The Evidence for the New World Health Organization Maternity & Newborn Care Breastfeeding Guidelines: A Quick Tour

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I have no competing interests.
Overview of Our Tour

Introduction to the document
Methods
Evidence
Recommendations
A closer look at selected recommendations
An update

WHO Review of the Baby Friendly Hospital Initiative (2017)
Consultation is normal part of WHO operations...

Summary of evidence from systematic reviews including:
- quality of the evidence
- balance of benefits and harms
- values and preferences of mothers
- acceptability to health workers
- resource implications

Consideration of:
- feasibility of the intervention
- equity and human rights considerations

Not enough time to cover qualitative data today...
Approach....

Ten steps to successful breastfeeding

1. Have a written breastfeeding policy that is routinely communicated to all health care staff
2. Train all health care staff in skills necessary to implement this policy
3. Inform all pregnant women about the benefits and management of breastfeeding
4. Help mothers initiate breastfeeding within a half-hour of birth
5. Show mothers how to breastfeed and how to maintain lactation, even if they should be separated from their infants
6. Give new born infants no food or drink other than breast milk unless medically indicated
7. Practice rooming-in - allow mothers and infants to remain together - 24 hours a day
8. Encourage breastfeeding on demand
9. Give no artificial teats or pacifiers (also called dummies or soothers) to breastfeeding infants
10. Foster the establishment of breastfeeding support groups and refer mothers to them on discharge from the hospital or clinic

Source: WHO and UNICEF, 2010

The Evidence
Standard Hierarchy of Evidence

Randomized Trials
Observational Studies
Clinical observations/studies

What happens when there are no RCTs?
Criteria to Assess Associations using Observational Evidence – the rules...

- Do statistics show that there is a strong relationship?
- Is greater exposure related to a bigger effect?
- Did the exposure happen before the outcome?
- Does the connection make sense based on biology?
- Is there more than one study showing the same thing?
- Are there other reasons why the apparent connection may have appeared?
- If exposure stops, does the problem stop?
- How many other things could have caused the same outcome?
- Does it make sense given what we already know?

WHO used systematic reviews

22 systematic reviews followed the Cochrane handbook for systematic reviews of interventions

All studies compared participants who received advice on, or practiced, one of the behaviors described in the Ten Steps to Successful Breastfeeding to those who had not.

Co-interventions had to have been used for both the control and intervention study arms.

The overall quality of the available evidence varied from very low to high.
Criteria for assigning grade of evidence

Type of evidence

Randomized trial = high
Observational study = low
Any other evidence = very low

DECREASE GRADE IF:

- Serious (−1) or very serious (−2) limitation to study quality
- Important inconsistency (−1)
- Some (−1) or major (−2) uncertainty about directness of relationship
- Imprecise or sparse data (−1)
- High probability of reporting bias (−1)

INCREASE GRADE IF:

- Strong association—significant RR of > 2 ( < 0.5) based on consistent evidence from 2+ observational studies, with no plausible confounders (+1)
- Very strong association—significant relative risk of > 5 ( < 0.2) based on direct evidence with no major threats to validity (+2)
- Evidence of a dose response gradient (+1)
- All plausible confounders would have reduced the effect (+1)
Research Gaps – Science Meets Reality

Research gaps were apparent for many of the recommendations and noted in the document.

Research has to be ethical and of interest to funders.

Research “conditions” often ideal.

Advocacy needed for funding and standardization of outcomes.

These words are used to reflect technical aspects of study design and reporting.

Type of evidence

Randomized trial = “high quality”

Observational study = “low quality”

Any other evidence = “very low quality”
Recommendations

WHO 2017

Immediate support to initiate and establish breastfeeding

1. Early and uninterrupted skin-to-skin contact between mothers and infants should be facilitated and encouraged as soon as possible after birth (moderate-quality evidence).

2. All mothers should be supported to initiate breastfeeding as soon as possible after birth, within the first hour after delivery (high-quality evidence).

3. Mothers should receive practical support to enable them to initiate and establish breastfeeding and manage common breastfeeding difficulties (moderate-quality evidence).
Immediate support to initiate and establish breastfeeding

4. Mothers should be coached on how to express breast milk as a means of maintaining lactation in the event of their being separated temporarily from their infants (very low-quality evidence).

5. Facilities providing maternity and newborn services should enable mothers and their infants to remain together and to practice rooming-in throughout the day and night. This may not apply in circumstances when infants need to be moved for specialized medical care (moderate-quality evidence).

