

Introduction

Over **12 million children** (13.1%) in the U.S. have a special health care need. The US Maternal and Child Health Bureau and the American Academy of Pediatrics recommend that all children receive care in a medical home. The concept of a medical home is one of six outcomes reported as performance measures by all state Title V programs and is reflected in the Nation's Healthy People 2010 Objectives.

A team of child health researchers systematically reviewed the medical literature to synthesize the evidence about whether having a medical home leads to improvements in important outcomes for children and youth with special health care needs (CYSHCN) and their families. This report summarizes their findings.



MCHB Core Outcomes

What is a Medical Home?

Medical homes are clinical practices committed to organizing and coordinating care based on child and family needs and priorities.

Building on the accepted attributes of primary care, effective medical homes provide care that is accessible, continuous, comprehensive, family centered, coordinated, compassionate and culturally effective.

Activities of the medical home include, in addition to provision of comprehensive and technically expert clinical care:

- care planning
- care coordination
- population or “panel” management
- physical and operational modification to address physical and cultural needs
- continuous quality improvement

Many models of the medical home, particularly for children with special health care needs, include parents and youth in the process of improving care.

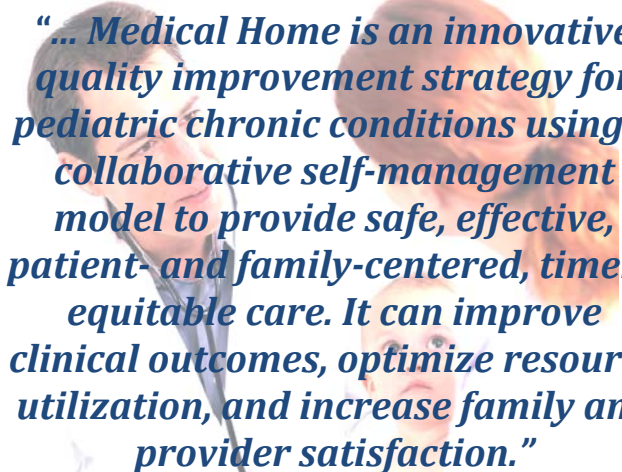
How to Get Started

Practices:

- Commit to becoming a medical home
- Assess your current performance
- Engage parent partners
- Establish a registry
- Begin planned visits and care planning
- Develop care coordination

Policy Makers:

- Assess state performance
- Partner with consumers and providers
- Provide training and support
- Develop incentives
- Support care coordination



“... Medical Home is an innovative quality improvement strategy for pediatric chronic conditions using a collaborative self-management model to provide safe, effective, patient- and family-centered, timely, equitable care. It can improve clinical outcomes, optimize resource utilization, and increase family and provider satisfaction.”

William E. Schwab, M.D.
Professor, Department of Family Medicine
University of Wisconsin

The Bottom Line

- Overall, medical homes improve health outcomes for children with special health care needs.
- Medical homes provide care that is more clinically effective, timelier, and more family centered than other sources of care.
- Too few studies examined cost, safety or equity to draw meaningful conclusions.
- Most studies did not examine the comprehensive medical home model, but rather one or two elements of the medical home such as care planning or continuity.
- Studies used inconsistent definitions of the medical home and different outcome measures, making the evidence more difficult to interpret.
- Further research should examine the impact of the full medical home model on CYSHCN and their families; use consistent definitions and measures; and explore the types of supports that are needed to create and sustain medical homes over time.

Highlights of Important Outcomes From the Evidence about Medical Home

<p>Efficiency</p>	<p><i>Intervention Studies:</i></p> <ul style="list-style-type: none"> Decreased time in the Intensive Care Unit, fewer emergency department visits, fewer hospitalizations and less time when hospitalized. No change in the number of emergency department visits or hospitalizations.
<p>Timeliness</p>	<p><i>Intervention Studies:</i></p> <ul style="list-style-type: none"> Parents reported greater ease in filling prescriptions, having phone calls returned on a timely basis and making appointments. Rural families reported improved access to mental health services. <p><i>Associational Studies:</i></p> <ul style="list-style-type: none"> Parents had greater ease in using services, making appointments and having phone calls returned on a timely basis. Increasing timeliness, such as a decrease in likeliness to delay or forego care.
<p>Effectiveness</p>	<p><i>Intervention Studies:</i></p> <ul style="list-style-type: none"> Half of the studies found positive findings between medical homes and effectiveness. Some studies found improved process of asthma care and asthma care treatment.
<p>Family-centeredness</p>	<p><i>Intervention Studies:</i></p> <ul style="list-style-type: none"> Families more likely to receive a written management plan for their child's chronic condition, information regarding their condition, and education on medication use. Some studies showed increased satisfaction of care. Family strain decreased, family functioning increased, and a significant proportion of families felt their provider listened to their concerns. <p><i>Associational Studies:</i></p> <ul style="list-style-type: none"> Families more likely to receive written management plan for their child's chronic condition, information regarding their condition, and education on medication use. Increased satisfaction of care.
<p>Health/ Function Status</p>	<p><i>Intervention Studies:</i></p> <ul style="list-style-type: none"> Fewer illnesses and symptoms of chronic conditions. After medical home access for four years, children scored higher on mental health measures. Some studies show decrease in missed school days.
<p>Cost</p>	<p><i>Intervention Studies:</i></p> <ul style="list-style-type: none"> One hospital saved \$13.5 million in adjusted costs for children with chronic conditions after six years. Other studies reported costs increased or did not decrease. <p><i>Associational Studies:</i></p> <ul style="list-style-type: none"> No difference in costs.

Intervention Study- Testing a hypothesis by intervening on a population and measuring the differences in results between at least two different groups.

Associational Study- Testing a hypothesis by associating two variables of interest through non-intervening methods.

More Information and Resources

More Information: Visit the Data Resource Center for Child and Adolescent Health at www.cshcndata.org for links to the corresponding full article for this review, other components of systems of care evaluated in this project and an interactive data query about medical homes in your state.

References: Homer, C. et al. A Review of the Evidence for the Medical Home for Children With Special Health Care Needs. *Pediatrics* 122: e922-e937. A list of references is available with the full article at www.cshcndata.org.