



Maternal and Neonatal Assessment and Health

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Objectives

- Understand how to evaluate and manage common signs and symptoms of disease in newborns.
- Understand how to evaluate and manage common signs and symptoms of disease in the post-partum patient.
- Recognize potential adverse outcomes in the post-partum mother and infant.
- Be able to perform a thorough assessment on the post -partum dyad.
- Understand the Pro and Cons of Telehealth
- Understand the role of Health literacy and enhance the understanding among patients with low health literacy.

Maternal Assessment

- History

- Date of delivery
- Maternal Age/ Gestational Age
- Gestational diabetes, Type 1 diabetic
- Pregnancy induced hypertension/high blood pressure
- Post-partum hemorrhage
- Multiples- Twins, Triplets
- Maternal drug use
- Depression/Anxiety
- Treated for infection
- Medical problems

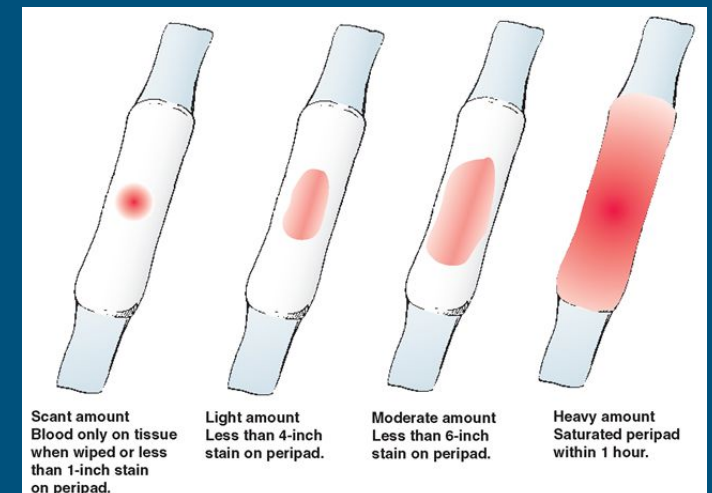


Maternal head to toe assessment

- Walk-in look at mother
 - Color
 - Affect



- Head- is she alert/oriented. Headaches?
- Chest- Chest pain, Lungs sounds, coughing, heart rate
- Perineum- tears, episiotomy. Bleeding. Fundus check. Foul smelling discharge. Is she urinating? When was her last BM?
- Is she eating? Does she have family support?
- Walking- dizziness
- Swelling- feet, hands, face



Maternal Assessment

- Vitals- temp >101 , pulse >100 or <60 . Blood pressure $>140/90$
- Signs of Post-partum preeclampsia: Severe headache, changes in vision, upper abdominal pain, Nausea or vomiting, decreased urine output, shortness of breath.
- Should not be soaking more than one pad an hour. Passing clots?
- Pain management
 - Burning on urination
 - Persistent headache-Spinal headache

Cesarean

- Abdominal wound
 - Weeping
 - Smell
 - Red
 - Separated edges
- Steri strips/staples
- Walking
- Has she had a BM
 - Stool softeners
- Pain management



Viruses/Illness

- Breastfeeding has been shown to have a protective effect for infants (with viruses). AAP (2022)
Covid, RSV, Noro/Roto virus, flu
- Encourage breastfeeding. Breastfeeding transmits protective antibodies, and these illnesses are less common in babies that are exclusively breastfed.
- Covid-Flu-RSV: hand hygiene, wearing a mask while nursing. Routinely clean and disinfect. Stay hydrated.
- Drop in milk supply is common.
- Use your PPE

PP Depression/Anxiety

- Look at mother's interactions with the baby
- Does she look at her baby or is the baby in the other room or cared for by someone else?
- Unwanted pregnancy
- Teen pregnancy
- Is mom crying?
- Is mom sleeping all the time or is she frequently worried that something will happen to the baby?
- Baby blues, Post-partum depression/anxiety, PP psychosis



Birth Trauma

- 9-45 % of women experience Post-partum PTSD after childbirth.
- Caused by a real or perceived trauma during delivery.
- Unplanned Cesarean, prolapse cord, use of vacuum, baby in NICU, poor interaction with staff, preeclampsia or severe complication like PP Hemorrhage, hysterectomy, preeclampsia, eclampsia, perineal trauma. History of sexual abuse or rape.
- Symptoms: Flashbacks, nightmares, Irritability, difficulty sleeping, hypervigilance, exaggerated startle response, anxiety, panic attacks, feeling sense of unreality/detachment.

