Eat, Sleep, Console

Hosted by the Maternal Substance Exposure (MatEx) Database

August 18th, 2021

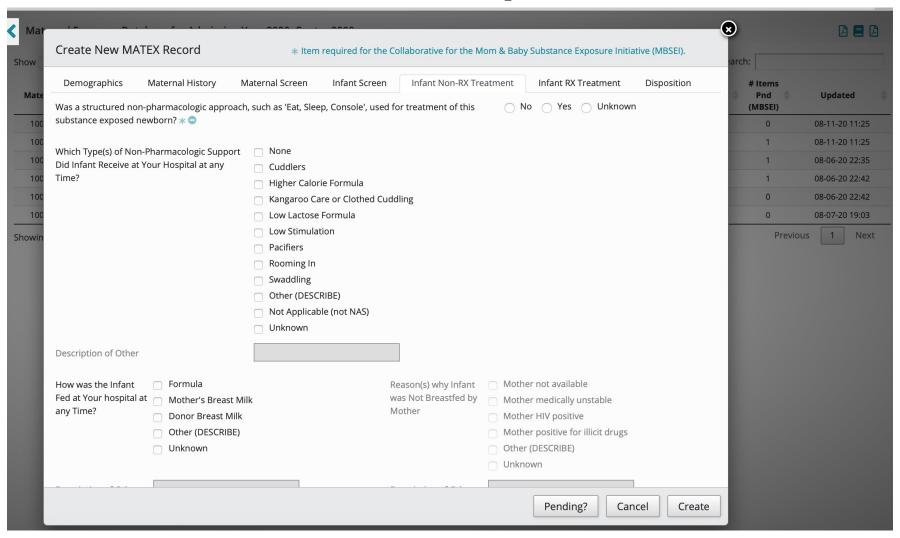


Overview

- Welcome and brief explanation of the Maternal Substance Exposure (MatEx) database (2 minutes)
- Sharing MatEx research for increasing mother's own milk at discharge (5 minutes)
- Presentation on ESC (10 minutes)
- Q&A (35 minutes)
- Wrap Up (2 minutes)



MatEx Snapshot



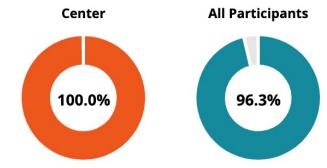
Hide Demo Center in charts

Hide All MATEX Participants in charts

Hide data labels in bar charts

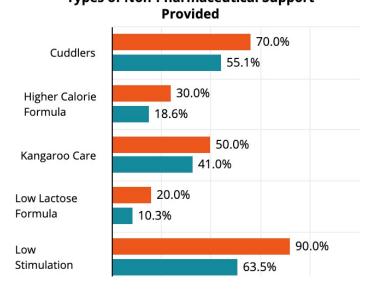
Show tables instead of charts

% of Infants for with Non-Pharmacologic **Treatment**

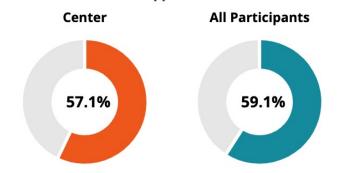


No missing or unknown responses for Demo Center.

Types of Non-Pharmaceutical Support

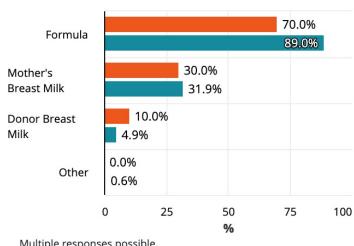


% of Infants for whom a Structured Non-Pharmacologic **Treatment Approach was Used**



3 (30.0%) records for Demo Center with a missing or unknown response excluded.

Infant Feed Types while Hospitalized



Multiple responses possible.

No missing or unknown responses for Demo Center



MatEx Data

- 600 infant records from 32 hospitals
- 92% are cared for in the NICU, 17% also cared for in Well Baby
- Some non-pharmacologic treatment: 96%
 - ESC or similar approach: 37% among infants with NAS/NOWS & ≥ 34 weeks GA
 - Slight downward trend in general non-pharmacologic treatment & ESC use
- Some pharmacologic treatment: 66%
 - Slight upward trend in pharmacologic treatment



FOUR POTENTIALLY BETTER PRACTICES

The following practices are based on information collected from CPQCC's Maternal Substance Exposure (MatEx)

Database. The MatEx Database tracks maternal substance exposure and NAS/NOWS across California hospitals. The
database allows participating hospitals to identify variations in care practices and to improve the management of infants
with NAS/NOWS.



