



Missouri Telehealth Network
University of Missouri

SHOW-ME ECHO

EXTENSION FOR COMMUNITY HEALTHCARE OUTCOMES

*The Power of the ECHO Model: Advancing Behavioral Health
Through Collaboration and Innovation*

E. Rachel Mutrux, Director





I have no disclosures.



Session Objectives

By the end of this session, you will be able to:

- 1. Understand the ECHO Model:** Gain a comprehensive overview of the Show-Me ECHO model, including its history, principles, and how it enhances the capacity of healthcare providers to address behavioral health and substance use challenges.
- 2. Explore the Depth and Breadth of ECHO Programming:** Discover the diverse range of Show-Me ECHO programs, including the Child Psychiatry, Opioid Use Disorder, Developmental Disabilities, Suicide Prevention, and Adult Psychiatry ECHOs, and how they each contribute to improving patient care and provider knowledge.
- 3. Identify Key Indicators of Success:** Learn the key indicators that demonstrate the success of ECHO programs, including participant engagement, knowledge retention, clinical outcomes, and the sustainability of the collaborative model.
- 4. Review Outcomes and Benefits:** Understand the measurable outcomes and benefits of participating in ECHO programs, such as improved clinical skills, enhanced provider confidence, and better patient outcomes, particularly in underserved communities.



MISSOURI TELEHEALTH NETWORK

MISSION

To develop, study, and use telehealth solutions that improve access by providing high-value, patient-centered health care and medical education in Missouri and beyond.

HISTORY

Missouri is a national leader in telemedicine, and the Missouri Telehealth Network has led operational, legal and regulatory, and research and evaluation efforts since 1994.

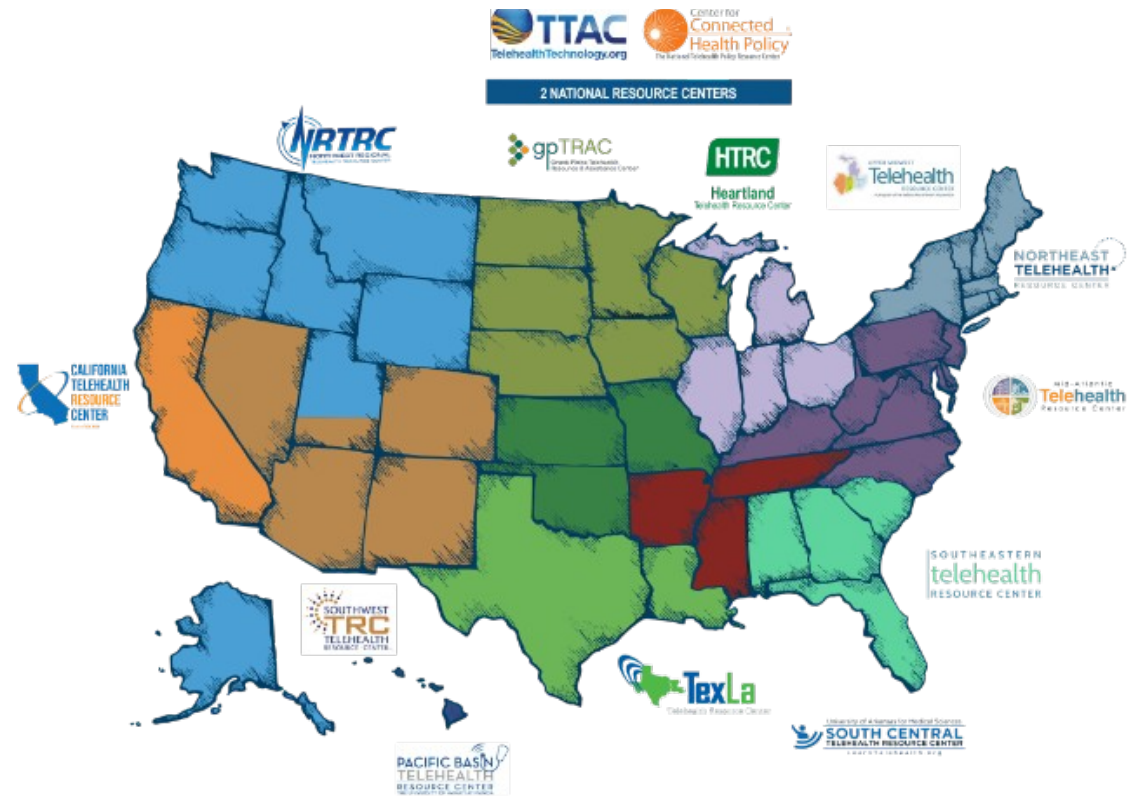
MTN is funded with state, federal, contract, and grant dollars.





