#### Clean, Fed & Nurtured™

Joining forces to promote child growth and development

# What Gets Measured Gets Done: Identifying Integrated Indicators that Count

Julia Rosenbaum & Renuka Bery, USAID/WASHplus, FHI 360

Monica Woldt, FANTA III, FHI360

Merri Weinger & Elizabeth Jordan, USAID

Ann Jimerson and Lynette Golding, Alive & Thrive, FHI360

USAID Mini-University
March 2016















#### What is Clean, Fed & Nurtured<sup>SM</sup>?

- Community of Practice focused on Integrated programming
  - Water, sanitation, hygiene (WASH)
  - Nutrition
  - Early childhood development (ECD)
- Goal
  - To promote thriving children







### Objectives of today's session

- Review the emerging evidence base
- Describe why integration of 3 sectors is essential for better child growth and development
- Identify potential indicators to use for CF&N programming
- Recommend research needs in indicator development







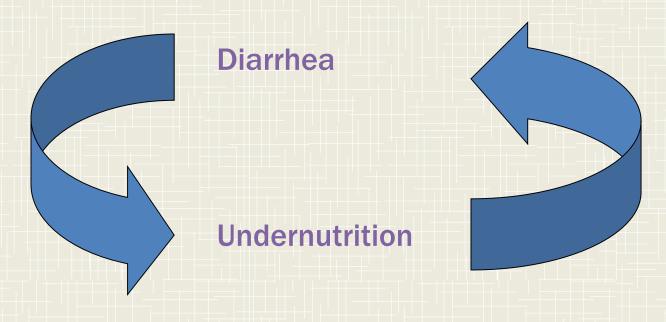
### Why Integrate these Sectors?

- No sector succeeding on its own
- Dyads of integration
- Growing evidence pointing to growth and development needed for a thriving child





# What do we know about WASH + nutrition?

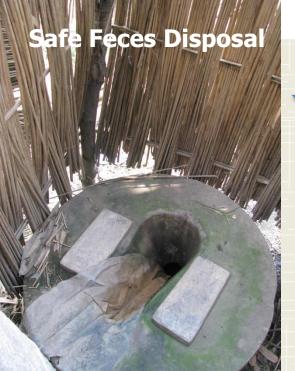


- Children with diarrhea tend to eat less
- With diarrhea, nutrients from food are not well-absorbed
- Undernourished children are more susceptible to diarrhea





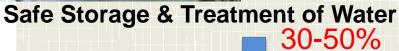




# 30% ++

# Review of the evidence

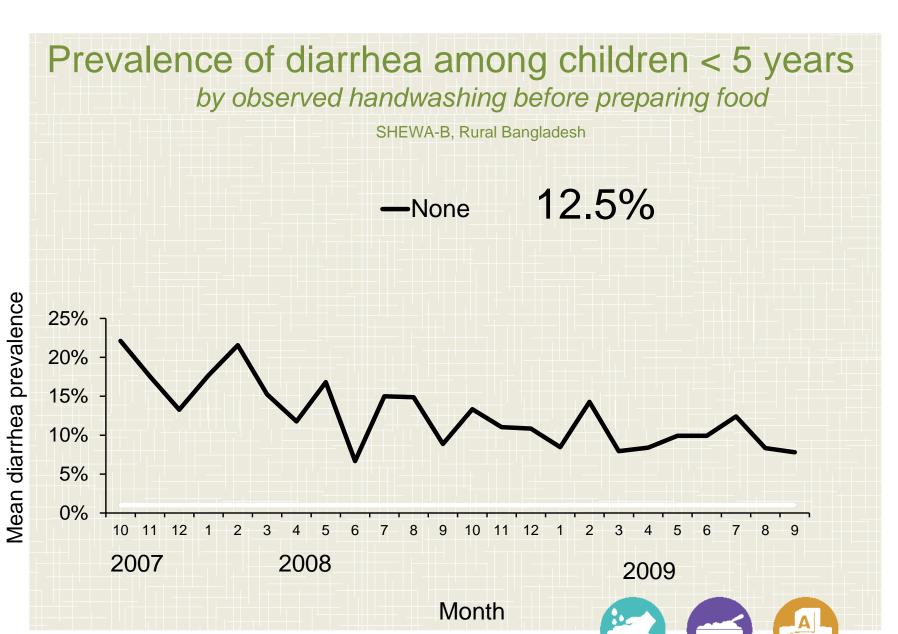
Focus on WASH behaviors for Diarrhea Disease Reduction....