SHIFT MINDSET

Infants with NAS/NOWS are not addicts. They have been exposed to substances in utero and may be suffering from withdrawal. Avoid stigmatizing mothers with substance exposure. Substance use disorder should be viewed as a disease, not a choice. Nonjudgmental care may lead to better breastfeeding outcomes, increased educational opportunities, and better post-discharge care for the infant.



SUPPORT SAFE BREASTMILK

For mothers of infants with NAS/NOWS, breastfeeding is recommended as long as the mother is HIV-negative and enrolled in a medication-assisted treatment program. Infants of mothers who received additional services (including therapy, social work, counseling, etc.) are more likely to be discharged on their mother's own milk. Supporting the mother-baby dyad is critical to improving infant outcomes.



ALLOW FOR ROOMING IN

Infants diagnosed with NAS/NOWS prefer quiet, low-light environments as they are often sensitive to their surroundings early on. Infant outcomes are also improved if they are allowed to stay in the same room as their caregivers where they have more opportunities for bonding and experience less stress, as opposed to being transferred to the NICU or Nursery.



ENCOURAGE KANGAROO CARE

Kangaroo care promotes the infant's ability to self-regulate and has been shown to reduce infant withdrawal symptoms. Reducing the anxiety and stress of the infant and mother are key to promoting breastfeeding. Increased skin-to-skin time is highly correlated with the infant receiving their mother's own milk at discharge.

DISCOVER MORE WAYS TO IMPROVE CARE FOR INFANTS WITH NAS/NOWS

cpacc

What is Eat, Sleep, Console?

Lisa Chyi, MD & MatEx Co-Chair



Finnegan cuddles one of patients at Thomas Jefferson University Hospital's Family Center for drug dependent mothers and their infants.

Twenty years ago, Loretta Finnegan first became aware of the agony faced by addict mothers and their babies. And she set out to do something about it.



One doctor's crusade

"Is not merely crack, Dr. Loretta P. Finnegan is trying to explain. That might make things onlier, and nothing

expense. Here major make temps concer, and nothing about what Plantagan does it care. "You have to undorstand, we don't have women coming in here just using one drug they're generally using three Sometimes in more," says Plantagas, shaking her next of copper-colored hair. "The heroin users are also using Values. A third of the methodone petients are also on escaine. Fifty percent of the escaine users are also smoking pot; an even larger percentage are using alcohol. And 96 percent of these women smoke nicotice."

Finnegan is not just speaking of drug usors. She is speaking of propused drug users, the women and their children whom she has helped for the last two decades lead happier, better lives. For her efforts, she received the MCP-Combel Award last Thursday, it is given annually to a woman, usually from the Philadelphia area, for outstanding humaniturian achieve-

"I recently gave a seminar on the effects of drugs on infants," says Finnegan, director of Thomas Jefferson University Hospital's Family Center for drag-dependent mothers and their infants, which she founded in 1976, "and it took seven hours because it took an hour to explain the horrible consequences of each drug. Each one separately is bud enough but when you combine them, it's like hemorrhaging,"

The center new treats about 400 clients - all mothers - a

year. The number treated depends on available funding.
When an addict has a buby, about everything that can go horribly wrong for the infant does punishing physical disabilties, severe mental disabilities, tremors, settares, heart discrders, sleep disorders, digostive problems, malestrition, strokes, fevers, drug addiction.

Or the babies just die - either at birth, or during the first few months of their bratal little lives.

Sometimes a great notion is born of one small incident, an event that others might easily dismiss in passing. Finnegan experienced one of those moments 20 years ago, and it simply

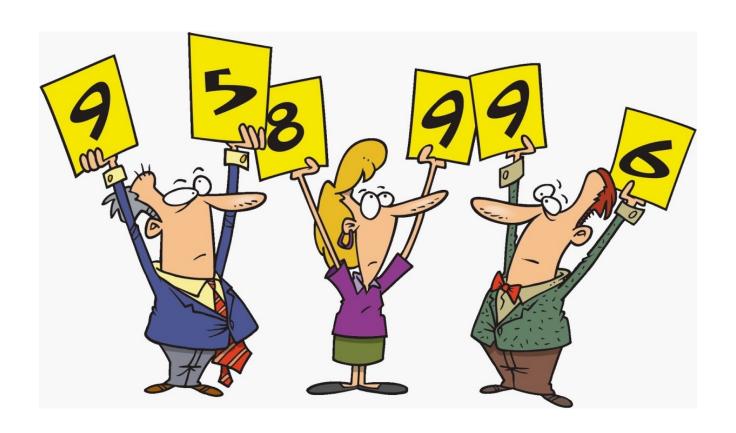
She was then a young pediatrician at the old Philadelphia General Hospital, working in the intensive-care nersory, inter-



