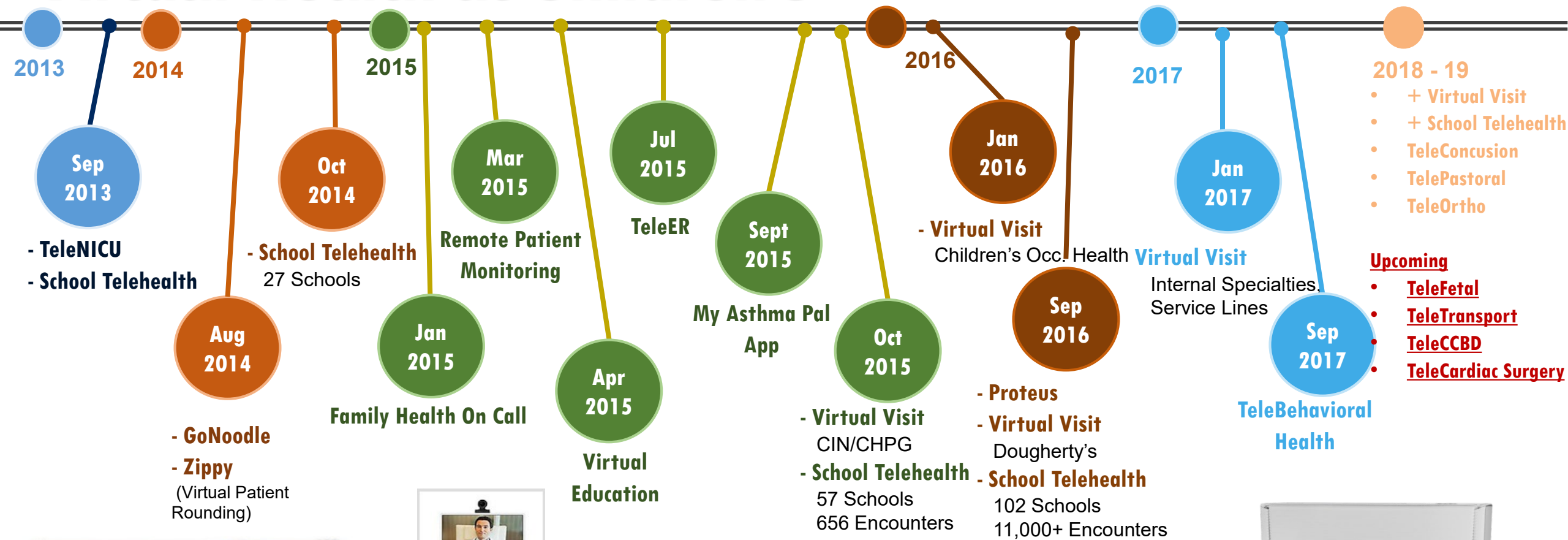


Leveraging Technology for Pediatric Healthcare

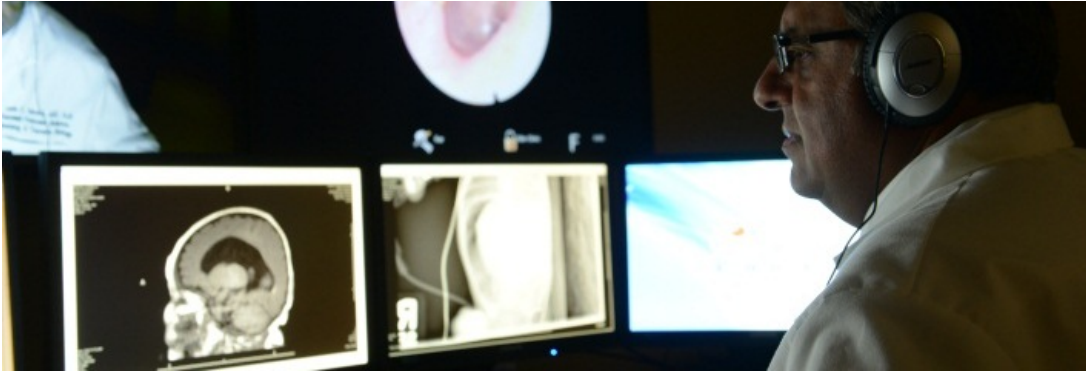
Kristy Carlton MSN RN

November 15, 2019

Virtual Health at Children's



TeleSpecialty: TeleNICU



From providing second opinions or consults on treatment plans to performing real-time virtual examinations, the neonatology specialists at Children's Health can have an immediate impact on expanding and enhancing patient care. TeleNICU services can be used for a wide range of consults, including:

Our program helps and families stay closer to home, lowers healthcare costs and allows our partner hospitals to keep more neonatal patients at their facilities. Since launching our TeleNICU in 2013, we've virtually examined more than 200 neonates and about half have been able to stay in their home hospitals. Live with 11 Hospitals in Texas

- Interpreting medical data and images
- Confirming diagnoses
- Providing consultation on treatment plans

Our mobile carts include digital otoscopes and stethoscopes, high-resolution cameras and a video laryngoscope.

