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Organizational Principles to Guide and Define the Child Health Care System and/or Improve the Health of all Children

POLICY STATEMENT

School-Based Health Centers and Pediatric Practice

COUNCIL ON SCHOOL HEALTH

KEY WORDS
school-based health centers, school health services, medical home

ABBREVIATIONS
SBHCs—school-based health centers

www.pediatrics.org/cgi/doi/10.1542/peds.2011-3443

doi:10.1542/peds.2011-3443

PEDIATRICS (ISSN Numbers: Print, 0031-4005; Online, 1098-4275).

abstract

FREE

School-based health centers (SBHCs) have become an important method of health care delivery for the youth of our nation. Although they only represent 1 aspect of a coordinated school health program approach, SBHCs have provided access to health care services for youth confronted with age, financial, cultural, and geographic barriers. A fundamental principle of SBHCs is to create an environment of service coordination and collaboration that addresses the health needs and well-being of youth with health disparities or poor access to health care services. Some pediatricians have concerns that these centers are in conflict with the primary care provider's medical home. This policy provides an overview of SBHCs and some of their documented benefits, addresses the issue of potential conflict with the medical home, and provides recommendations that support the integration and coordination of SBHCs and the pediatric medical home practice. *Pediatrics* 2012;129:387–393

BACKGROUND

According to the most recent national census of school-based health centers (SBHCs) conducted by the National Assembly on School-Based Health Care,[1] almost 2000 SBHCs are operating in 48 states and territories of the United States, with 57% located in urban communities, 16% in suburban communities, and 27% in rural communities. Approximately 33% of SBHCs are located in high schools, 24% are located in elementary or middle schools, and 43% are located in alternative schools or schools with a combination of grade levels. As SBHCs become more prevalent, pediatricians and other health care providers should be familiar with the role of SBHCs in providing primary care and preventive services to school-aged youth. In addition, it is critical that health care providers working in SBHCs are aware of the importance of supporting the medical home and coordinating care with other primary care providers in the community.

The provision of health services in schools is not a new concept; rather, it was pioneered by pediatric and nursing health professionals to address common pediatric health challenges.[2,3] Schools already provide several critical health services, including triage and management of medical emergencies; medication delivery; services for youth with special health care needs; referral of common health problems, such as injury, asthma, and behavioral and emotional difficulties; and health screenings (such as vision and hearing screenings).[4–7] SBHCs are an expansion of these school health services. SBHCs evolved during the 1970s and 1980s and were promoted by the Robert Wood Johnson Foundation, which continues its support by funding The Center for

Health and Health Care in Schools.[8,9] Over time, guidelines regarding best practices for SBHCs have been developed. These include performing a community needs assessment; coordinating care with the medical community, hospitals, and public health providers; and documenting the effect of SBHC services on students' health and educational outcomes.[10–14] Another best practice of SBHCs is to establish a business plan to generate grants, contracts, and billings to match SBHC expenses. Although state funding of SBHCs has almost quadrupled over the past 20 years, finding adequate resources and income remains a challenge for most SBHCs.[15]

By the early 1990s, some pediatricians expressed concern that SBHCs might fragment children's health care because schools are closed on the afternoons and during weekends and holidays.[4] Although this concern was warranted, most SBHCs have avoided fragmentation of health care delivery by conducting needs assessments and finding a health care "sponsor" to address the community's documented needs. Sponsors can include pediatricians who provide care to underserved children in their communities by establishing SBHCs as satellites of their practices with financial support from grants and contracts. In addition, local hospitals often provide after-hours and school vacation coverage and financial support for SBHCs. Local hospitals benefit from this arrangement because SBHCs can reduce hospitals' costs by preventing unnecessary emergency or urgent care visits and hospitalizations and enrolling students in public health insurance. As the medical home concept has evolved, SBHCs fit into the model just as satellite offices and practice networks do for private practice.[12] A recent national survey of SBHCs revealed that 35% of managed care organizations recognize SBHCs as reimbursable primary care providers.[1]