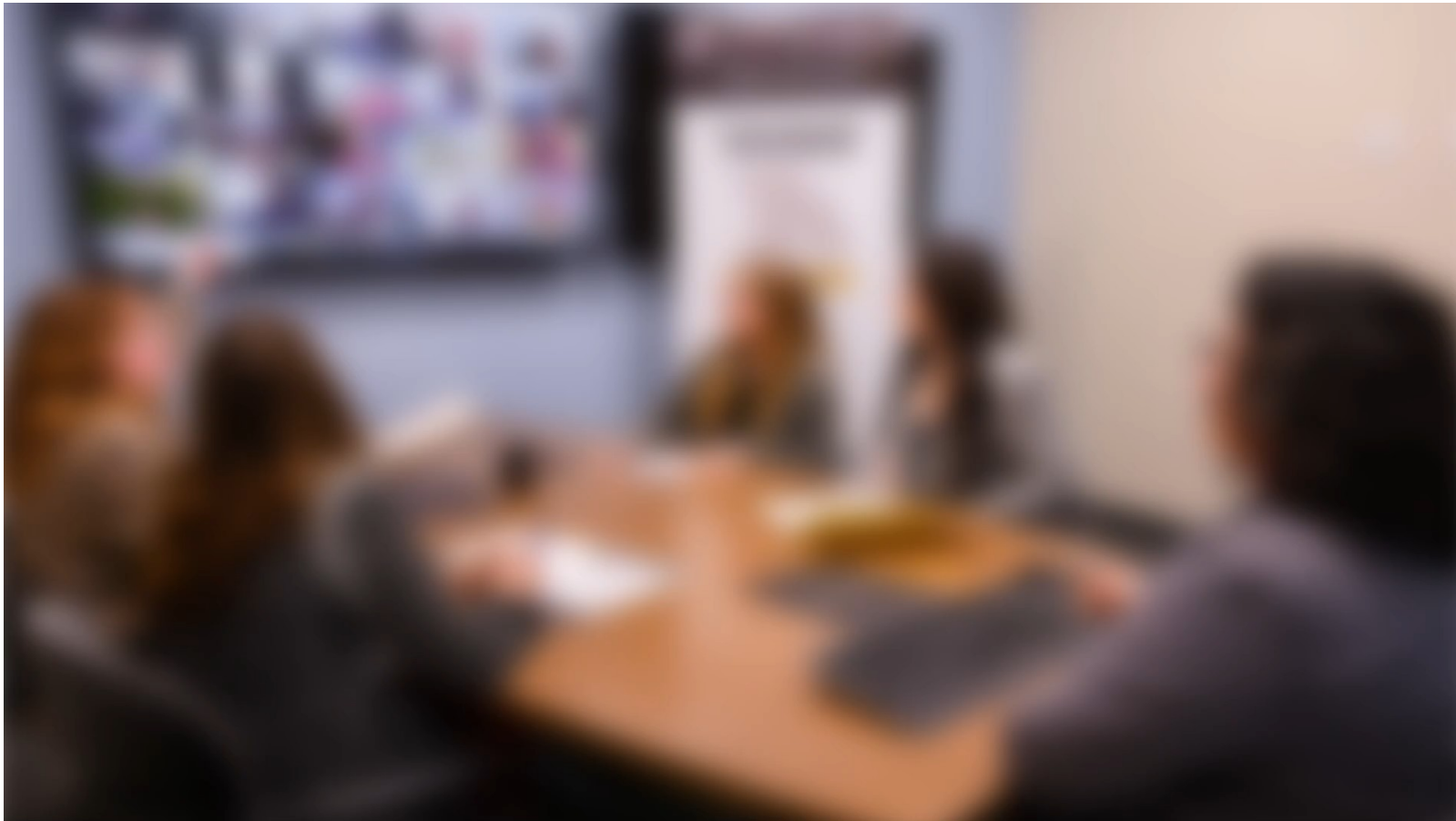
HEARTLAND TELEHEALTH RESOURCE CENTER (HTRC)

