies that can receive funding from multiple agencies, as well as the private sector, and contract with community institutions to provide a range of services.⁵²

⁵⁰ Acosta Price, 2015.

⁵¹ See <http://youth.gov/youth-topics/reconnecting-youth/performance-partnership-pilots/fact-sheet>

⁵² Rozansky, 2011.

4) Encourage SBHC partnerships with private businesses to foster technological innovations in school health, such as EHRs or school-based tele-medicine programs, in order to improve coordination of care and extend reach to hospital-based specialists. Business leaders and other stakeholders can serve as fruitful allies in the promotion of SBHCs, particularly when interventions to improve the well-being of youth make a productive and healthy future workforce more likely. Furthermore, corporate foundations, such as those in the technology or communications fields, should consider investing in advancements in SBHC infrastructure development that could address the interoperability challenges currently limiting effective communication between and among providers of care.

5) Update guidance on the federal laws governing information sharing in SBHCs. The 2008 *Joint Guidance* document in FERPA and HIPAA, issued by the federal Department of Education and the Department of Health and Human Services, began to clarify policies and practices concerning the disclosure of information from student health records created by SBHC staff.⁵³ Consequently, some communities have developed shared consent processes to proactively address concerns about confidentiality and to avoid them from becoming barriers to collaboration. However, the diversity in sponsorship arrangements, the growth of school-based tele-medicine programs, and the continued use of SBHCs as medical training sites mean it is time to update the guidance. Thus the Department of Health and Human Services and Department of Education should issue new guidance on practices involving confidentiality, consent, and information-sharing issues. Furthermore, these federal departments should help local efforts by

identifying and promoting best practices for data sharing across sectors to improve outcomes without compromising student or family privacy.

6) Clarify the guidance in using nonprofit hospital funds for community-based health partnerships. The Community Health Needs Assessment (CHNA) is intended to encourage nonprofit hospitals to assess health needs in the community and invest in addressing them. School health services are considered community health improvement and thus constitute a community benefit. But the guidance and regulations for the CHNA, which are issued by the Internal Revenue Service (IRS), are still unclear about the use of funds for community partnerships.⁵⁴ As a way to encourage more hospitals to sponsor SBHCs as part of their demonstrated community benefit, the IRS should clarify the policy and explicitly recognize such partnerships as a highly valuable form of community health improvement.

7) Encourage multi-sector collaborations that include members of hospital and education systems. Community leaders working to build bridges across sectors have demonstrated their success at reducing fragmentation and duplication of care and, as a result, have freed up resources to assist more people. Although working together to address jointly developed goals is ideal, collaboration across systems is still not easily achieved. Academic institutions are among those that can help. They can serve as important intermediaries in support of this process by facilitating the implementation of best practices in partnership development and by helping to build up the technical capacity of community based organizations. Private and public funders should support the use of such intermediaries to enhance the development of strong school-health partnerships.

⁵³ Source:
<http://www2.ed.gov/policy/gen/guid/fpco/doc/ferpa-hipaa-guidance.pdf>

⁵⁴ Rosenbaum, 2016.

Conclusion

There is growing recognition that strong partnerships between education and health systems allow both entities to better meet their respective objectives while strengthening opportunities for youth to achieve better lifelong outcomes. When the education system is enlisted as a meaningful partner in the implementation of community-wide efforts to promote healthy development, they facilitate the delivery of accessible, effective, and integrated prevention and intervention supports to students who need them most. SBHCs represent one important model of education-health care collaboration that has improved child health and education

outcomes in many communities. Yet, SBHC growth has been limited by barriers that undermine their appeal to more established hospital systems. Federal, state, and local policies that help overcome these challenges can create environments where school-health care partnerships can become fruitful investments that yield benefits for many.

