Technical guidance and evidence base for Nutrition Interventions for ill and vulnerable newborns and children

Nigel Rollins, World Health Organization, Geneva
WHO Global recommendations for appropriate feeding of infants and young children, in brief, are:

- Breastfeeding should start early, within one hour after birth.
- Breastfeeding should be exclusive for six months.
- Appropriate complementary feeding should start from the age of six months with continued breastfeeding up to two years or beyond.

**Appropriate complementary feeding is:**

- *timely* – meaning that foods are introduced when the need for energy and nutrients exceeds what can be provided through exclusive and frequent breastfeeding;
- *adequate* – meaning that foods provide sufficient energy, protein, and micronutrients to meet a growing child’s nutritional needs;
- *safe* – meaning that foods are hygienically stored and prepared, and fed with clean hands using clean utensils and not bottles and teats;
- *properly fed* – meaning that foods are given consistent with a child’s signals of appetite and satiety, and that meal frequency and feeding method – actively encouraging the child to consume sufficient food using fingers, spoon or self-feeding – are suitable for age.
… includes feeding during and after illness

• Increase fluid intake during illness and encourage the child to eat soft, varied, appetizing, favourite foods. After illness, give food more often than usual and encourage the child to eat more.

• Extra food is needed until the child has regained any weight lost and is growing well again.
LBW and VLBW feeding until 6 months (2011)

- Which milk
- Supplements
- When and how to initiate
- Optimal duration of breastfeeding
- How to feed
- How frequently and how to increase volumes

WHO aims to update over next 12-18 months to include management of the LBW .... Not only feeding
Ten steps to successful breastfeeding (2018)

Critical management procedures
1. Facility policies:
   a) Code of marketing
   b) Breastfeeding policy
   c) Internal monitoring
2. Staff competency

Key clinical practices
3. Antenatal information
4. Immediate postnatal care
5. Support with breastfeeding
6. Supplementation
7. Rooming-in
8. Responsive feeding
9. Feeding bottles, teats and pacifiers
10. Care at discharge

Includes specific reference to LBW and preterm
Guidelines on breastfeeding counselling (2018/2019)

Speaks to ...
• When to counsel (A/N ... P/N)
• How often to counsel
• Who should counsel

• Breastfeeding counselling in emergencies
Severe acute malnutrition

• In patient and community-based management of severe acute malnutrition
  • Triage – complicated and uncomplicated
  • Therapeutic foods
  • Antibiotics
  • Fluid management
  • HIV
  • Less than 6 month infants

• In addition to the Ten steps ....
A lesson learned ....

- Recovery at
  - Locally produced RUTF: 8 weeks 40.7% 16 weeks 56.9%
  - Centrally produced RUTF: 8 weeks 34.8% 16 weeks 47.5%
  - Augmented home prepared foods: 8 weeks 26.6% 16 weeks 42.8%

- Impact of therapeutic food only evident when introduced care support (DOT)
- Longer time needed for recovery compared to African studies
Moderate wasting

• Management of nutrition in major emergencies (2000)
• Technical note on composition of therapeutic foods (2012)
• Essential Nutrition Actions (2013)
• Wasting Policy Brief (2014)

BUT

• No guideline on the prevention or management of moderate wasting
  • Which children should receive supplementary foods
  • How much to give,
  • What to do if no response,
  • What to do if relapse,
  • Other care
  • Cost-effectiveness
Caring for the newborn at home
- Promotion of ANC and skilled care at birth
- Care in first week of life
- Recognition and referral of newborns with danger signs
- Special care for low-birth-weight babies

Caring for the child's healthy growth and development
- Care-giving skills and support for child development
- Infant and young child feeding
- Prevention of illness
- Family response to child's illness

Caring for the sick child in the community
- Referral of children with danger signs and severe acute malnutrition
- Treatment in the community
  - Diarrhoea
  - Fever (malaria)
  - Pneumonia
The Community Infant and Young Child Feeding Counselling Package

Infant and Young Child Feeding

Counselling Cards for Community Health Workers
Updated Implementation manual
Training courses

- Breastfeeding
- IYCF
- IYCF and growth monitoring
- BFHI
- IMCI
- iCCM
- Essential Newborn Care
- Others ...
Gaps

- Moderate wasting
- Expanded guideline on growth failure in infants <6 months
- Updated LBW
- KMC
If I had to bet my last few dollars!

**Even without any data! (including cost-effectiveness)**

- Consider systems for longer term follow-up of LBW infants
- Explore community-based approaches for post-discharge follow-up of undernourished children admitted with complications
- Assess and intervene to improve mothers’ mental and physical health as part of IYCF approaches
- Find ways to put knowledge and the skills into the hands of parents and families to feed their children during and after illnesses

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Mortality risk after discharge from hospital
Among children with pneumonia
9. Stimulate emotional and sensorial development:
Loving care, play and stimulation
1. Provide tender loving care
2. Help and encourage mothers to comfort, feed, and play with their children
3. Give structured play when the child is well enough.

WHO Guidelines on improving child development
Aisha Yousafzai 2018

• What is the effectiveness of integrated caregiving and nutrition programmes in the first three years of life on ECD and child growth outcomes?