- The National Consortium of Telehealth Resource Centers (TRC): 12 regional and 2 national TRCs funded by US Department of Health and Human Services (DHSS) and HRSA
- Experts in the field of telehealth education and implementation
- Consultations and resources no cost
- MTN is part of the Heartland Telehealth Resource Center, with Kansas and Oklahoma





SHOW-ME ECHO'S IMPACT





WHAT IS ECHO?

ECHO (Extension for Community Healthcare Outcomes) is an educational program that uses videoconferencing technology to create communities of learning focused on specialists sharing their expertise with community providers who can give their patients improved care in their own communities.



“ALL TEACH, ALL LEARN”

- Through this learning collaborative, ECHO moves knowledge, not people. In this model, everyone benefits from a community committed to cycles of knowledge-sharing, best practices, and positive impact.



THE ECHO MODEL...



utilizes **technology** to leverage scarce resources



and share **best-practices**



with professionals in **rural** & **underserved areas**



through **cased-based** learning



and **ongoing guided-practice**



to **master complexity**



and **reduce disparities**.



Dr. Sanjeev Arora



Started at the University of New Mexico

- 8 month wait in Hep C clinic

Developed Project ECHO for Hep C in 2003

- ✓ Interdisciplinary team
- ✓ Recruited willing primary care providers
- ✓ Used video technology
- ✓ Published studies
- ✓ Showed reduced wait times, increase numbers of treated Hep C patients, and PCPs outcomes were equal to specialists



SHOW-ME ECHO MODEL

The Five Key Components of ECHO



1

Use technology to leverage scarce resources- Amplification

2

Share Best practices to reduce disparities



3

Case-based learning to master complexity

4

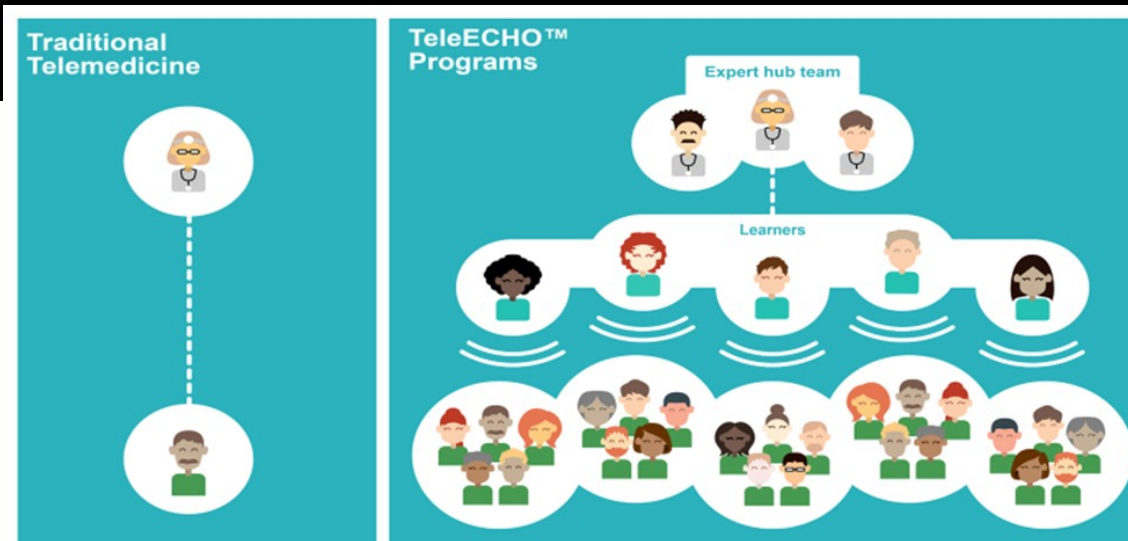
Focus on the "O" for Outcomes- Evaluation

