

Further Improving Care for Infants affected by NAS through Antenatal Outreach and Breastfeeding Support at Einstein Montgomery

PA PQC Virtual Session

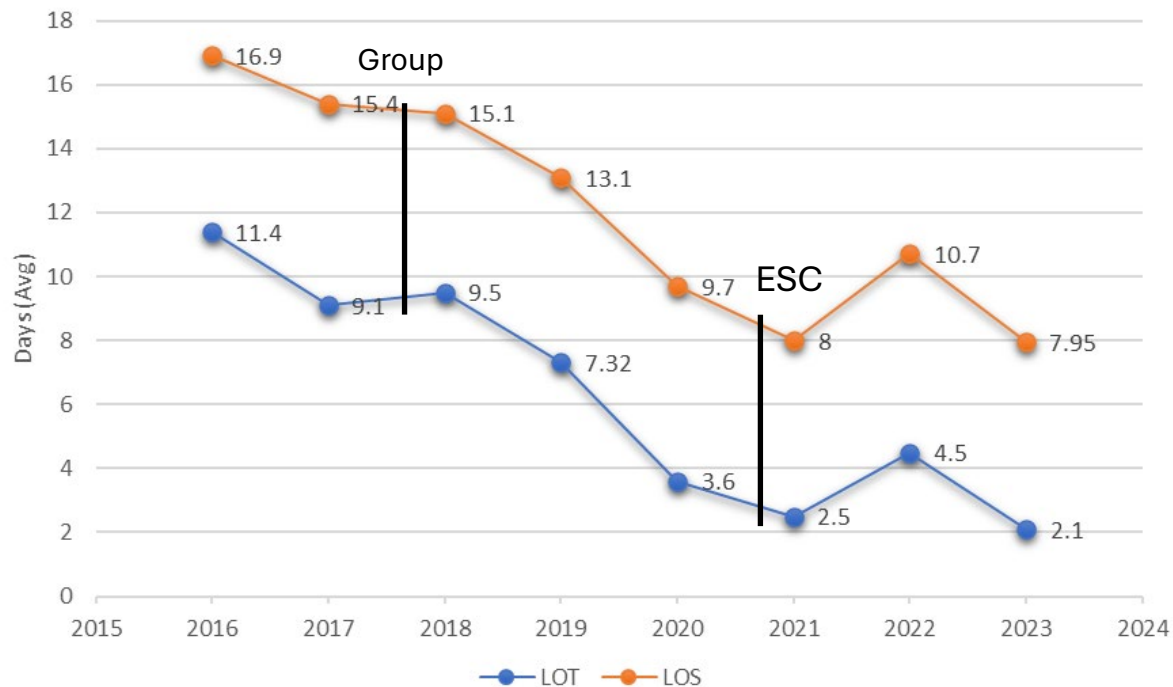
March 21, 2024

Celina Migone, MD

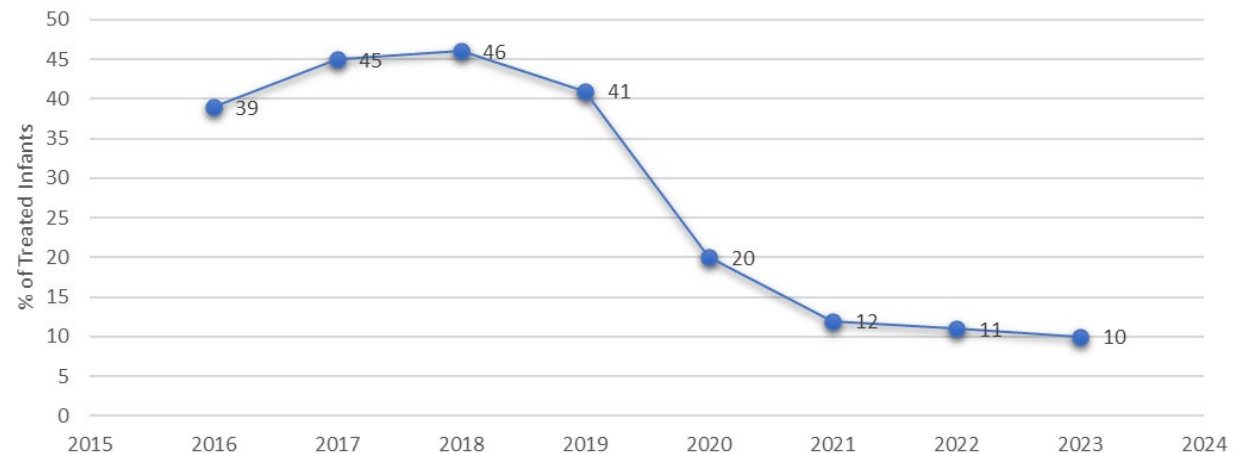
Amy Lembeck, DO

“Just the Numbers”