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References

- Acosta Price, O., (2015). "Financing and Funding for Social and Emotional Learning Initiatives." In J. Durlak, T. Gullotta, C. Domitrovich, P. Goren, & R. Weissberg (Eds), *The Handbook of Social and Emotional Learning*, New York, NY: Guilford Publications, Inc.
- Montefiore (2012). Advancing Community Health. *Inspired*, 2(2), 4-9. Retrieved from <http://www.montefiore.org/inspired-december-2012> .
- Bains, R.M., & Diallo, A.F. (2016). Mental health services in school-based health centers: Systematic review. *Journal of School Nursing*, 32(1) 8-19.
- Barry, M.M, Clarke, A.M., Jenkins, R., & Patel, V. (2013). "A systematic review of the effectiveness of mental health promotion interventions for young people in low and middle income countries." *BMC Public Health*, 13, 835. Retrieved from <http://www.biomedcentral.com/1471-2458/13/835>.
- Basch, CE. (2011). "Healthier students are better learners: A missing link in school reforms to close the achievement gap." *Journal of School Health*, 81, 593-598.
- Behrens, D., Lear, J., & Acosta Price, O. (2012). *"Developing a business plan for sustaining school mental health services: Three success stories."* Washington, DC: Center for Health and Health Care in Schools.
- Centers for Disease Control and Prevention (CDC) (2007). "The Effectiveness of Universal School-Based Programs for the Prevention of Violent and Aggressive Behavior: A Report on Recommendations of the Task Force on Community Preventive Services." *MMWR*;56 (No. RR-7):[1-14].
- Center for Health and Health Care in Schools (2015), "School-Based Health Center Growth." Retrieved from: <http://www.healthinschools.org/en/School-Based-Health-Centers/School-Based%20Health%20Center%20Growth.aspx>.
- Community Preventive Services Task Force. "School-based health centers to promote health equity: Recommendation of the Community Preventive Services Task Force." *American Journal of Preventive Medicine* 2016;51(1):127–8. Retrieved from: <http://www.thecommunityguide.org/healthequity/education/he-ajpm-recs-sbhc.pdf>
- Costello, E.J, He, J., Sampson, N.A., Kessler, R.C., & Merikangas, K.R. (2014). "Services for adolescent with psychiatric disorders: 12-month data from the National Comorbidity Survey- Adolescent." *Psychiatric Services in Advance*, 65(3), 359-66.
- Farahmand, F. K., Grant, K. E., Polo, A. J., & Duffy, S. N. (2011). "School-Based Mental Health and Behavioral Programs for Low-Income, Urban Youth: A Systematic and Meta-Analytic Review." *Clinical Psychology: Science and Practice*, 18(4), 372-390.