Finnegan Neonatal Abstinence Scoring Tool

| Signs & Symptoms | Time | AM | | | | | | | PM | | | | | | Comments | |
|---|-----------|-------------|-----|----|----|--|---|---|----|---|---|---|--|--|----------|----------|
| 576 154 5 | | Score | | | | | | | | | | | | | | Comments |
| Central Nervous System Disturba | ances | æ | | | | | | | | | | | | | | |
| Crying: Excessive High Pitched Crying: Cont. High Pitched | | 2 3 | | | | | | | | | | | | | | |
| Sleeps < 1 Hr After Feeding Sleeps < 2 Hr After Feeding Sleeps < 3 Hr After Feeding | | 3 2 1 | | | | | | | | | | | | | | |
| Hyperactive Moro Reflex Markedly Hyperactive Moro Reflex | | 2 3 | | | | | | | | Г | | | | | | |
| Mild Tremors: Disturbed Mod-Severe Tremors: Disturbed | | 1 2 | | | | | | | | | | | | | | |
| Mild Tremors: Undisturbed Mod-Severe Tremors Undisturbed | | 3 4 | | | | | | | | | | | | | | |
| Increased Muscle Tone | | 2 | | | | | | | | Г | | Г | | | | |
| Excoriation (Specific Area) | | 1 | | | | | Г | | | Г | Г | | | | | |
| Myoclonic Jerk | | 3 | | | Г | | | | | Г | Г | Г | | | | |
| Generalized Convulsions | | 5 | | | | | Г | | | Г | Г | Г | | | | |
| Metabolic, Vasomotor And Respi | iratory [| Dist | urb | an | ce | | | | | | | | | | | |
| Sweating | | 1 | | | Π | | Γ | Π | | Π | Π | Π | | | | |
| Fever < 101 (37.2-38.3c) Fever > 101 (38.4c) | | 1 2 | | | | | | | | | | | | | | |
| Frequent Yawning (> 3) | | 1 | | | | | Г | | | Г | П | | | | | |
| Mottling | | 1 | | | | | | | | | | | | | | |
| Nasal Stuffiness | | 1 | | | | | | | | | | | | | | |
| Sneezing (>3) | | 1 | | | | | | | | Г | | | | | | |
| Nasal Flaring | | 2 | | | | | | | | | | | | | | |
| Respiratory Rate (> 60/Min) Respiratory Rate (>60/Min With Ret | ractions | 1 2 | | | | | | | | Γ | | | | | | |

Finnegan Score Reliability





PEDIATRICS

OFFICIAL JOURNAL OF THE AMERICAN ACADEMY OF PEDIATRICS

An Initiative to Improve the Quality of Care of Infants With Neonatal Abstinence Syndrome

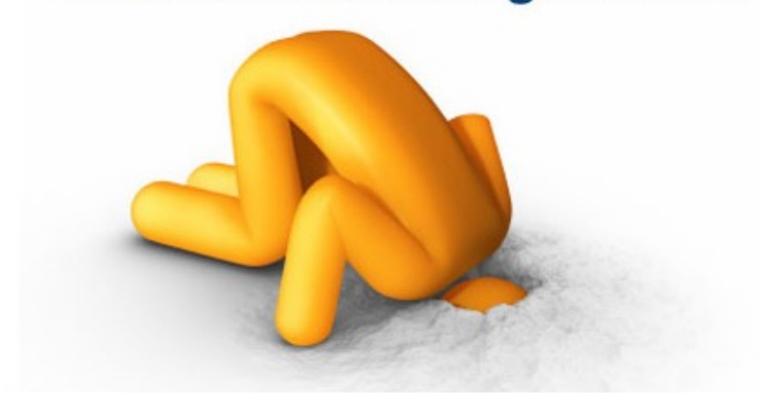
Matthew R. Grossman, Adam K. Berkwitt, Rachel R. Osborn, Yaqing Xu, Denise A. Esserman, Eugene D. Shapiro and Matthew J. Bizzarro Pediatrics 2017;139;; originally published online May 18, 2017; DOI: 10.1542/peds.2016-3360

The online version of this article, along with updated information and services, is located on the World Wide Web at:

/content/139/6/e20163360.full

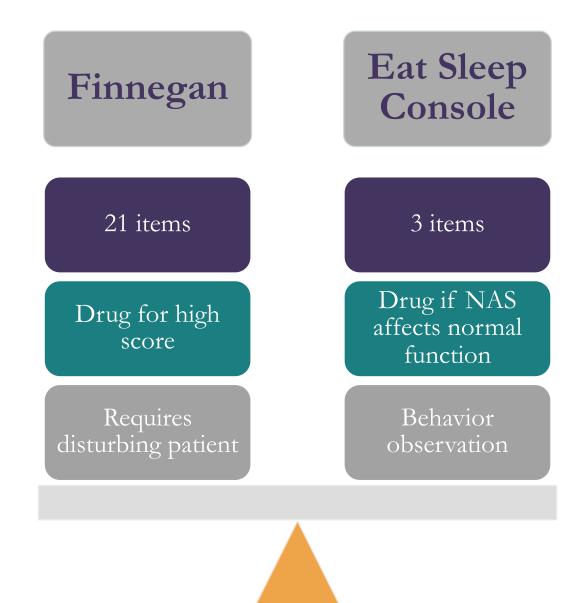


Time for a Paradigm Shift?





Comparing the tools



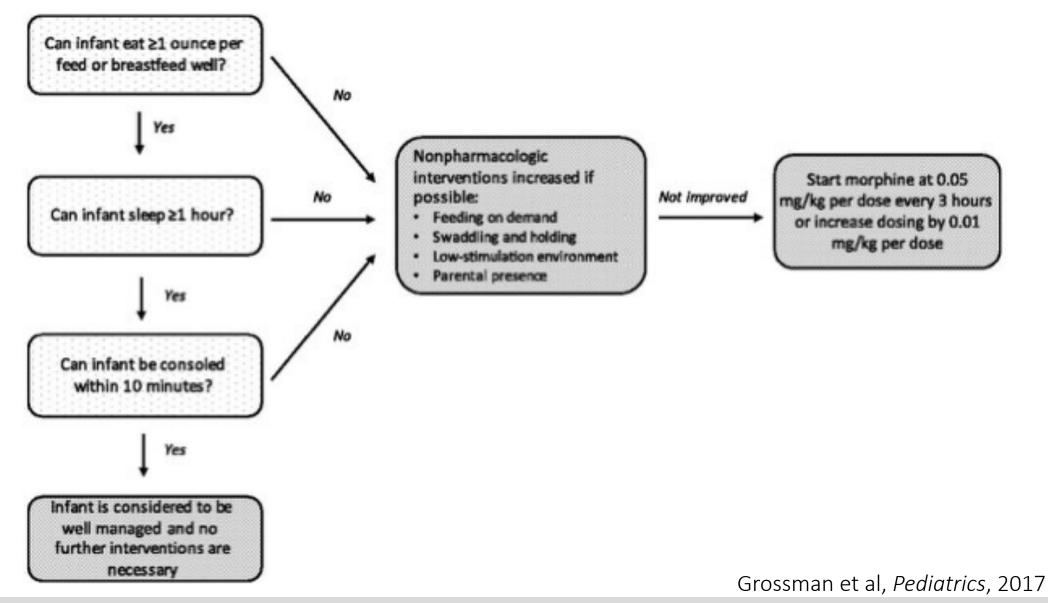


Eat, Sleep, Console (ESC) Approach

- First Line Non-Pharmacologic Care
 - Parental involvement
 - Low stimulation environment
- Finnegan score (FNASS) in well baby. If FNASS >8, transferred to Pediatric unit
- ESC guided management