5

Create Learning Communities



HUB AND SPOKE MODEL



ECHO CYCLE

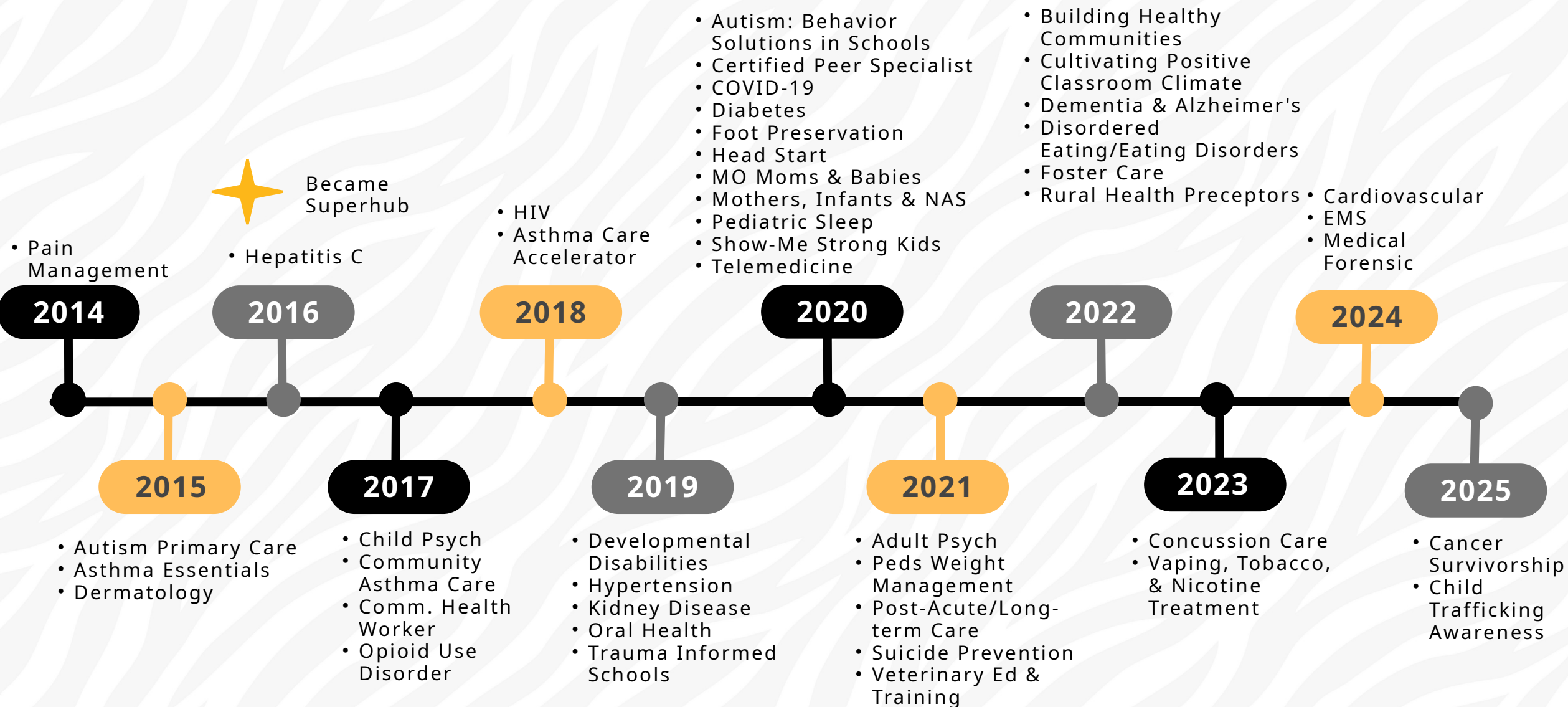
- ✓ Subject matter experts share knowledge, acquire new knowledge, facilitate learning
- ✓ Participants acquire new skills and knowledge, gain confidence, join learning community
- ✓ Community members receive advanced, equitable care, increase access to resources, apply best practices

When all the principles are applied, a learning community in which **"ALL TEACH and ALL LEARN"** comes together. *This includes:*

