CLINICAL SCHOLARS

Building a Dental Home Network for Children with Special Health Care Needs



Cohort: 2016-2019

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Location: Minneapolis, Minnesota

Focus Areas: Health Care Access Oral Health

Background

Children with special healthcare needs (SHCNs) live in all of our communities. They present with a diverse group of diagnoses including complex chronic conditions and diseases, physical, developmental, and intellectual disabilities, sensory, behavioral, emotional, psychiatric, and social disorders, cleft and craniofacial birth defects, anomalies, and syndromes, and inherited conditions causing abnormal tooth development. These children are prone to broad-reaching health disparities when their individual SHCNs are exacerbated by social determinants of health.

Oral health disparities are especially pervasive in this population. SHCNs frequently impact the growth, development, and health of the oral tissues, the teeth, jaws, and the craniofacial skeleton. Tooth decay, gum disease, dental injuries, tooth misalignment, oral infections, and other oral abnormalities are commonly seen or reported in the health history of children with SHCNs. Nationally, dental and oral health care ranks as the second most common unmet health need, according to the most recent National Survey of Children with Special Health Care Needs.

Wicked Problem Description

Children with SHCNs need a dental home where all aspects of their oral health care can be delivered in a comprehensive, continuously accessible, coordinated, culturally competent, interdisciplinary, and family-centered way under the direction of knowledgeable, experienced dental professionals comfortable and competent to address their unique dental treatment needs.

Sadly, Minnesota doesn't have enough dental professionals ready and able to meet the demand. As a result, children with SHCNs either go untreated or are subjected to disorganized handoffs between pediatric healthcare professionals, general dentists, local dental specialists, and regional tertiary dental centers. These handoffs are a source of unnecessary appointments, treatment delays, inadequate management of oral pain and dysfunction, and result in negative dental treatment outcomes. The time has come to support and prioritize a dental home across the pediatric life course for all children with SHCNs in Minnesota.

Project Strategies

The project has identified and engaged people, organizations, and communities across all sectors as stakeholders in the development of a dental home network throughout Minnesota. The needs of these stakeholders continue to be determined and resources to address their challenges in incorporating oral health into a broader culture of health are being developed and put into place.

An interdisciplinary Project ECHO telementoring and case-based learning network educates dental professionals and pediatric healthcare providers who are interested in providing a dental home for children with SHCNs.Community health workers and family navigators are integrated into the telementoring network to facilitate distribution of oral health educational materials and other project resources, provide insights on cultural competency, and ensure the family perspective permeates our telementoring network activities. Clinical Scholars, key personnel, and project participants work collaboratively to identify best practices for working within the established healthcare infrastructure to support improved clinical care in dentistry and other health disciplines where children with SHCNs face disparities.

Outcomes

This Wicked Problem Impact Project aims to increase the number of dental professionals providing a dental home for children with SHCNs.

Completed Outcomes

- Recruited 30 core participants for Project ECHO clinics
- Prepared curriculum and invited content experts for Project ECHO clinics

- Invited interested healthcare providers and stakeholders to participate in Project ECHO clinics as guest attendees and presenters
- Completed team-based Project ECHO training and patient tracking management
- Launched monthly Project ECHO clinics each involving 30 core participants, parents of children with SHCN, policy influencers, and mentors
- Launched Facebook group to provide a social environment for core participants to meet and engage professionally across Project ECHO clinics
- Presented, discussed, and planned care children with SHCN via Project ECHO clinics
- Awarded continuing dental education credits to various participants of the program
- Analyzed barriers to providing care for children with SHCN, including funding, billing and coding concerns, hospital-based dental access in rural communities, staff training, and new patient space availability
- Gauged initial impact of the implementation of our wicked project plan
- Obtained feedback from our Project ECHO clinic core participants and identified ways to improve the curriculum and telementoring experience
- Recruited Next Generation Scholars, comprised of new to dental practice and future dental and medical providers, to participate in our second round of Project ECHO clinics
- Plan May 2019 conference focused on providing care for children with SHCN

Anticipated Outcomes

- Defining referral processes needed to effectively organize the dental home network
- Instituting measures to strengthen communication pathways among healthcare providers, social service agencies, community organizations, and families
- Advocating for prevention of oral disease and maintenance of a dental home
- Improving the self-efficacy of local dental professionals to provide a dental home for their communities' children with SHCNs

Timeline

September 2018 - June 2019

- Train next generation of oral health care and medical providers to become more comfortable in developing a dental homenetwork for children with SHCN
- Launch Project ECHO clinic focused on preparing and mentoring new-topractice providers, students: dental, dental hygiene, dental therapy, as well as dental and medical residents and fellows to better understand oral health care for children with SHCN

- Engage additional family navigators to expand the reach of oral health educational materials and awareness of dental home network into communities
- Develop 20 family-centered learning experiences for students, residents, and new to practice providers to spend time with children with SHCN in their homes, schools, and during care provider visits
- Host May 2019 conference focused on providing care for children with SHCN, including four marquee speakers, 25 scholar presentation posters, and an overview of the next phase of our project
- Launch updated referral database and process at the May 2019 conference

July - August 2019

- Evaluate project and project participants' perceptions of the ongoing need for dental home engagement efforts
- Re-engage stakeholders in long-term planning
- Distribute project findings
- Expand the telementoring network

Partnerships

The Director of the Office of Continuing Dental Education at the University of Minnesota School of Dentistry and her team joined our internal team and provide support to daily operations of the project. Minnesota-certified CHWs were hired with the help of the Minnesota CHW Alliance. Family Voices was hired in an advisory and educational capacity to provide insights and innovations on the care needs of children with SHCN. The Project ECHO Superhub stationed at the American Academy of Pediatrics in Elk Grove, Illinois provided training, technical assistance, and guidance in curriculum development for the project's telementoring network. An interdisciplinary, cross-sector group of leaders from Minnesota health organizations, community advocacy groups, pediatric professional chapters, and interprofessional university programs have provided guidance throughout the project.

Evaluation Strategies

Quantitative and qualitative data will be continuously compiled and interpreted in the following areas to promote project improvement over the duration of the Clinical Scholars program.

- Provider knowledge and comfort in providing a dental home for children with SHCNs
- Parent and caregiver satisfaction surveys of network operations and CHW effectiveness
- Utilization and effectiveness of Project ECHO telementoring sessions
- Distribution and reach of educational and informational materials
- Growth of dental home network capacity in Minnesota