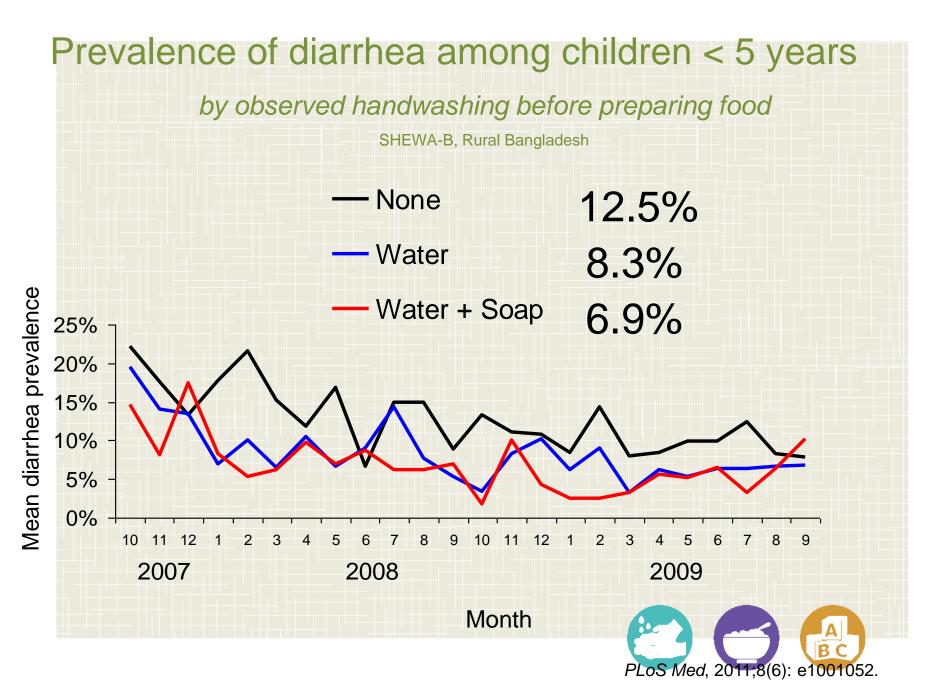




PLoS Med, 2011;8(6): e1001052.

#### Prevalence of diarrhea among children < 5 years by observed handwashing before preparing food SHEWA-B, Rural Bangladesh 12.5% None 8.3% Water Mean diarrhea prevalence 25% 20% 15% 10% 5% 0% 10 11 12 9 10 2007 2008 2009 Month

PLoS Med, 2011,8(6): e1001052.



Evidence exists that the effect of WASH interventions on linear growth is <a href="independent">independent</a> of its effect on diarrhea

In several studies, WASH had a bigger effect on growth than it did on diarrhea

.... there is something else going on...

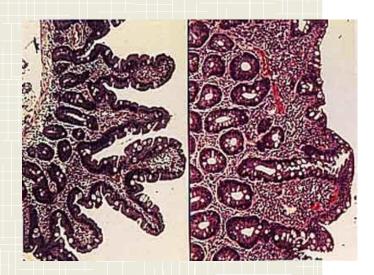






# The Environmental Enteropathy Hypothesis

 A subclinical condition of the small intestine, called environmental enteropathy (EE)



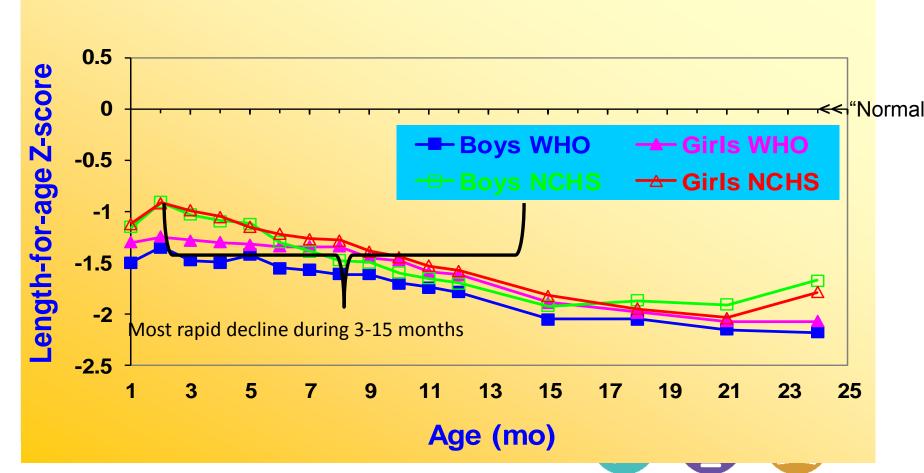
- Characterized by:
  - Flattening of the villi of the gut, reducing its surface area
  - Thickening of the surface through which nutrients must be absorbed
  - Increased permeability to large molecules and cells (microbes)
- Likely causes:
  - Too many microbes in the gut
  - Effects of toxins on the gut