- *Interactive components*
- *Guided practice*
- *Ongoing mentorship*
- *Peer-to-peer learning*
- *Collaborative problem-solving*



HISTORY OF SHOW-ME ECHO





ECHO SESSION: HOW IT WORKS



Brief Didactic → Case Discussion & Questions → Recommendations

CASE PRESENTATION

Participant
sends de-
identified case



Hub reviews
case prior to
ECHO



Participant
presents case
during ECHO
session



Hub facilitates
discussion



Recommendations
are made



Case and
recommendation
forms are filed in
SharePoint



SHOW-ME ECHO BY THE NUMBERS



3,500+
ORGANIZATIONS HAVE
PARTICIPATED



100,000+
TOTAL HOURS OF
INSTRUCTION



**89% of
learners**
INDICATE CHANGES TO
PRACTICE



11,000+
PARTICIPANTS IN SHOW
ME ECHO

**Since 2014*



SHOW-ME ECHO REACHES ALL OF MISSOURI

Since its inception in 2014, Show-Me ECHO has addressed topics of importance to Missourians in clinical care, behavioral health, education, and community well-being.



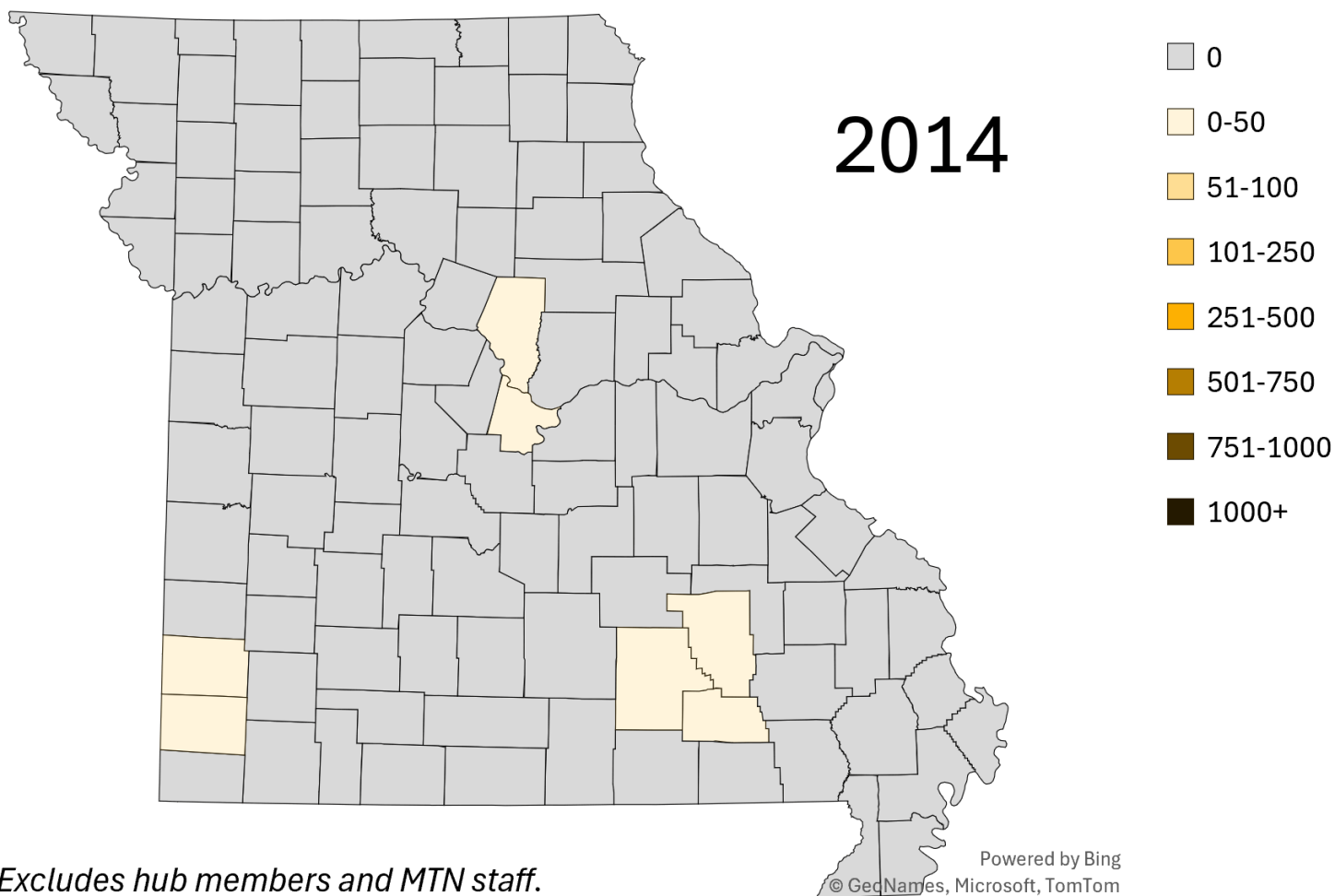
2024 Annual Report : <https://adobe.ly/3RZmd1v>