THE ROLE OF THE SBHC IN INCREASING ACCESS TO HEALTH CARE

SBHCs address many of the barriers to health care access for school-aged children.[16–21] Because SBHCs are located where children spend a significant amount of their time, scheduling and transportation barriers are minimized. SBHCs address financial barriers by helping enroll eligible students in Medicaid or the Children's Health Insurance Program and offering free services for uninsured students. Many adolescents, especially boys, are reluctant to use traditional medical care.[22] SBHCs increase adolescents' health care use, particularly for sexual health issues, drug or alcohol problems, and mental health problems, by providing convenient and confidential care in a familiar setting.[23–27]

Surveys of students, parents, and pediatricians indicate that the majority are supportive of SBHCs and believe SBHCs can increase access to health care for underserved children.[18,27–30] In addition, the authors of several studies have documented that children and adolescents who use SBHCs have more primary care visits and fewer emergency department visits when compared with those who do not use SBHCs.[18,31–35] A national multisite study by the Robert Wood Johnson Foundation revealed that 71% of students enrolled in SBHCs reported having a health care visit compared with 59% who were not enrolled.[20] Studies conducted in Denver revealed that adolescents who used SBHCs, the majority of whom were uninsured, had higher visit rates and a higher proportion of visits for preventive care or screening for high-risk behaviors compared with those who did not use SBHCs.[24,35] Although colocation and integration of medical with oral health services are not common in pediatric practices, SBHCs can offer integration along with improved access for oral health services.[36] Three reports have documented improved access to dental care, which is a particularly difficult access issue for uninsured and publicly insured adolescents with many dental health needs.[37–39]

SERVICES PROVIDED BY SBHCs

SBHCs can deliver a variety of services, including medical, oral, nutritional, case management, and mental health services. Because the types of providers and range of services offered by SBHCs vary, pediatricians should be knowledgeable about what their local SBHCs offer. SBHCs usually use 1 of 3 primary staffing models. The primary care model, used by 25% of SBHCs, comprises a nurse practitioner or physician assistant who provides basic health services, with supervision by a physician. The primary care–mental health model (40%) also includes a mental health professional, such as a licensed clinical social worker or psychologist. Finally, the primary care–mental health plus model (35%) comprises primary care and mental health providers and other professionals, such as health educators, case managers, and nutritionists.[1,36] According to the recent census of SBHCs, the most common services provided are comprehensive health assessments (offered by 97% of SBHCs), treatment of acute illness (96%), prescriptions for medications (96%), vision and hearing screenings (92%), sports participation examinations (92%), nutrition counseling (91%), and anticipatory guidance (90%).[1]

The provision of reproductive health services in SBHCs has resulted in community controversy, despite the fact that parents have been found to support these services.[40,41] Currently, ~68% of SBHCs provide screening and treatment of sexually transmitted infections, 70% provide counseling about

birth control methods, 39% dispense contraception, and 59% provide follow-up regarding contraception use.[1] Many SBHCs are prohibited from dispensing contraception by school district policy (57%), health center policy (13%), and state law (10%).[1]

In addition to providing services for individual students, SBHCs can provide prevention, early intervention, and harm-reduction services for the entire school community by following the 8 components of the Coordinated School Health Program model, as described by the Division of Adolescent and School Health of the Centers for Disease Control and Prevention.[42] These 8 components are as follows: (1) health education; (2) physical education; (3) health services; (4) mental health and social services; (5) nutrition services; (6) healthy and safe environment; (7) family and community involvement; and (8) staff wellness. A literature review conducted by the Division of Adolescent and School Health of the Centers for Disease Control and Prevention identified school-based health promotional interventions that not only improved health attitudes and behaviors but also improved academic performance.[43] A New York comparison study revealed that students in schools with SBHCs had greater satisfaction with their learning environment, compared with students in schools without SBHCs.[44] Thus, in addition to addressing health promotion by using *Bright Futures* guidelines for health examinations, SBHCs are increasingly using small group, classroom, and schoolwide evidence-based curricula and interventions to better reach *Bright Futures* goals for health.