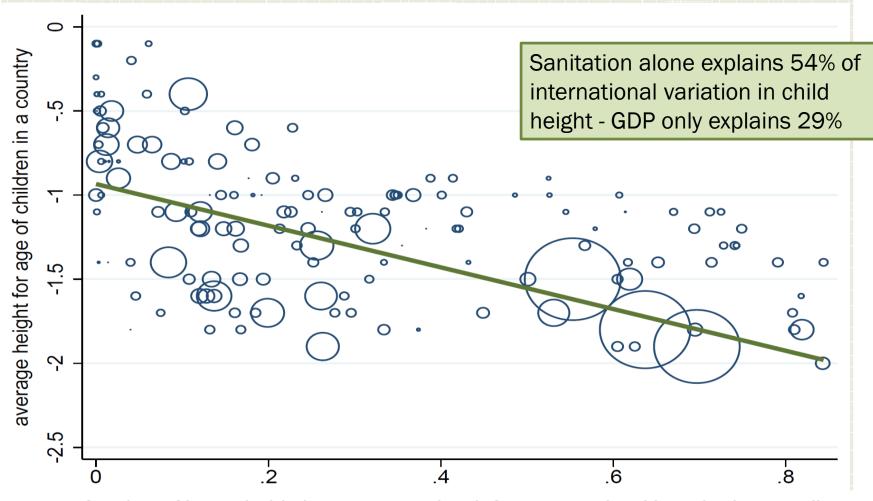






KK Saha et al (ICDDR,B), Food and Nutrition Bulletin 2009

# Open defecation accounts for much of excess stunting



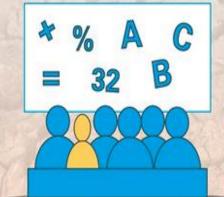
fraction of households in a country who defecate openly without latrine or toilet

Stunting has lifelong implications...

A stunted child will never learn or earn as much as if they'd been properly nourished...

And the damage can't be un-done...









#### **GROWING UP**

A young child who does not get enough food and nutrients cannot grow properly. This condition is called 'stunting'. Stunting can already start in the womb of a malnourished mother.

#### **EDUCATION**

Stunted children often have irreversible developmental problems. Their potential is limited and they often do less well in school if they have access to education.

#### **PROFESSIONAL LIFE**

As a result, stunted children have fewer professional opportunities later in life and earn less, perpetuating poverty in their families.

#### **VICIOUS CYCLE**

Low income, lack of healthcare and reduced access to proper nutrition will continue to impact the health of their children.

# What do we know about integrating nutrition + ECD?

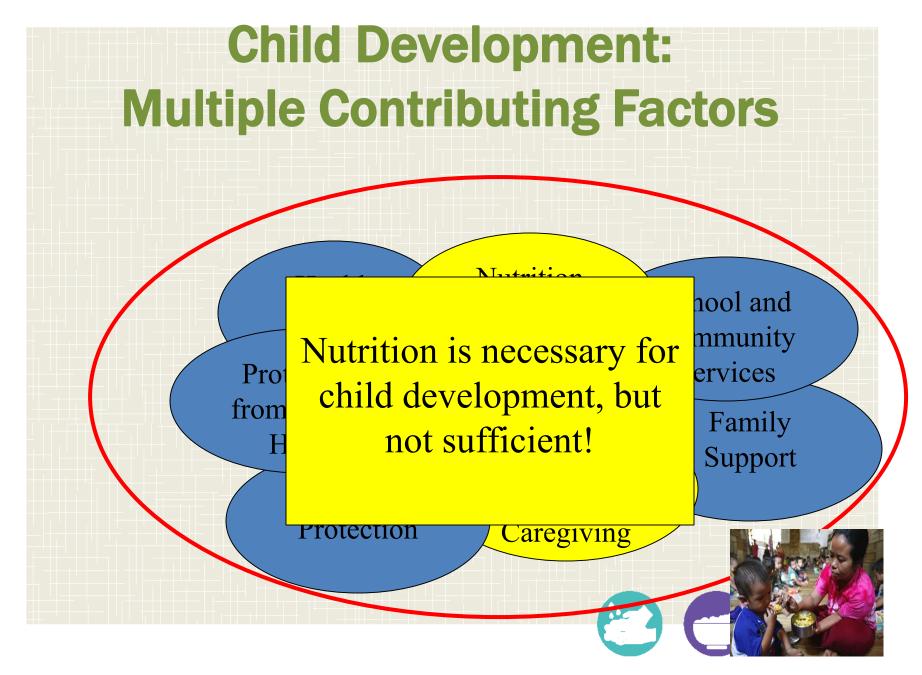
 The direct effect of ECD interventions (early stimulation in the 0-3 years) on child development outcomes is strong and well documented.