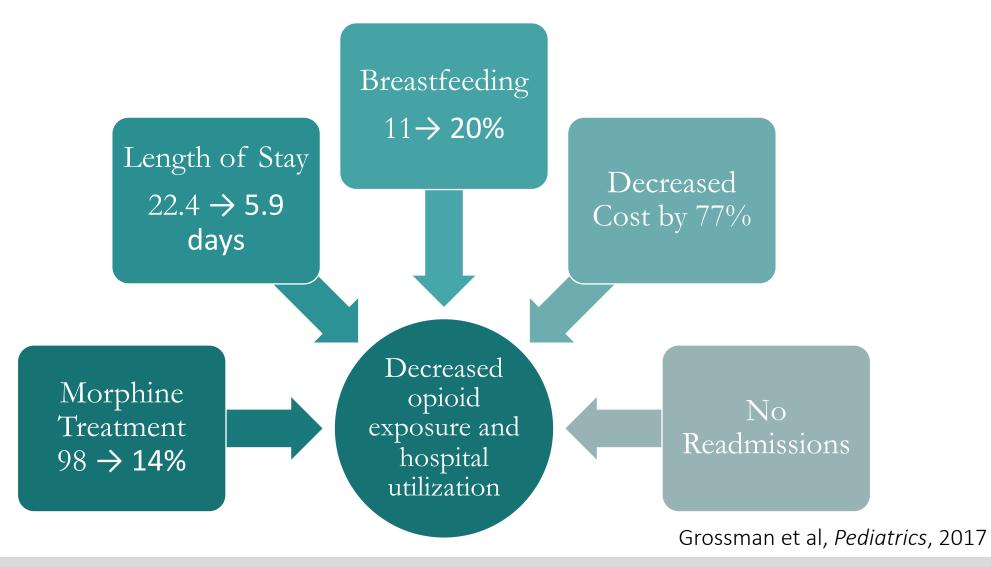


Eat Sleep Console (ESC) Approach



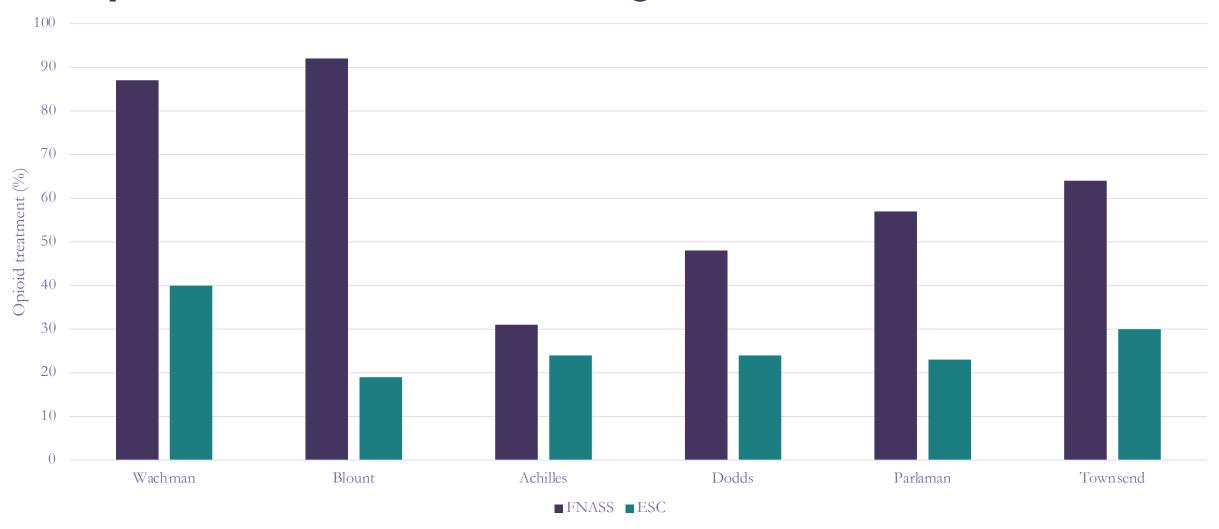


ESC Outcomes



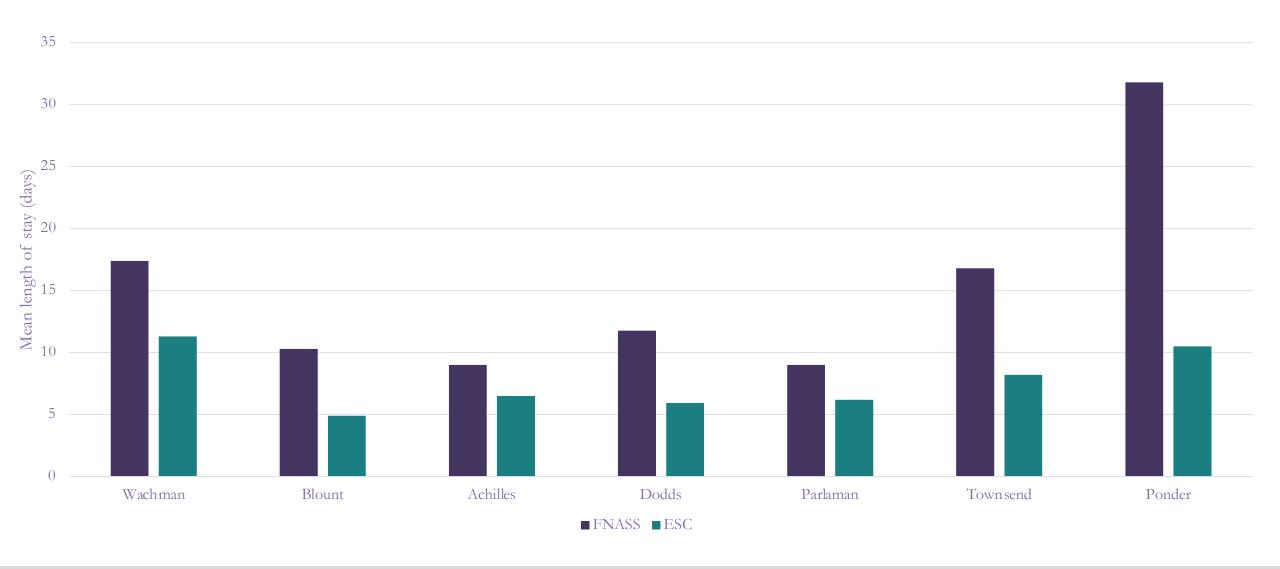


Opioid treatment rates among infants with NAS/NOWS





Length of stay among infants with NAS/NOWS





Parent experience

"[The doctors wanted to focus on] his sleeping, his eating, like I said, pooping: if he was pooping and peeing normal. I guess they just wanted him to be doing stuff that normal babies were doing."

"They didn't really check her as much as my son. They came in a lot and did the assessment with him a lot more than they did with her. He didn't like any of that; it was a lot of for him."

"I was actually expecting to be here for a week and a half. But we actually weren't there as long as I thought we were going to be." Supportive of fewer interventions and normalizing newborn care