Length of Treatment and Stay



Percent of Infants Affected by NAS Receiving Scheduled Morphine



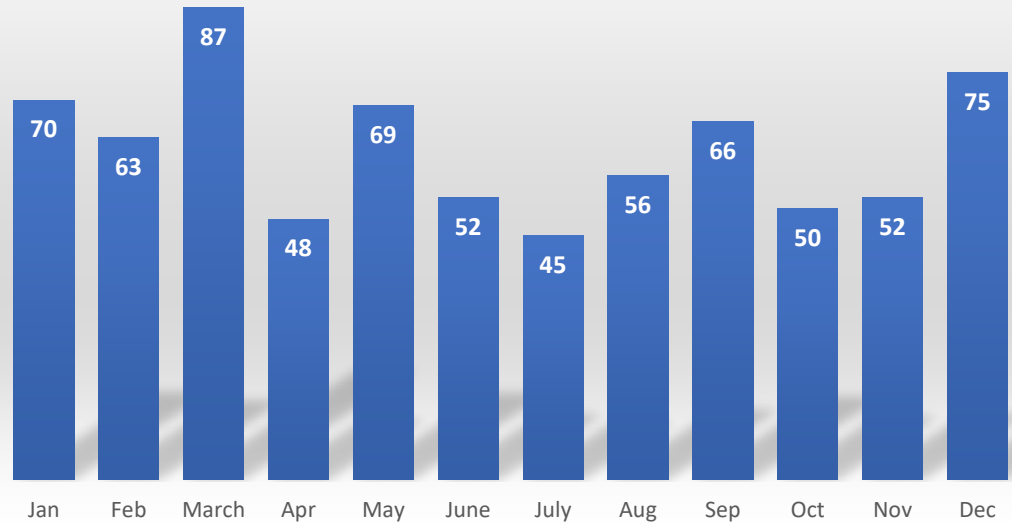
Wrap-Around Care Model

- Multidisciplinary Team
- Antenatal Outreach
 - MAT clinics
- Inpatient Management
- Discharge Support
- Early Intervention Referrals