 The evidence for the value added of ECD in terms of nutritional outcomes is not as strong, but we expect that early stimulation interventions enhance feeding practices, and active feeding enhances child growth



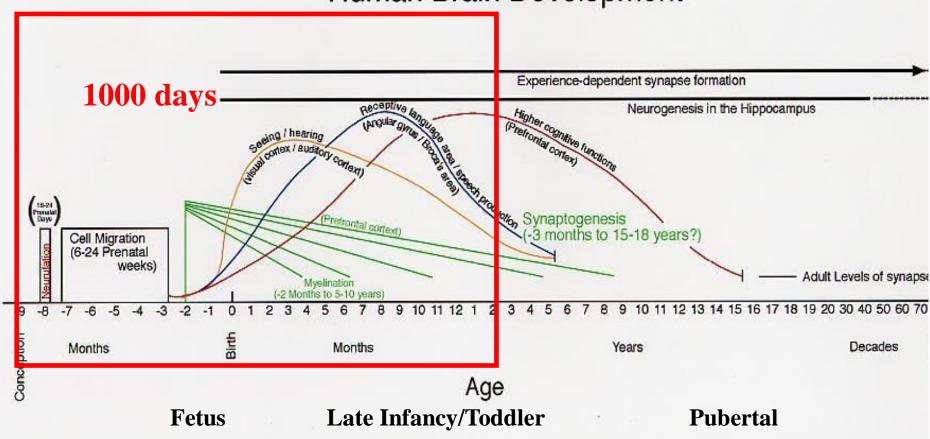






#### Developmental Perspective





Thompson & Nelson, 2000

# Not just about child survival ... and not just about more / better food

- Key period for formation of the brain, laying the foundation for development of cognitive, motor and socio-emotional skills
- Adequate nutrition for pregnant women and infants is necessary for 'normal' brain development
- Lack of micronutrients especially critical to optimal infant cognitive and motor development.
- Children with restricted development in early life are at risk
  - later neuropsychological problems,
  - poor school achievement,
  - early school drop out,
  - low-skilled employment and lower wage earnings,
  - poor care of their own children
- Some of damage is irreparable if not addressed before age 2\*\*
- Contributes to the intergenerational transmission of poverty

#### Advantages of integration

#### Advantages:

- Hypothetical synergies for improved growth and development
- Efficiency through use of same facilities, personnel
- Increased access to services for most disadvantaged
- Seamless approach is the way families raise a child







#### Challenges of integration

#### Challenges:

- Staff motivation, workload
- Coordination among agencies, organizations
- Lack of common language and measurement indicators
- Funding by silo
- Shaky evidence base
- Overload for families





## What have been your experiences measuring integrated programs?

- Please turn to the person next to you and take 2 minutes to discuss the following:
  - Describe program components that you may be trying to implement in an integrated way
  - Share your successes or challenges in measuring these components, or their integration







## Aligning indicators to assess impact of interventions on children (1)

- Key points:
  - Although we know quite a bit about child growth, we also have a lot yet to learn
    - How and to what extent catch-up growth occurs in children who are stunted
    - Why numerous interventions that aim to reduce stunting fail to do so







## Aligning indicators to assess impact of interventions on children (2)

#### Key points:

- Factors that contribute to stunting also adversely affect brain development in children
- Use a broad set of health, nutrition, and child development indicators to demonstrate impact of interventions, not just impact on stunting







## Aligning indicators to assess impact of interventions on children (3)

- Key points:
  - Measure other positive impacts of nutrition interventions such as:
    - Parent-child interaction, women's self confidence, decreasing physical abuse
  - Broad set of indicators helps better understand program context, e.g.
    - Food security
    - Maternal depression