EFFECTIVENESS OF SBHCs IN IMPROVING HEALTH OUTCOMES

SBHCs have been shown to improve children and adolescents' health for several outcomes while also reducing health care costs.[32,33,45–48] Students who use SBHCs are more likely to have received recommended vaccines and screening for high-risk behaviors, compared with those who do not use SBHCs.[24,35,49] Students who use SBHCs have also been shown to have higher satisfaction with their health status and have healthier behaviors, such as more physical activity and greater consumption of healthier foods.[47] Two studies using Medicaid claims data to compare health care costs for students who did and did not use SBHCs revealed that those who used SBHCs had lower Medicaid expenses.[32,48]

Asthma is 1 chronic disease for which SBHCs have improved outcomes. Children with asthma have better outcomes with management and coordination by the SBHC with the children's medical homes and pediatric subspecialists. A study by Webber et al[46] revealed that access to SBHCs was associated with a reduction in the rate of hospitalization and a gain of 3 days of school for school children who have asthma. Another study revealed that students with asthma who accessed SBHCs had lower hospitalization rates and improved self-care, such as use of peak flow meters and metered-dose inhalers.[45] Guo et al[50] investigated rates of hospitalization and emergency department visits for school-aged children with asthma and found that children with asthma attending a school with an SBHC had fewer hospitalizations and emergency department visits compared with children without SBHC access. They estimated the potential cost savings to be $970 per child.

Integration of medical health and mental health screening and services in SBHCs benefit school performance.[27,51–53] When mental health services are offered in SBHCs, students' access to mental health services is improved and communication is facilitated between students, school personnel, SBHC staff, and parents.[24,54,55] In Dallas, medical services decreased school absences by 50% among students who had 3 or more absences in a 6-week period, and students who received mental health services had an 85% decline in school discipline referrals.[55] In North Carolina, students who used SBHCs were significantly more likely to stay in school and to graduate or be promoted than did students who did not use SBHC services. This was especially true for African American male students, who were 3 times more likely to stay in school.[51] Another study conducted in a northeastern city revealed that SBHC users had a 50% decrease in absenteeism and a 25% decrease in tardiness 2 months after receiving SBHC services.[52]

SBHCS AND THE MEDICAL HOME

The American Academy of Pediatrics defines the medical home as a model of delivering primary care that is accessible, continuous, comprehensive, family centered, coordinated, compassionate, and culturally effective to all children and youth.[56,57] Some pediatricians are concerned that SBHCs might not support the medical home model because they do not provide access to care when schools are closed or may provide duplicative services to children outside of their medical homes without communicating with the medical homes.[10] Most SBHCs are able to avoid these concerns by conducting needs assessments and coordinating or collaborating with the community's local health care providers to address their community's documented needs.[11] SBHCs can meet the definition of the medical home for their patients in collaboration with their sponsoring agencies by (1) ensuring linkage so that services are available 24 hours per day, 7 days a week, and 52 weeks per year, even when schools are closed; (2) encouraging parental

participation and providing education about the health care needs of the youth they serve; (3) working collaboratively with primary care practices, school districts, and community agencies; and (4) coordinating all specialty and subspecialty consultations, referrals, and collaborations.

For families who do not have access to a medical home, SBHCs can assist in linking them to a medical home. For example, SBHCs can:

- Provide families with onsite insurance eligibility and enrollment and connect them to health insurance plans (private or public) that will provide financial access to primary care practices.
- Connect families to primary care practices/medical homes that are accepting new patients and families.
- Provide satellite primary care services in collaboration with existing pediatric medical homes (eg, private practices, community health centers) that are not otherwise able to enroll these patients into their practice.
- Become the medical home for school youth who are in need of a provider if the SBHCs meet the criteria for a medical home described in the preceding paragraph.