This enables our neonatologists to conduct thorough exams

From afar and communicate face to face with families and physicians.

TeleSpecialty: TeleER



Our TeleER service is designed to collaborate on care for pediatric patients in your own facility, with the support and expertise of Children's Health and UT Southwestern pediatric emergency medicine physicians. Currently Live with 12 hospitals.

This partnership:

- Provides real-time access to the only academic pediatric health system in North Texas
- Expands the breadth of the remote site's expertise
- Coordinates patient transfers upon your request
- Delivers the right care at the right place at the right time, using secure technology

Some of the most common needs include but are not limited to:

- Infectious diseases
- Poisoning
- Respiratory conditions, including asthma
- Musculoskeletal injuries such as ankle sprains or broken bones
- Traumatic and non-traumatic injuries



Remote Patient Monitoring

What is remote patient monitoring (RPM)?

Remote patient monitoring (RPM) is a healthcare delivery method that uses technology to monitor patient health outside of a traditional clinical setting. RPM refers to the specific technology used to electronically transmit information between patients and physicians, and it is just one delivery system within the broader telehealth industry.

Use case:

- Post Transplant
- Post Bariatric Surgery
- Complex Care
- Hypertension *
- Suicide Prevention *
- General Surgery Post-op *

** Upcoming Programs*



School Telehealth



School TeleHealth Program started 2014

Currently:

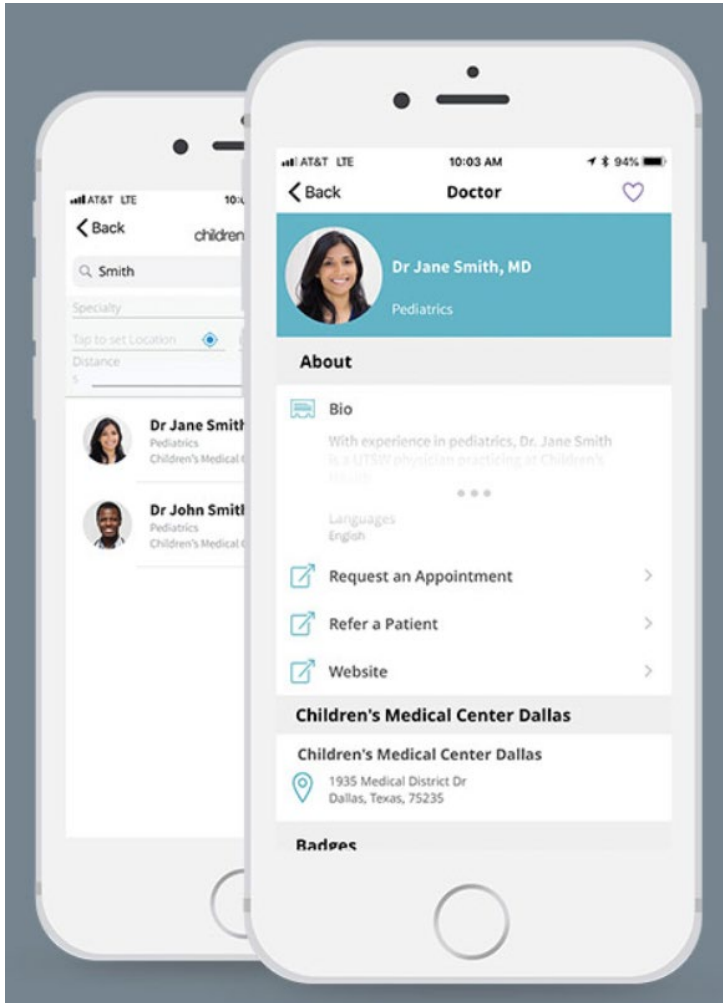
- 152 Schools
- 24 Districts
- Completed over 12,000 visits
- Approx. 2000 per school year

Most common reason for visits:

- Asthma
- Rashes
- Allergies
- Flu Test
- Strep Test



Virtual Visit



Get treated right in the comfort of your home, office or virtually anywhere you go, right from your smartphone, tablet or computer.

Conditions We Treat

- Allergies
- Burns
- Common colds
- Cuts
- Ear, nose and throat infections
- Flu
- Rashes
- Sinusitis
- Skin infections
- Urinary tract infections



Virtual Education

Share expertise and research findings with peers and affiliated partners.