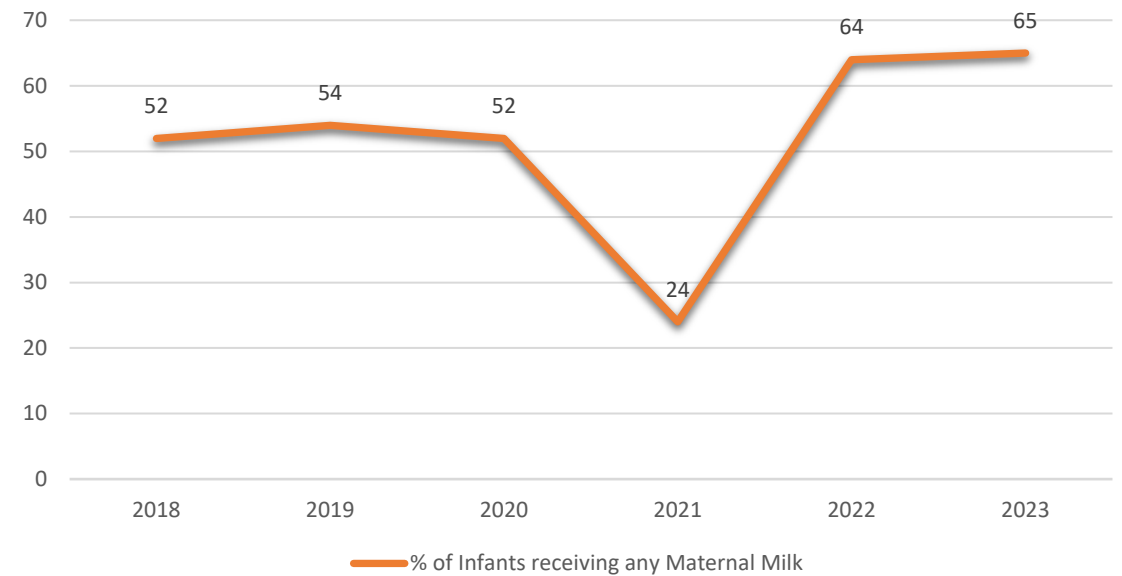


Breastfeeding at EMCM

Rates of Exclusive Breastmilk Feeding-ALL Infants



% of Infants receiving any Maternal Milk-Infants affected by NAS



Breastfeeding Traffic Light

Upcoming Changes

Updated: January 31, 2023
Reviewed: January 31, 2023



Panel's Recommendations

- People with HIV should receive evidence-based, patient-centered counseling to support shared decision-making about infant feeding. Counseling about infant feeding should begin prior to conception or as early as possible in pregnancy; information about and plans for infant feeding should be reviewed throughout pregnancy and again after delivery **(AIII)**. During counseling, people should be informed that—
 - Replacement feeding with properly prepared formula or pasteurized donor human milk from a milk bank eliminates the risk of postnatal HIV transmission to the infant **(AI)**.
 - Achieving and maintaining viral suppression through antiretroviral therapy (ART) during pregnancy and postpartum decreases breastfeeding transmission risk to less than 1%, but not zero **(AI)**.
- Replacement feeding with formula or banked pasteurized donor human milk is recommended to eliminate the risk of HIV transmission through breastfeeding when people with HIV are not on ART and/or do not have a suppressed viral load during pregnancy (at a minimum throughout the third trimester), as well as at delivery **(AI)**.
- Individuals with HIV who are on ART with a sustained undetectable viral load and who choose to breastfeed should be supported in this decision **(AIII)**.
- Individuals with HIV who choose to formula feed should be supported in this decision. Providers should ask about potential barriers to formula feeding and explore ways to address them **(AIII)**.
- Engaging Child Protective Services or similar agencies is not an appropriate response to the infant feeding choices of an individual with HIV **(AIII)**.

Clinicians are encouraged to consult the national [Perinatal HIV/AIDS](https://www.hiv.gov/perinatal) hotline (1-888-448-8765) with questions about infant feeding by individuals with HIV **(AIII)**.

Rating of Recommendations: A = Strong; B = Moderate; C = Optional

Rating of Evidence: I = One or more randomized trials with clinical outcomes and/or validated laboratory endpoints; II = One or more well-designed, nonrandomized trials or observational cohort studies with long-term clinical outcomes; III = Expert opinion