Or scan the QR code for more information





Show-Me ECHO Cumulative Attendance







PATIENT

- **Reduced need for travel**, saves money, less impact on family and work life
- **Patient gets care from a clinician they know and trust**
- More direct route to **“right care, right place, right time”** creates improved outcomes, improved quality of life, reduced pain and anxiety, reduced downstream complications
- **Saves money!** Fewer visits to specialists saves co-pay and insurance fees



CLINIC

- Clinic now has an **in-house specialist** (or a few who can refer to one another), which allows them to provide specialty care they couldn't otherwise offer, and bill for this care.
- **Patients are kept local** – when appropriate
- **Improve patient satisfaction**
- **Improve patient outcomes**
- **Improve staff satisfaction and engagement**
- **Reduce professional isolation.**



A background image of a Black male doctor with glasses, wearing a white lab coat over a dark t-shirt, with his arms crossed. The image is semi-transparent, allowing text to be overlaid.

PARTICIPANT

- **Free continuing education credits**, without travel costs or inconvenience, plus MOC.
- **Stay up to date with best practices!** Learning is ongoing, relevant and interactive.
- **Develop advanced skills**
- Opportunities to engage in **community-based research**.
- **Personally engaging and fun** – builds a learning collaborative community – all teach, all learn
- **Professional development** – new skills and opportunities can contribute to growing responsibility and job prospects.
- **Consult with multidisciplinary teams of experts**, regularly, allowing you to keep your patients local



A healthcare worker in blue scrubs is smiling and supporting an elderly man in a wheelchair. The man is also smiling and looking towards the healthcare worker. The background is a blurred clinical setting.

COMMUNITY

- **Healthcare dollars kept local**
- **Reduced impact on workforce**, days missed, etc.
- **Improved sense that a community** where “we can take care of its own people and its own problems using its own resources.”
- **Economic development** for a small town to attract businesses, doctors, etc.
- **Reduced turnover** at clinic is a powerful stabilizing force for a community





HUB

- **Efficient triage** of resources
- **Professional engagement** improves, as mentoring and sharing are highly energizing and rewarding for hub team members.
- **Scholarship**, publicity and high-profile opportunities highlight what the university/organization is doing for the community – good for reputation (with public and legislators).
- **Faculty development** – ECHO creates opportunities for research, teaching and professional development across faculties.



A group of six healthcare professionals, including doctors and nurses, are standing in a modern hospital hallway. They are all smiling and looking towards the camera. The background shows a clean, well-lit corridor with large windows and doors.

SYSTEM

- **Reduced waste:** fewer unnecessary tests, less travel (subsidized), fewer visits paid for.
- **Reduced hospitalization**, ED visits. Increased pharmacy costs.
- **Improved prevention**, health and outcomes for patients reduces downstream interventions: heart attacks, dialysis, amputations, blindness, cancer, disability, addiction, etc.
- **Lower costs**
- **Increased use of best-practices**