# Aligning indicators to assess impact of interventions on children (4)

- Key points:
  - Useful domains for indicator development:
    - Food and nutrition (food security; dietary intake [quality and quantity]; child nutritional status [anthropometry, micronutrients]; breastfeeding and complementary feeding)
    - Family care (support for learning and stimulating environment; setting limits and punishment; alternative caregivers; father involvement; responsiveness; maternal depressive symptoms; parent-child interaction)
    - Health (morbidity [morbidity symptoms and any hospitalization]; care to prevent or treat illness [immunizations and care during illness]; water, sanitation, and hygiene
    - Child development (motor; cognitive; language; socioemotional)







#### **Exercise in writing CF&N SMART indicators**

- 15 minutes in small groups
- 10 minutes of report out (sampling)

Develop or select from existing indicators a few CF&N SMART Indicators

- Process, Outcome or Impact Indicators
  - Nature and extent of integration and/or
  - The 'best of' each sector's indicators
  - New/different beast all together (an indicator of thriving, resilient child)

Discuss and share criteria/process for selection, challenges, questions, further research needed







#### **SMART\* Indicators**

- Specific
- Measurable
- Achievable
- Reliable
- Time bound







# "Indicators to Measure Child Wellbeing, Growth, and Development" (1)

- Meeting objectives:
  - Identify and discuss current indicators to measure:
    - Progress in achieving targets in WASH, nutrition and ECD over time
    - Outcomes and impacts of integrated policies and program that address child growth and development through WASH, nutrition and ECD
  - Identify recommendations for further research to better capture how integrated programs contribute to child well-being
  - Identify whether standardization is desirable, and, if so, what should the indicators be.







# "Indicators to Measure Child Wellbeing, Growth, and Development" (2)

#### Meeting sessions:

- 1. Sector-specific groups reviewed a list of WASH, nutrition, and ECD indicators and additions or subtractions
- 2. Mixed sector groups discussed indicators to prioritize
- 3. In plenary participants discussed what is meant by integrated programming and how useful are integrated indicators
- 4. Next steps







## "Indicators to Measure Child Wellbeing, Growth, and Development" (3)

- Meeting outputs:
  - List of suggested priority indicators
  - Next steps and commitments to future collaborative actions on indicators







## "Indicators to Measure Child Wellbeing, Growth, and Development" (4)

- Meeting findings:
  - Defining integration is important
    - Spans a continuum from co-located programs to planned integrated programs
  - Need for a scale to show levels of integration, or indicator of types or intensity of integration
  - For ECD suggestion to explore existing resilience indicators or a scale that measure a child's well-being







## "Indicators to Measure Child Wellbeing, Growth, and Development" (5)

#### Meeting findings:

- Trying to lump too many sectors into integration could get overwhelming
- Further study needed to answer the question "Does integration lead to better results?"
- Integration can be incremental
- Examples of good integrated programs and their indicators is critical







## "Indicators to Measure Child Wellbeing, Growth, and Development" (6)

- Next steps:
  - Advocate with donors to build integration into their RFPs
  - Integrate at the service delivery level so services not provided in silos
  - Analysis of impact pathways is critical to identify relevant indicators at various levels (process, outcome, impact)







# "Indicators to Measure Child Wellbeing, Growth, and Development" (7)

- Conclusions meeting helped to:
  - Identify benefits and challenges of measuring integrated programming
  - Move the conversation forward, advancing a dialogue using existing frameworks and indicators
  - Consider indicators along a continuum -- an important concept
  - Identify opportunities for cross-sector collaboration







#### **Draft list of CF&N indicators**

http://www.coregroup.org/storage/documents/Indicators\_CFN\_050ct2015v2.pdf







#### **Action point**

- Write down on a post-it note one action you will take to:
  - Further your knowledge on CF&N,
     measurement of CF&N, or integrated indicators
  - Apply what you have learned today about CF&N or integration of indicators in your studies and/or work







## Join us! Why?

- Technical knowledge leadership
- Collaboration for innovation
- Promotion and coalition building
- Two ways to participate:
  - General
  - Planning group member







### Stay connected!

contact@cleanfednurtured.org



@thrivingbaby #cleanfednurtured

facebook.com/CleanFedNurtured

in linkedin.com/groups/Clean-Fed-Nurtured-5005314







#### Co-Sponsors



