Green Light	
This substance may continue to be used by the breastfeeding mother. This mother may continue to breastfeed with her current diagnosis or condition.	
Substance or Condition	Special Considerations
Acetaminophen + oxycodone (Percocet)	When the substance is prescribed. If NAS is observed in the infant, continue to encourage breastfeeding.
Buprenorphine (Subutex)	When the substance is prescribed as part of a treatment program. If NAS is observed in the infant, continue to encourage breastfeeding.
Buprenorphine + Naloxone (Suboxone)	When the substance is prescribed as part of a treatment program. If NAS is observed in the infant, continue to encourage breastfeeding.
Caffeine	Moderate intake. If the infant appears jittery or irritable, reducing caffeine consumption may be advised.
Lorazepam	When the substance is prescribed. If NAS is observed in the infant, continue to encourage breastfeeding.
Methadone	When the substance is prescribed as part of a treatment program. If NAS is observed in the infant, continue to encourage breastfeeding.
Selective Serotonin Reuptake Inhibitors (SSRIs)	Some SSRIs are preferred over others; however, all SSRIs are considered compatible with breastfeeding . Discussion regarding specific SSRIs can occur between the mother and her prescriber.
<ul style="list-style-type: none"> • citalopram (Celexa) • escitalopram (Lexapro), • fluoxetine (Prozac) • fluvoxamine (Luvox) • paroxetine (Paxil) • sertraline (Zoloft) 	If NAS/toxicity is observed in the infant, continue to encourage breastfeeding.
Yellow Light	
This substance may continue to be used by the breastfeeding mother with caution, but it is recommended to reduce or eliminate use . This mother may continue to breastfeed with the listed diagnosis or condition under the specified conditions .	
Substance or Condition	Special Considerations
Cannabis	Data is insufficient to determine if maternal cannabis use is safe for the breastfeeding infant. At this time while the mother may continue to breastfeed, it is strongly encouraged that she stops cannabis use.
Hepatitis B	Breastfeeding should not be delayed for the infant to receive the Hep B immunization. In the case of an open wound on the nipple, the mother should temporarily suspend breastfeeding until the wound has healed while pumping to support her milk supply. Contact lactation services for a consultation.
Hepatitis C	In the case of an open wound on the nipple, the mother should temporarily suspend breastfeeding until the wound has healed while pumping to support her milk supply. Contact lactation services for a consultation.
Herpes, inactive or active with no lesions on the breast	When herpes is active with lesions present on the breast, breastfeeding should be suspended until the lesions have resolved. The mother should pump to support her milk supply. Contact lactation services for a consultation.
Nicotine	All mothers should be encouraged to reduce or eliminate nicotine use. Breastfeeding may continue while reducing or eliminating use of nicotine. Recommendations include smoking after, not before, feeding and smoking outside the infant's home.
Red Light	
This substance is contraindicated during breastfeeding. This mother may not continue to breastfeed with the listed diagnosis or condition.	
Substance or Condition	Special Considerations
Cocaine	Street drugs are contraindicated during breastfeeding. See lactation services for the Academy of Breastfeeding Medicine's recommendations for mothers with cocaine substance use disorder.
Heroin	Street drugs are contraindicated during breastfeeding. Mothers who admit to heroin use during pregnancy should be encouraged to breastfeed during their hospital stay and enter a drug treatment program, but discontinue breastfeeding if they plan to continue heroin use.
HIV	At this time the CDC advises against breastfeeding for HIV+ mothers, even when being treated with anti-retroviral therapy.

This list is not meant to imply absolute safety of any medication while pregnant or breastfeeding