SHOW-ME ECHO TOPICS

Adult Psych

Asthma

Autism

**Autism: Behavior
Solutions**

**Building Healthy
Communities**

**Certified Peer
Specialist**

Child Psych

**Community
Health Worker**

Concussion Care

**Cardiovascular
Disease**

**Dementia &
Alzheimer's**

Dermatology

**Developmental
Disabilities**

Diabetes

**Disordered
Eating & Eating
Disorders**

Foster Care

Head Start

**Infectious
Diseases**

Hepatitis C

HIV

Hypertension

Kidney Disease

**Mothers,
Infants, & NAS**

**Opioid Use
Disorder**

Medical Forensic

**Pediatric Weight
Management**

**Suicide
Prevention in
Health Care**

**Emergency
Medical Services
(EMS)**

**Family Support
Provider**

**IBT for Healthy
Weight**

**Vaping, Tobacco,
& Nicotine
Treatment**

**Veterinary
Education &
Training**

**Cancer
Survivorship
(coming soon)**

**Child Trafficking
Awareness
(coming soon)**

5 Key Indicator s of ECHO Success



Participant Satisfaction (survey)



Fidelity to the ECHO Model (observations)



% of Cases Presented by Spoke (session data)



Participation (average attendance, target audience reach)



Pre-post Self-Efficacy for ECHO-related Knowledge and Skills (survey).

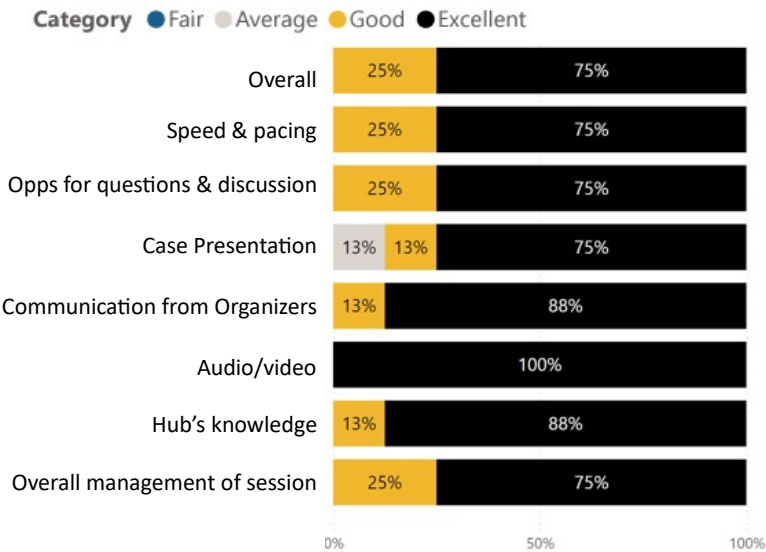
Foster Care

Satisfied with Learning Experience

95% Ave to Excellent in all

- (n=8)
- Met for 8 of 8 areas

Met = 1



Follow Core Principles

Session Obs – 80%+ in all 5 principles
Mid Year - 80%+ in all 5 principles

Mid-Year = 80% + in 5 of 5 principles

Close = .5

Session Obs = 80% + in 5 of 5 principles

Not Met

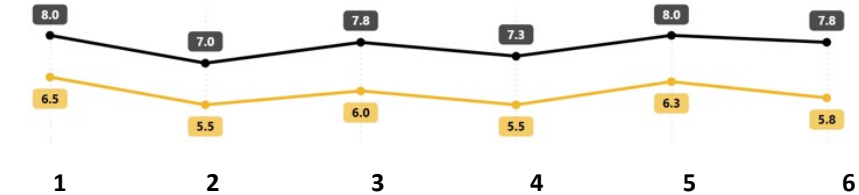
Target Audience: Primary care providers and organizations (whole clinic approach), Enrolled MOHealthNet Providers, FQHC, Safe-Care Providers, School nurses, Health information specialists within the Children's Division, Community Health Worker

Self-Efficacy (n=8)