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- Felitti, V.J., Anda, R.F., Nordenberg, D., Williamson, D.F., Spitz, A.M., Edwards, V., & Koss, M. P. (1998). "Relationship of childhood abuse and household dysfunction to many of the leading causes of death in adults: The Adverse Childhood Experiences (ACE) Study." *American Journal of Preventive Medicine*, 14(4), 245-258.
- Frankl, E. (2016). "Community Schools: Transforming Struggling Schools into Thriving Schools". Brooklyn, NY: Center for Popular Democracy. Retrieved from <https://populardemocracy.org/news/publications/community-schools-transforming-struggling-schools-thriving-schools>.
- Horn, M., Freeland, J., and Butler, S.M. (2015). "Schools as Community Hubs: Integrating Support Services to Drive Educational Change." Washington, DC: The Brookings Institution.
- Kataoka, S.; Zhang, L., and Wells, K. (2002). "Unmet need for mental health care among U.S. children: Variation by ethnicity and insurance status." *American Journal of Psychiatry*, 159(9), 1548-1555.
- Kessler, R.C., Berglund, P, Demler, O., Jin, R., Merikangas, K.R., and Walters, E.E. (2005). "Lifetime prevalence of age-of-onset distribution of DSM-IV disorders in the National Comorbidities Survey replication." *Arch Gen Psychiatry*, 62, 593-602
- Lear, J. G. (2007). "Health at school: A hidden health care system emerges from the shadows." *Health Affairs*, 26(2), 409-419.
- Lear, J. G., Gleicher, H. B., Germaine, A. S., and Porter, P. J. (1991). "Reorganizing health care for adolescents: The experience of the school based adolescent health care program." *Journal of Adolescent Health*, 12(6), 450-458.
- Masi, R. and Cooper, J. (2006). *Children's Mental Health: Facts for Policymakers, National Center for Children in Poverty*. New York, NY: National Center for Children in Poverty. Retrieved from http://www.nccp.org/publications/pub_687.html.
- Merikangas, K. R., He, J. P., Burstein, M., Swanson, S. A., Avenevoli, S., Cui, L., Benjet, C., Georgiades, K. and Swendsen, J. (2010). "Lifetime prevalence of mental disorders in US adolescents: results from the National Comorbidity Survey Replication–Adolescent Supplement (NCS-A)." *Journal of the American Academy of Child & Adolescent Psychiatry*, 49(10), 980-989.
- Moore, K., Sacks, V., Bandy, T., and Murphey, D. (2014). "Fact Sheet: Adverse Childhood Experiences and the Well-Being of Adolescents." Publication #2014-32. Washington, DC: Child Trends.
- O'Connell, M. E., Boat, T., and Warner, K. E. (Eds.). (2009). *Preventing Mental, Emotional, and Behavioral Disorders Among Young People: Progress and Possibilities*. National Academies Press.
- Office of the Surgeon General. *Mental Health: A Report of the Surgeon General*. Report of the Surgeon General, Rockville: National Institute of Mental Health (U.S.), 1999.
- Rones, M. & Hoagwood, K. (2000). "School based mental health services: A research review." *Clinical Child and Family Psychology Review*, 3(4), 223-241.

-
- Rozansky, P. (2011). *Maryland's Local Management Boards, January 2011*. Retrieved from http://communitypartnerships.info/wp-content/uploads/2014/05/MD_LMB_Jan_2011.pdf.
- Rosenbaum, S. (2016). "Hospitals As Community Hubs." Washington, DC: The Brookings Institution.
- Rudolph, K. E., Stuart, E. A., Glass, T. A., & Merikangas, K. R. (2014). "Neighborhood disadvantage in context: the influence of urbanicity on the association between neighborhood disadvantage and adolescent emotional disorders." *Social psychiatry and psychiatric epidemiology*, 49(3), 467-475.
- Stark Rentner, D. & Acosta Price, O. (2014). "A Guide to Federal Education Programs That Can Fund K-12 Universal Prevention and Social and Emotional Learning Activities." Washington, DC: Center for Health and Health Care in Schools & Center on Education Policy. Retrieved from <http://www.healthinschools.org/School-Based-Mental-Health/Funding-Guide-for-SEL.aspx>.
- Stephan, S. H., Weist, M., Kataoka, S., Adelsheim, S., & Mills, C. (2007). "Transformation of children's mental health services: The role of school mental health." *Psychiatric Services*.
- Sterling, S., Valkanoff, T., Hinman, A., & Weisner, C. (2012). "Integrating substance use treatment into adolescent health care." *Current psychiatry reports*, 14(5), 453-461.
- Strolin-Goltzman, J., Sisselman, A., Melekis, K., & Auerbach, C. (2014). "School-Based Health Center Use, School Connection, and Academic Performance." *Health & Social Work*, 39(2), 83-91.
- Southern Education Foundation. (2015). "A New Majority: Low Income Students Now a Majority in the Nation's Public Schools." *Research Bulletin*. Atlanta, GA: Author. Retrieved from <http://www.southerneducation.org/Our-Strategies/Research-and-Publications/New-Majority-Diverse-Majority-Report-Series/A-New-Majority-2015-Update-Low-Income-Students-Now>.
- Weinstein, J. (2006). "School-based health centers and the primary care physician: An opportunity for collaborative care." *Primary Care: Clinics and Office Practice*, 33, 305-315.
- Weist, M. D. (1997). "Expanded school mental health services." *Advances in clinical child psychology* (pp. 319-352). Springer US.