Birth Trauma, cont.

- Symptoms are usually temporary and treatable with professional help. Referral
- Older mothers report less PTSD than younger mothers.
- More prevalent in African American women.

1 in 4 AA girls have been sexually assaulted before the age of 18

1 in 3 have been raped. American Psychological Association, Oct 2022

<https://www.apa.org/monitor/2022/10/better-care-black-mothers>

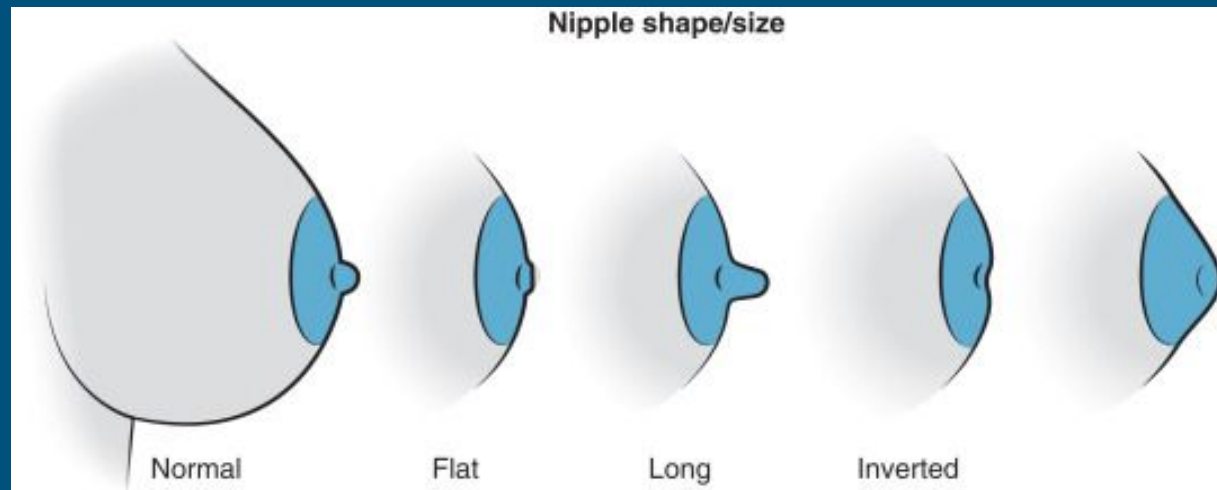
African Americans have increased health disparities, increased maternal and infant mortality rates, and increased premature deliveries.

- PostPartumSupportInternational.net
PSI helpline in English and Spanish: 1-800-944-4773
Melanin and Mental health.com

Breastfeeding

- Assess breasts

- Symmetry/Size/Shape
- Wounds
- Lumps, color changes
- History-surgery, piercings
- Nipples- everted, inverted, or flat. Accessory nipples, edema under arm pit
- Is mom breastfeeding?
 - Baby have tongue tie
 - Has she given formula by bottle? Pacing bottle feedings
 - Does she have a pump? Is she only pumping? How often/how long?
 - Cleaning the pump? Sterilize once a day, wash in between.
 - Once baby has been given a bottle of breast milk or formula, only have 2 hours to finish the rest or they need to toss it.



Why is breastfeeding important?