OPPORTUNITIES

1. SBHCs can provide families with onsite insurance eligibility and enrollment and connect them to health insurance plans (private or public) that will provide financial access to primary care practices and can connect families to primary care practices that are accepting new patients and families.
2. Community primary care providers can collaborate with SBHCs to expand both the SBHCs' and the practices' enrollment, particularly for populations such as adolescent boys, which may not readily access traditional health services. Basic preventive services could be provided in the SBHC and consultative services, specialty referral, and follow-up could be provided in the community practice for patients enrolled at both sites.
3. SBHCs can provide assistance in the day-to-day monitoring and case management of children with chronic disease and disabilities.
4. SBHCs can help reinforce *Bright Futures* health examination goals by implementing health–promoting, evidence-based curricula, and interventions in the school setting.
5. Large SBHCs may provide health and health-related services, including dental services, mental health services, and nutrition counseling, as well as confidential reproductive health services that pediatric offices do not or cannot supply, especially for families with limited financial resources.

CHALLENGES

1. The health and education systems do not always share the same priorities. SBHC providers and community pediatricians can bring the health and education communities together with a common goal of better outcomes for children. They can help educate the school community about prioritizing children's health because children do not learn well if they are not healthy.[58]
2. Communication among schools, SBHCs, and community primary care providers should be facilitated. SBHCs should be planned and executed with primary care providers' input to result in a collaborative and integrated model that supports the medical home.[4,10] In addition, SBHCs should develop systems to regularly communicate with community providers about shared patients.
3. Pediatricians interested in starting a new SBHC may be unable to do so because of the time required to involve appropriate stakeholders, conduct a needs assessment, develop a business plan, and identify funding sources. However, school health advisory councils, which already exist in the majority of schools or districts, can assist in these activities and reduce the burden.[12,59,60]
4. SBHCs require multiple funding sources to stay financially solvent. Most SBHCs serve uninsured or underinsured patients or patients who may require additional case management or social support that is poorly reimbursed by insurance. Therefore, initial and ongoing funding in addition to insurance billing is required.[12,15]
5. Concerns about confidentiality and privacy can be a barrier to communication. Confidentiality for adolescents and health information transfer are challenges regulated by the Health Insurance Portability and Accountability Act and the Family Educational Rights and Privacy Act, laws that are implemented differently from state to state. However, model forms and approaches have been developed by the National Association for School-Based Health Centers and American School Health Association.[61,62]

RECOMMENDATIONS

1. Advocate for SBHCs as 1 model of a system of health care delivery that provides a health care "safety net" for children and adolescents who are uninsured or underinsured or represent special populations who do not regularly access health care.

2. Learn about SBHCs and the services they provide in the community. Pediatricians should become familiar with current or planned school health initiatives in their communities and assess their practices' capabilities to work with such efforts. SBHCs should conduct outreach activities to ensure that pediatricians and other health care providers in the community know about what SBHCs have to offer.
3. Ensure that all patients served by SBHCs have access to a medical home, either in the SBHC itself or with a practice in the community. Community pediatricians with experience in implementing the medical home model in their practices can educate and assist SBHCs in doing the same. SBHCs should work with their sponsoring agency to ensure that all patients they serve have access to a medical home by meeting the requirements of a medical home in the SBHC itself and/or collaborating with other community providers.
4. Facilitate coordination of care between SBHCs and community primary care providers. Community pediatricians can determine whether youth and families in their practices may be utilizing services at SBHCs and contact the SBHCs to facilitate coordination of care. In turn, SBHCs should identify enrollees that have a medical home and perform outreach to community pediatricians to facilitate a model of collaboration and communication.
5. Support access to services provided by SBHCs that are limited, not affordable, or not available in private practice or other community settings for children and adolescents. These services may include: mental health, substance use or nutritional counseling, oral health services, or confidential reproductive health services. In addition, students with chronic conditions may benefit from school-based monitoring that is reported back to the medical home.
6. Consider SBHCs as sites to provide volunteer pediatric services and supervised educational opportunities for health services professionals in training.[63] Pediatricians can support community schools and families by volunteering or working part time at SBHCs, supervising trainees at SBHCs, or serving as the SBHC's consultant or medical director.
7. Encourage the development of school health advisory councils to establish a setting for planning, monitoring, and developing SBHCs and coordinated school health services.[12,59,60]

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