6. Mothers should be supported to practice responsive feeding as part of nurturing care (very low-quality evidence).

Feeding practices and additional needs of infants

7. Mothers should be discouraged from giving any food or fluids other than breast milk, unless medically indicated (moderate-quality evidence).

8. Mothers should be supported to recognize their infants’ cues for feeding, closeness and comfort, and enabled to respond accordingly to these cues with a variety of options, during their stay at the facility providing maternity and newborn services (high-quality evidence).

9. For preterm infants who are unable to breastfeed directly, non-nutritive sucking and oral stimulation may be beneficial until breastfeeding is established (low-quality evidence).
Feeding practices and additional needs of infants

10. If expressed breast milk or other feeds are medically indicated for term infants, feeding methods such as cups, spoons or feeding bottles and teats may be used during their stay at the facility (moderate-quality evidence).

11. If expressed breast milk or other feeds are medically indicated for preterm infants, feeding methods such as cups or spoons are preferable to feeding bottles and teats (moderate-quality evidence).

Creating an enabling environment

12. Facilities providing maternity and newborn services should have a clearly written breastfeeding policy that is routinely communicated to staff and parents (very low-quality evidence).

13. Health-facility staff who provide infant feeding services, including breastfeeding support, should have sufficient knowledge, competence and skills to support women to breastfeed (very low-quality evidence).

14. Where facilities provide antenatal care, pregnant women and their families should be counselled about the benefits and management of breastfeeding (moderate-quality evidence).

15. As part of protecting, promoting and supporting breastfeeding, discharge from facilities providing maternity and newborn services should be planned for and coordinated, so that parents and their infants have access to ongoing support and receive appropriate care (low-quality evidence).
Let’s Take a Closer Look…

1. **Early and uninterrupted skin-to-skin** contact between mothers and infants should be facilitated and encouraged as soon as possible after birth (*moderate-quality evidence*).

8. Mothers should be supported to **recognize their infants’ cues for feeding, closeness and comfort**, and **enabled to respond accordingly to these cues with a variety of options**, during their stay at the facility providing maternity and newborn services (*high-quality evidence*).

13. **Health-facility staff** who provide infant feeding services, including breastfeeding support, should have **sufficient knowledge, competence and skills** to support women to breastfeed (*very low-quality evidence*).

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1. **Early and uninterrupted skin-to-skin** contact between mothers and infants should be facilitated and encouraged as soon as possible after birth (*moderate-quality evidence*).

**Question:** Should mothers practice early skin-to-skin to increase early initiation of BF?

**Other outcomes:** Initiation, duration, and exclusivity of BF

**Results** (46 trials reviewed including term infants):

- Significant differences in EBF at discharge to 1 mo, EBF 6 weeks to 6 mo, and Any BF 1 to 4 mo

**Biggest issue** = unclear risk of bias related to lack of available details about randomization

8. Mothers should be supported to recognize their infants’ cues for feeding, closeness and comfort, and enabled to respond accordingly to these cues with a variety of options, during their stay at the facility providing maternity and newborn services (high-quality evidence).

Question: Should infants not be allowed to use pacifiers, compared to allowing use of pacifiers in order to increase EBF during hospital stay?

Other outcomes: EBF 1 mo, EBF 6 mo, BF duration, infant morbidity

Results (term infants):
- Two RCTs included (Jenik 2009 and Kramer 2001)
- No significant difference in any BF at discharge, Any or EBF at 3-4 mo, Any BF 6 mo
- All mothers motivated, intended to BF
- One study started at 15 day pp (among infants who had regained BW)

Study inclusion/exclusion likely to be controversial. Based on established BF (2+ weeks) and/or optimal conditions.


13. Health-facility staff who provide infant feeding services, including breastfeeding support, should have sufficient knowledge, competence and skills to support women to breastfeed (very low-quality evidence).

Question: Should health facility staff be trained on BF and supportive feeding practices, compared to not being trained in order to increase early initiation of BF?

Other outcomes: EBF during hospital stay, duration of EBF, knowledge and attitudes, quality of skills, adherence to the Code

Results:
- Many differences in studies, small difference in knowledge and BF support skills, no change on attitude
  - 3 studies, N=250
- Many differences in studies, improvement in midwives and nurses attitudes, improved BFHI compliance, other studies with inconsistent results
  - 5 studies, N=390

Biggest issue: variability in methodology

Filling the Research Gaps
Opportunities in California as we move closer to 2025

An update on implementation
Questions before we go?