

# Small Steps and Big Leaps: Implications of the National Survey of Early Childhood Health for Improving the Quality of Preventive and Developmental Care for Young Children

ABBREVIATIONS. NSECH, National Survey of Early Childhood Health.

**A**s pediatricians, promoting healthy development is one of the core aspects of our job. Nearly every child receives at least some health supervision visits in the first 3 years of life. An estimated 80% of families with children 0 to 5 years of age see a pediatrician for these visits.<sup>1</sup> We thus are uniquely positioned to provide needed information regarding behavior and development, to detect and address problems, and to serve as advocates for children within our communities. The data from the National Survey of Early Childhood Health (NSECH) provide an estimate, from parents' perspective, of our success.

The NSECH was developed to assess the content and quality of health services provided to young children and the health-promoting behaviors that families routinely undertake at home. The survey demonstrates substantial gaps among recommended care, what parents want, and what children receive. Using a composite quality score, only 14% to 60% of parents received recommended care when a scoring method that takes into account parents' perceived needs for guidance, screening, and beliefs about whether screening of families should occur was used.<sup>2</sup> Nearly all parents identified a practice where their children receive care, yet fewer than half (46%) reported that they have a particular clinician who sees their child for well-child care.<sup>3</sup> Barely more than half (57%) of parents reported ever having had a structured developmental assessment.<sup>4</sup> In addition, parents who reported specific attention to development were more likely to report receiving needed developmental and psychosocial information and were more satisfied with their care.

The survey also identified the importance that parents place on information from pediatricians. Most parents reported that family and social issues such as financial sufficiency and emotional resources available to the parent, as well as community resources available to address their needs, are appropriate topics for discussion. With the exception of smoking, fewer than half of parents were actually asked about most of these issues.<sup>5</sup> A large percentage of parents

who have young children and do not read daily with their children reported that they would find it helpful to discuss reading with their child's physician.<sup>6</sup> Parents who spank and who do not use time-outs reported that they would like to get more information on discipline from their child's physician.<sup>7</sup> Taken together, these gaps suggest substantial limitations or the need for substantial modifications in the way health supervision is organized to meet parents' needs.

## HOW CAN DATA FROM THE NSECH BE USED TO INFORM QUALITY IMPROVEMENT EFFORTS?

Measuring the content and quality of health supervision, prevention, and developmental care is complex because of the wide range of issues to be covered and the need to tailor preventive care to families' needs. To date, there have not been validated methods to accomplish this measurement goal. The NSECH combines evidence-based measures of the quality of early childhood care delivery, including parent education and counseling, developmental assessment, and screening for parent and family psychosocial and safety risks for specific age strata of children. The measure also assesses the extent to which parents' needs for information are met. Although some will criticize components of the NSECH as imperfect, the analyses presented here demonstrate its usefulness in assessing a wide range of components of care. The NSECH provides a way to overcome the limitations of current measures of preventive service quality for children (eg, the Health Plan Employer Data and Information Set) that provide few details about the delivery of care to promote healthy development.

At a national level, the information provided by the NSECH has the potential to contribute to efforts to assess progress in improving early childhood care because it focuses attention on specific measurable goals. The NSECH measures components of care delivery that can be influenced by care providers who work within and outside health care (eg, child care, early intervention services, social services agencies). This is an important contribution. Clinical interventions in the medical office are not the only or necessarily the most effective way to address the health and development needs of young children. John Kenneth Galbraith, a noted economist, observed that statisticians are key actors in social change, for only when it is possible to measure a problem is it possible to arouse the interest in solving it. By providing a metric that can be used by multiple groups within health and social services systems of care delivery, the NSECH will provide important motivation to improve.

The NSECH data provide information that can guide the selection of priorities for improvement such as creating more specific standards for structured developmental assessment or improving continuity of care, but improving the outcomes of care requires more than measurement, motivation, or the identification of broad national priorities. Improving care depends on the availability of information at the level of care delivery. Data from a large national

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survey cannot provide sufficient detail for individual practices or communities to identify specific problems in their own approaches to care delivery and organize efforts to improve. One of the strengths of the NSECH and its component Promoting Health Development Survey is that its measures address specific details of care delivery (eg, which health supervision topics were discussed), unmet needs for information about specific topics such as discipline or toilet training, and parenting practices such as the frequency of reading or time spent watching television. Such data, if collected at a practice and community level, could facilitate the identification of local opportunities for improvement and measure progress in addressing them. Work is currently under way to refine the Promoting Health Development Survey instrument, data-collection methods, and analyses to address this important need.