“Children’s Health LIVE” Programs:

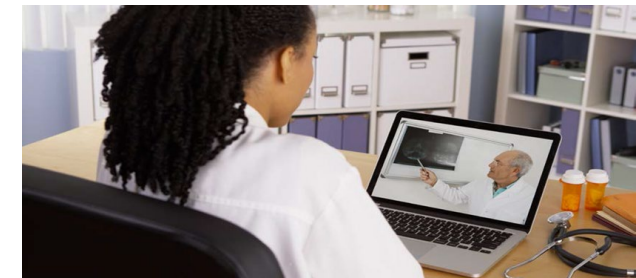
- Child Abuse and Neglect Grand Rounds
- Andrews Institute Sports Medicine Lecture Series
- UT Southwestern Department of Pediatrics, Multidisciplinary Case Conference
- Trauma Grand Rounds Weighting for Perfect: Understanding Eating Disorders in the Pediatric Population
- Pediatric Classes for Community: Gastrostomies, Ostomies and Wounds: Care, Maintenance and Complication Management for the Pediatric Patient in the Community
- Practice to Practice: Professional Practice and Evidence-Based Guidelines
- TelePastoral Series
- Topic Specific Sessions for Tele Specialty Program



Telemedicine Initiatives

The expansion of telemedicine services in the 85th Texas Legislature, 2017

- S.B. 1107 creates a clearer regulatory structure for telemedicine services in the state, including a new framework for establishing a valid practitioner-patient relationship.
- S.B. 922 directs HHSC to establish policies that permit reimbursement to select telehealth services providers under Medicaid for services to children with special health care needs in a school-based setting.
- H.B. 1697 establishes a pediatric health tele-connectivity resource program for rural Texas.



HB 1697 Rural Texas Pediatric Connectivity Resource Program

H.B. 1697

- One of the goals is to providing appropriate care to newborns in rural areas and supporting the hospitals and physicians that deliver them.
- Over 98 percent of births in Texas occur in a hospital setting.
- 220 Texas hospitals recorded a total of 50 or more births each,
- 64 of these facilities located in a non-metro county.
- Only 29 of these rural facilities reported providing a basic (Level 1) neonatal intensive care unit (NICU) service,

Direct intention of H.B. 1697 is to assist facilities that lack advanced NICU capabilities make appropriate and rapid medical decisions for the care of their newborns, including decisions on whether transfer to a higher level NICU is in the best interests of the newborn.



Implementation Planning

The workgroup developed a framework for possible pilot projects that includes:

- Establishing a subcommittee to develop technical specifications for the pilots that use open standards to ensure connectivity
- Leveraging resources available through UTMB to potentially provide equipment for the pilot sites
- Using the data from the survey to identify pilot sites



Pilot Project Identification

Identification and Selection of Potential Pilot Sites The first source was a survey developed through a collaboration between Children's Medical Center of Dallas, the Texas Organization of Rural and Community Hospitals (TORCH), and the Texas Tech University Health Science Center's Rural and Community Health (TTUHSC RCH) program, to enable rural hospitals to share their experiences, capabilities, and interest in telemedicine.

The Survey's sample included

- Hospitals in counties with a population of 60,000 or less
- Critical Access Hospitals (CAH)
- Sole Community Hospitals (SCH)
- Rural Regional Clinics (RRC) in a non-Metropolitan Statistical Area (MSA).

Fifty-seven hospitals responded out of 163 surveyed. A majority of respondents reported **cost** as the biggest challenge for adoption or expansion of telemedicine services followed by concerns about the **technology's reliability**.



Pilot Project Identification

Currently, one pilot site as been identified, Navarro Regional Hospital in Corsicana

Demographics: (collected in 2016)

- Level 1 Nursery
- 570 births
- 162 licensed beds
- Above average in size for a rural hospital
- Does not currently participate in any pediatric telemedicine services
- Has an in-house information technology team
- Supports a full electronic health records system.
- Navarro Regional went live with CHST TeleNICU services in August.



Twenty-four hour access to Level IV NICU, expert UT Southwestern board-certified neonatologists and pediatric subspecialists to interpret medical data, confirm diagnoses and confer on treatment plans.

Continuous Improvement

Hospitals participating in the *Collaborative Rural Texas Pediatric Telemedicine Pilot Project* will be required to report specific information about their encounters utilizing equipment and services supplied through the participating pediatric specialty telemedicine provider.

The measures to be collected are:

- Number of consults
- Specialty (NICU for this pilot)
- Diagnoses (Did the diagnoses change?)
- Outcome Retention or Transport
 - a. Transport to Children's
 - b. Transport to Non-Children's Facility
- Transport
 - Transport to Children's
 - Transport to Non-Children's Facility
- Length of Stay
- Intent to Transfer (Did this change after consultation)
- Mode of transportation (ground, air etc.)



HOW OUR LAWS ARE MADE

"Congress shall have Power... To make all laws which shall be necessary and proper"
U.S. Constitution Article 1 Section 8



Thank you for your time

Questions?