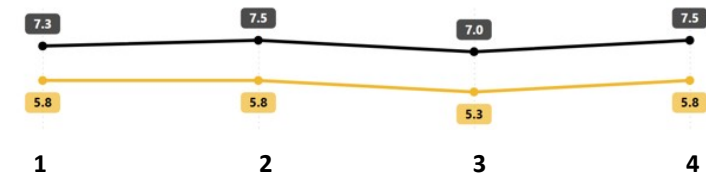
10 of 10 questions = 100%

Exceeds = 1.5

75% of questions with a 6+ post ECHO average



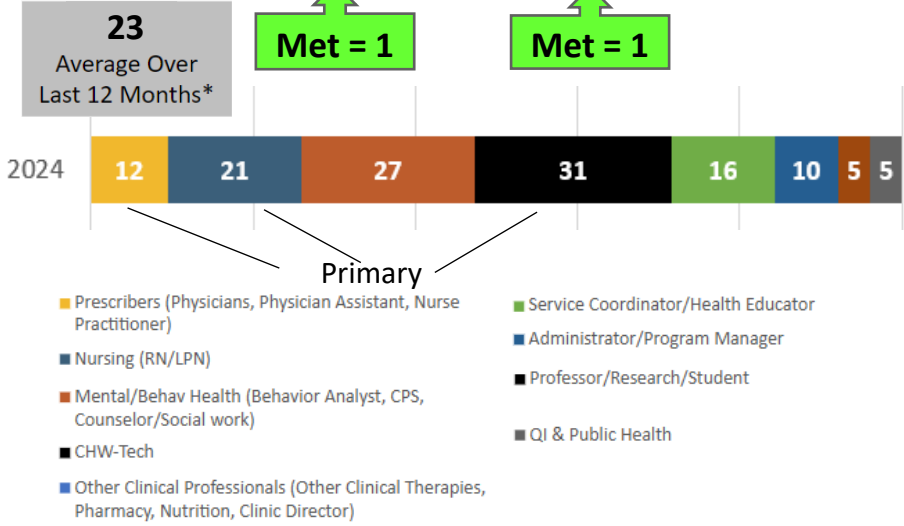
1. Treat patients who are involved with the foster care and/or child welfare system.
2. Suggest evidence-based way to care for patients and caregivers who are involved with the foster care and/or child welfare system.
3. Make appropriate referrals to treat patients who are involved with the foster care and/or child welfare system.
4. Help my patients and their caregivers who are involved with the foster care and/or child welfare system understand the reasons for their medical treatments and recommendations.
5. Serve as the local resource in my clinic and my part of the state for patients and caregivers who are involved with the foster care and/or child welfare system.
6. Use what I have learned about the foster care and child welfare system to treat those in my care.



1. Appreciate an evidence-based approach to the medical evaluation for children involved with the child welfare system, including child physical or sexual abuse.
2. Understand a trauma informed approach to caring for children involved with the foster care and/or child welfare system.
3. Identify developmental and mental health needs specific to children in the child welfare system.
4. Provide appropriate education, treatment and/or referrals for improved communication and coordination of care.

Target Audience

Minimum of 15 attendees with at least 50% target



Cases Presented by Spokes

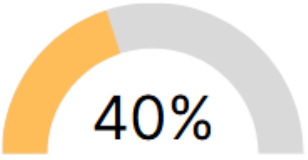
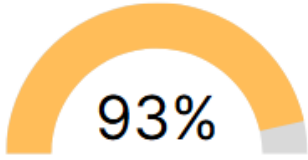
65-74% of sessions with a case, 41-60% of sessions with a case presented by a spoke.

Exemplary = 2

Close = .5

SESSIONS WITH A CASE

SESSIONS WITH A CASE BY SPOKE



6 Cases by Spoke

14 Total Cases

15 Sessions



“

This ECHO is a thought-provoking experience. My decision tree in terms of assessing and treating those presenting with suicidal thoughts **has been permanently changed because of this ECHO**. It gives practitioners the confidence to engage with these clients in an effective, competent manner.

”

- Suicide Prevention ECHO Participant



“

Participation in ECHO has given me **new treatment ideas** that I can apply to my current patients. I have also gained a better understanding of the role of other disciplines in **comprehensive management** which will help me to make better suggestions for referrals in the future.

”

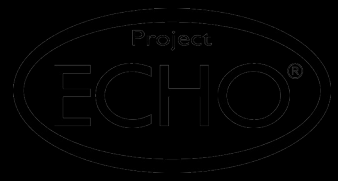
- Concussion Care ECHO Participant



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LEARN MORE AND REGISTER AT

WWW.SHOWMEECHO.ORG



QUESTIONS?

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