Encouraged to lead infant's NAS/NOWS care

Felt
inadequately
prepared for
what to expect
in hospital after
delivery

Experienced feelings of guilt, fear and stress

McRae et al, Hospital Pediatrics, 2021



Additional Concerns

Care Location: Mom baby only, NICU (level 2-4), Pediatrics

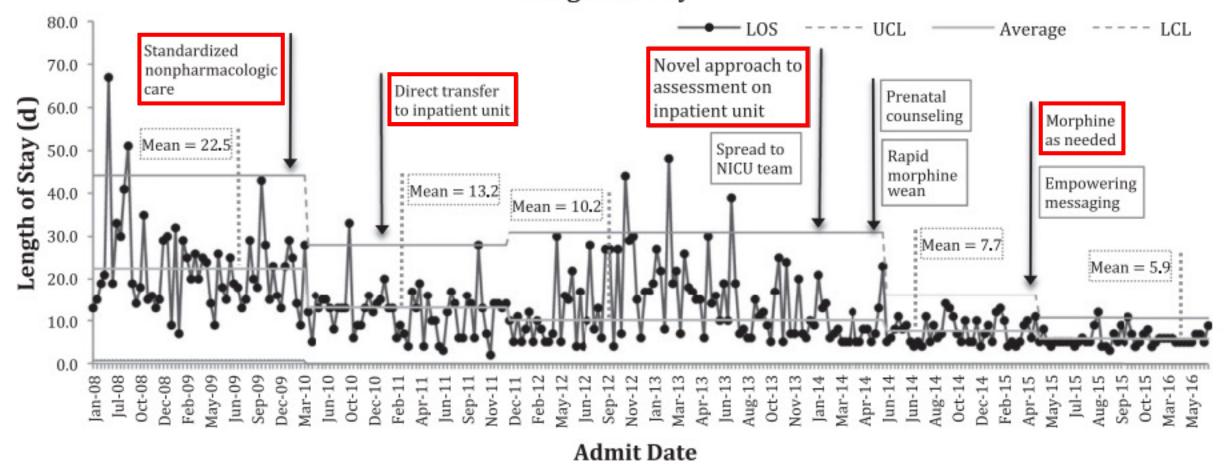
Medication: morphine, methadone, clonidine, phenobarbital

Medication dosing: prn vs scheduled

Long term: unknown



Length of Stay



Q&A Panelists

Joanne Kuller, CNS at UCSF Oakland

Lee Trope, Pediatrician at Santa Clara Valley Medical Center

Moderated by Angela Huang, RNC-Nic, BSN, MPH & MatEx Co-Chair



Please submit your questions in the Q&A box.

nastoolkit.org



CACC

If your NICU is interested in learning more about the MatEx database, submit a help ticket at:

www.cpqcchelp.org