- Best source of nutrition
- Offers long and short term benefits to baby. Reduces incidence of asthma, ear infections, Type 1 diabetes, SIDS, re-hospitalization for GI issues. REDUCES INFANT MORTALITY RATES
- Mother: Reduces the risk of breast cancer, Type 2 diabetes, high blood pressure and hemorrhage. REDUCES MATERNAL MORTALITY RATES
- Passes immunity to the baby.
- Cost effective. Formula \$825-\$3,000/year
- AAP recommendations-6 months exclusive breastfeeding, 2 years

Barriers to breastfeeding

- Mother returning to work
- Cultural
- Lack of knowledge
- Lack of family support
- Difficulty breastfeeding/pain
- Low milk supply
- Embarrassment
- Promotion and Marketing of formula
- Mental health issues



Baby- neonate

- History

- Date of delivery
- NICU/ nursery
- Latched
- ABO incompatibility
- Jaundice
- Weight

- Head to toe

- Appearance of head
- Broken blood vessels in the eyes
- Eyes jaundiced



Baby cont...

- Alert, sleepy, awake, fussy
- Color
- Vitals
 - Normal heart rate: 120-160, normal respirations: 40-60.
 - Baby making noises or working to breathe?
- Feeding cues- eating hand, turning their head to look for the nipple
- How often is the baby eating? Is the baby sleepy?
- Formula- how much, how often? Is baby spitting up?
- Diapers- is the baby having wet/stool (poop) diapers? What color is the stool?
- Baby girls- vaginal bleeding
- Breast swelling- normal



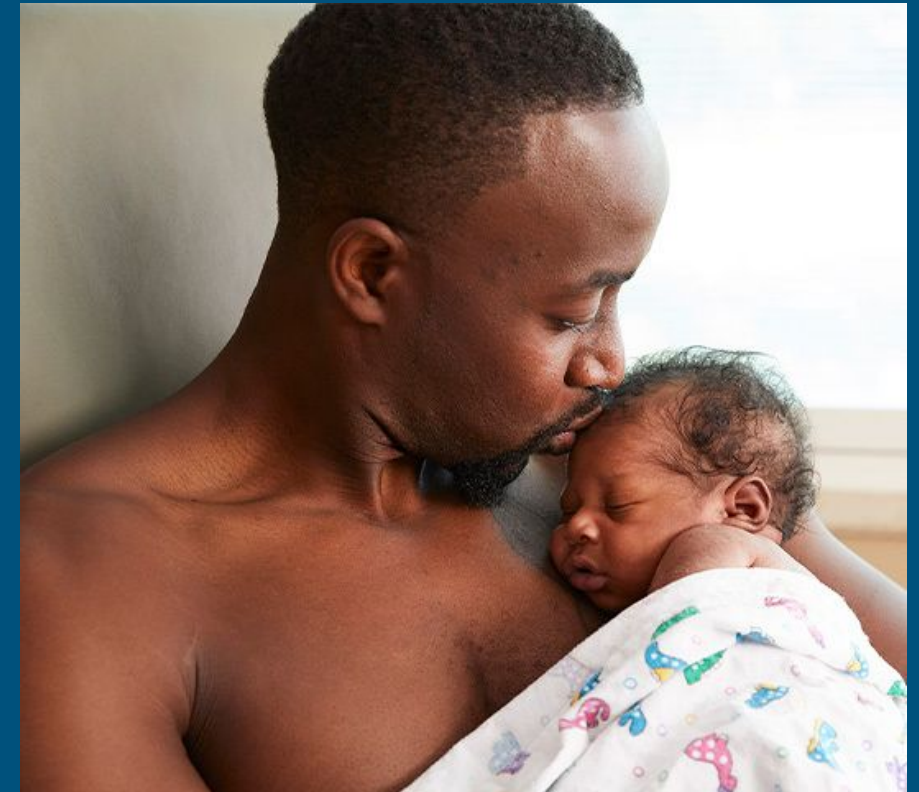
Baby cont

- Was the baby boy circumcised?
- Limbs symmetrical- moving them
- Jittery
- Vital signs-HR 120-160, Resp 40-60
- Weight- >8-10% weight loss
- Skin
 - Rash
 - Mongolian Spots, Port wine stains
 - Scratches
- Cord stump- fallen off, peri-umbilical redness and edema



Baby Cont.