Breastfeeding Traffic Light

Upcoming Changes

Green Light	
This substance may continue to be used by the breastfeeding mother. This mother may continue to breastfeed with her current diagnosis or condition.	
Substance or Condition	Special Considerations
Acetaminophen + oxycodone (Percocet)	When the substance is prescribed encourage breastfeeding.
Buprenorphine (Subutex)	When the substance is prescribed in the infant, continue to encourage breastfeeding.
Buprenorphine + Naloxone (Suboxone)	When the substance is prescribed in the infant, continue to encourage breastfeeding.
Caffeine	Moderate intake. If the infant appears to have excessive sleepiness or poor feeding, consumption may be advised.
Lorazepam	When the substance is prescribed encourage breastfeeding.
Methadone	When the substance is prescribed in the infant, continue to encourage breastfeeding.
Selective Serotonin Reuptake Inhibitors (SSRIs)	Some SSRIs are preferred over others with breastfeeding . Discussion recommended with mother and her prescriber.
<ul style="list-style-type: none"> citalopram (Celexa) escitalopram (Lexapro), fluoxetine (Prozac) fluvoxamine (Luvox) paroxetine (Paxil) sertraline (Zoloft) 	If NAS/toxicity is observed in the infant, consider alternative options.
Yellow Light	
This substance may continue to be used by the breastfeeding mother, but is recommended to reduce or eliminate use . This mother should be counseled on the risks of the listed diagnosis or condition under the current circumstances .	
Substance or Condition	Special Considerations
Cannabis	Data is insufficient to determine if breastfeeding infant. At this time, it is strongly encouraged that she stop breastfeeding until the infant is 2 months old.
Hepatitis B	Breastfeeding should not be delayed for immunization. In the case of an open wound, temporarily suspend breastfeeding until the wound is healed. Contact lactation support for her milk supply.
Hepatitis C	In the case of an open wound on the breast, temporarily suspend breastfeeding until the wound is healed. Contact lactation services for a consultation.
Herpes, inactive or active with no lesions on the breast	When herpes is active with lesions on the breast, temporarily suspend breastfeeding until the lesions have healed. Contact lactation services for a consultation.
Nicotine	All mothers should be encouraged to quit smoking. If a mother continues to smoke, she should avoid smoking after, not before, breastfeeding.
Red Light	
This substance is contraindicated . This mother may not continue to breastfeed with this substance.	
Substance or Condition	Special Considerations
Cocaine	Street drugs are contraindicated for breastfeeding. See the Academy of Breastfeeding Medicine's position statement on substance use disorder.
Heroin	Street drugs are contraindicated for breastfeeding. Mothers who admit to heroin use should not breastfeed during their hospital stay and should discontinue breastfeeding if they use heroin.
HIV	At this time the CDC advises against breastfeeding for HIV+ mothers, even when being treated with anti-retroviral therapy.

- Document sustained viral suppression before delivery and throughout breastfeeding.
 - No data exist to inform the appropriate frequency of viral load testing for the breastfeeding parent. One approach is to monitor the plasma viral load of the parent every 1 to 2 months during breastfeeding.^{15,16}
 - Decide which clinician (e.g., prenatal care provider or primary care HIV clinician) is responsible for following viral loads of the parent postpartum and continuing counseling/education around breastfeeding.
 - If the parent's viral load becomes detectable, consult an expert in breastfeeding and HIV immediately and consider the options provided in the section Situations to Consider Stopping or Modifying Breastfeeding below.
- Recommend exclusive breastfeeding in the first 6 months of life, followed by the introduction of complementary foods with continued breastfeeding, if desired.²¹ Some people may choose to breastfeed for fewer than 6 months.
 - In pre-ART studies, exclusive breastfeeding was associated with lower rates of HIV transmission compared to mixed feeding (a term used to describe infants fed breast milk plus other liquid or solid foods, including formula).^{28,29} The highest risk in these studies was from very early introduction of solids (before 2 months of age).^{30,31}
 - In the context of parental ART and viral suppression, it is not known whether formula supplementation increases the risk of HIV acquisition in the breastfed infant.
- Administer appropriate ARV prophylaxis starting at birth as described in [Antiretroviral Management of Newborns With Perinatal HIV Exposure or HIV Infection](#).
- Provide guidance on good breast care, including strategies to avoid and promptly resolve over-production of breastmilk, milk stasis, and breast engorgement, which can lead to sore nipples, mastitis, or breast abscess. Promptly identify and treat mastitis, thrush, and cracked or bleeding nipples. These conditions may increase the risk of HIV transmission through breastfeeding, although the impact of these conditions in the context of ART and viral suppression is unknown.
- Develop a joint plan for weaning with family and providers. Since very rapid weaning was associated with increased risk of HIV shedding into breast milk and risk of transmission in the pre-ART era,³²⁻³⁴ weaning over a 2- to 4-week period might be safer, paying special attention to good breast care and avoidance of breast engorgement and milk stasis.

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[Management of Newborns With](#)

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ren, see [Table 13. Recommended
Perinatal HIV Acquisition at and After](#)

[nt-illnesses/hiv.html](#)

<https://clinicalinfo.hiv.gov/en/guidelines/perinatal/infant-feeding-in-dividuals-hiv-united-states>

This list is not meant to imply absolute safety of any medication while pregnant or breastfeeding