#### HOW CAN CARE BE DESIGNED TO BE MORE EFFECTIVE?

Measurement is an important part of improving care but insufficient by itself to accomplish it. Even when we know that our performance is less than we desire, practitioners face a daunting number of barriers to improvement. The sheer number of clinical preventive services (eg, immunizations, screening, counseling) recommended for children, the volume of parents and the rapidity of patient turnover in office practice, and reimbursement policies discourage spending time on developmental issues and challenge our ability to customize care to individual families. The prevalence of large group practices and the growing number of part-time pediatricians make it difficult to maintain continuity between families and the individual clinicians who know them well. Finally, pediatric practices exist within a larger system composed of other services for young children but may not have well-established methods to access these resources easily for the families who need them. Getting the right care to the right children at the right time depends on an effective system of care delivery inside the office, as well as effective relationships to connect families with the resources that they need outside the practice.

In recent years, good examples of practices and health systems that have achieved better care delivery have emerged<sup>8,9</sup> and have provided an evidence base for improved care delivery, including the use of structured assessments to elicit parents' behavioral and developmental concerns as part of an office systems approach,<sup>10-13</sup> tiered intervention approaches at the level of the population of children as well as the population practices and community agencies that serve them,<sup>14</sup> and screening and stratification of patients according to their needs.<sup>8,15</sup> Improvement can come by practices' deciding to adapt evidence to their own setting and by communities' taking the initiative to engage multiple practices and agencies in joint efforts.

Achieving change is difficult without structures and processes to support it. Programs such as the North Carolina Center for Children's Improvement,

Vermont Child Health Improvement Program, and the National Initiative for Children's Health Care Quality have formed to help practices and communities overcome barriers to improvement. These efforts have resulted in a set of tools and processes to help practices reorganize developmental health services.<sup>16</sup> This approach suggests, for example, how practices can use structured, validated assessment tools and better office processes to identify parental concerns; evaluate the risk for developmental problems; identify the strengths and needs of the psychosocial environment; identify priority areas for anticipatory guidance and education; manage problems; and coordinate care. Effective systems rely on clear responsibilities for clinicians, staff, and patients; tools that assist with the implementation of guidelines; and methods to assess performance and more effective partnerships among clinicians, staff, patients, and the community. Reorganization ultimately saves time, increases efficiency, and enables staff to play a larger, more fulfilling role.

These programs also support a form of continuing medical education called a "learning collaborative" in which practices work together to make improvements in care. Practices in learning collaboratives use a model of improvement of health care that involves identifying specific goals for improvement, ideas that can be used to reach the goals, tests of new approaches, and ongoing study of the results.<sup>17,18</sup> An important goal of the learning collaborative is for practices to use information and data about their patient population to engage in ongoing planning and tailoring of care to the specific needs of families within the practice. In summary, improvement programs seek to provide the "wind at the back" of busy practitioners who want to make changes to the delivery of care but may not have the time to find and use all of the resources that they need to improve care.

The data presented in the NSECH raise a number of issues for ongoing efforts to develop a better system of care delivery for young children and their families. Much has been written about the importance of "integrated" approaches to care delivery for young children and the many barriers to a more integrated approach to children's health care.<sup>19</sup> The design of the survey suggests but does not directly measure the complex interdependencies among important components of the health care delivery system. The current fragmentation of the health care system and the lack of clear responsibility for coordinating services for children make integrated approaches difficult even to conceptualize. At a community level, the different care systems that focus on services for the needs of young children (health, child care, family support, social welfare) are essentially separate. Public health and social services agencies and primary care practices often have common goals, but they do not communicate enough to share resources and expertise effectively. A key step will be to create conceptual models that illustrate the interactions between the many levels of the care system (patient-clinician interaction, practice, health system, policy) so that those who practice within the

system can appreciate the interdependencies between them and use this information to create more synergistic approaches. Such an approach has proved useful in guiding efforts at improving chronic illness care.<sup>20</sup> A useful model of how the system for early childhood preventive care could work will be important to guide future research, to identify which groups of care processes are most closely associated with improved outcomes, and to help practitioners within the system to capitalize on interdependencies among practices, community agencies, and policy makers, as well as to test improved approaches.

A major impediment to improvement for practices and communities is to identify specific ideas that are associated with improved outcomes of care delivery. In other pediatric specialties, such as cystic fibrosis and neonatology, data about variations across clinical settings are a rich source of information about specific changes that can improve care. The availability of such data avoids “reinventing the wheel” and helps to connect practices with colleagues from whom they can learn. It also allows practices to focus on adapting good ideas to their own setting. A future opportunity that should be explored is the potential to collect NSECH data at a community and practice level to identify sites that are having unusually good results so that we can learn from them (and evaluate the potential of replicating them).

Finally, effective use of the NSECH will require both leadership and action. Although the survey provides useful measures of care, it will require leadership to publicize the measures and goals so that policy makers, health systems, communities, clinicians, and families are aware of them and can work together to achieve them. Leadership will also be required to create the support from within the health care system to provide practitioners with the assistance that they need to undertake ongoing efforts at improvement. In summary, sometimes a small step can represent a big leap. The NSECH represents an important step toward better care for young children in the United States.

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