- Skin to skin
- Brexting
- Back to sleep/safe sleeping
- AAP recommendations for safe sleeping
- Co-sleeping
- Next pediatric appointment?



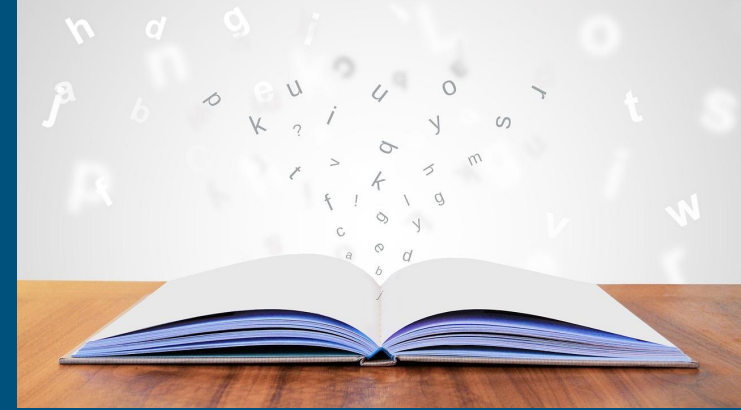
NICU Babies



- Common reactions-stress, fear, anger, guilt, loss, powerless, feeling on display.
- Questions about machines, monitors, pulse ox, feeding tubes.
- Visiting the baby- Skin to skin
- Micro Preemie vs older baby- milk production, time in NICU, medical issues.
- Pumping- consistent, every 4 hours even at night. Should use an electric or Hospital grade breast pump. Look at a picture of baby
- Baby may not be able to actually latch until 34-36 weeks.
- May use donor breast milk
- Writing questions down before visiting.

Health Literacy

- Most adults read at an 8th grade level.
- Average Medicare recipient reads at a 5th grade level
- Most healthcare materials are written at a 10th grade level.
- Native language may not be English.
- Do they understand the discharge and pharmacy/prescription instructions?
- Can they navigate the complex healthcare system
- Healthy People 2030
<https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3514986/>



Telehealth

Covid lead to a rapid transformation of the healthcare system.

JAMA (Oct 2021)

- In 2021, 37.0% of adults used telemedicine in the past 12 months.
- Telemedicine use increased with age and was higher among women (42.0%) compared with men (31.7%).
- The percentage of adults who used telemedicine increased with education level and varied by family income.
- The percentage of adults who used telemedicine varied by region and decreased with decreasing urbanization level.

NCHS Data Brief No. 445, October 2022



Pros

- Delivers health care in the comfort of your own home and expands access.
- Information can be emailed. Videos
- Can access important information (increasing milk supply, pumping, weaning, pump extensions)
- Can be useful for prescription refills and mental health care.
- Expands access- more patients can be seen.
- AMA survey- only 15% of providers have not used telehealth.
AHRQ
- Can book in-person appointments if needed.

Cons

- Digital health Equity- requires adequate devices, internet access and digital literacy.
- Not equivalent to in-person visits. (Can't check baby's weight, rule out mastitis). There is a limit to the care provided.
- The video visit does not connect/ client does not answer the phone.
- Patients' location- never know who is listening. HIPAA
- Appointments can coincide with other appointments.
- Translator services can be more complicated.
- Most available digital health tools are only available in English and usually are written at >12th grade reading levels.

Tips

- Introduce yourself
- Ask for Consent. Ask we she can speak freely.
- Ask open ended questions. How is breastfeeding going vs. Are you breastfeeding?
- Patient may not be comfortable showing her body.
- Look at the camera when speaking or it looks like you are not paying attention.
- Privacy-door closed and if there are students in the room, introduce them and ask permission.
- You can try observing breastfeeding but it can be difficult.
- Distractions-family, kids, pets.



Questions?



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AHRQ American Healthcare, Research and Quality

American Telehealth Association

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