

Understanding and addressing disparities in maternal and child nutrition

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Research areas:

- Community-based Studies to understand social, cultural, and health-related determinants of poor nutrition
- Formative research to develop nutrition programs
- Evaluation of large-scale maternal and child health programs
- Household surveys

Methods:

- Nutritional epidemiology – dietary analysis
- In-depth interviews and focus groups
- Survey data analysis

PhD in Nutrition Intervention and Policy, UNC Gillings School of Global Public Health

- Assessment community-based supplemental feeding program that used a locally-produced ready-to use food to treat undernutrition in Uganda
- Assessed children's dietary quality, post-program changes in child diet, food procurement practices
- **Ickes SB** et al. Examination of facilitators and barriers to home-based supplemental feeding with ready-to-use food for underweight children in western Uganda. *Matern Child Nutr.* 2012



UNC

GILLINGS SCHOOL OF
GLOBAL PUBLIC HEALTH

Post-doc with The COHORTS group, based in South Africa



Post-doc in the Division of Nutritional Sciences at Cornell in Maternal and Child Nutrition

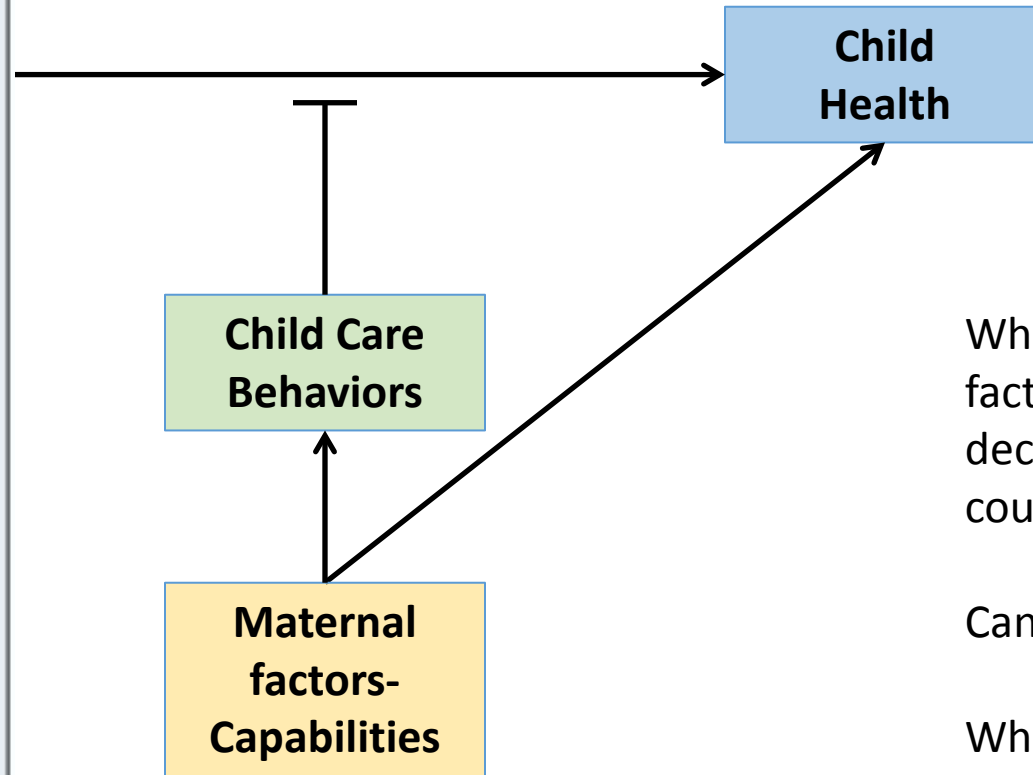
Box 1. The Health Sector's 13 Best Bets

Five Lifesaving Nutrition Interventions

1. Breastfeeding promotion and support
2. Vitamin A supplementation
3. Therapeutic zinc supplements
4. Iron folic-acid supplementation for pregnant women
5. Treatment of severe acute malnutrition

High Priority Nutrition Interventions

6. Complementary feeding promotion
7. Handwashing and hygiene promotion
8. Provision of multiple micronutrient powders
9. Iron fortification of staple foods
10. Salt iodization
11. Iodine supplements
12. Prevention and treatment of moderate malnutrition in children 6-23 months
13. Deworming



What intrapersonal, modifiable maternal factors are important for nutritional decisions and behaviors in low-income countries?

Can these be measured?

What can nutrition programs (or related sectors do to address them?)



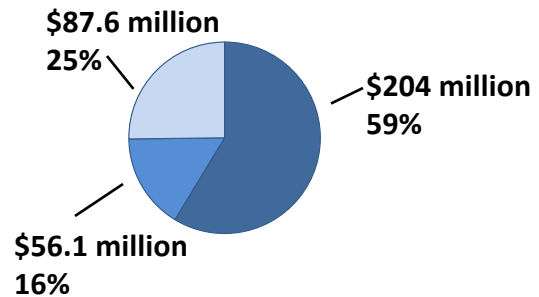
Assistant Professor of Public Health Nutrition at The College of William and Mary, 2011-2015

- Member of the AidData Research Consortium, Global Health Team Member
- Developed a method for tracking global spending for nutrition aid to low and middle-income countries
- Community-based work to identify social and cultural determinants of nutritional decision-making among mothers

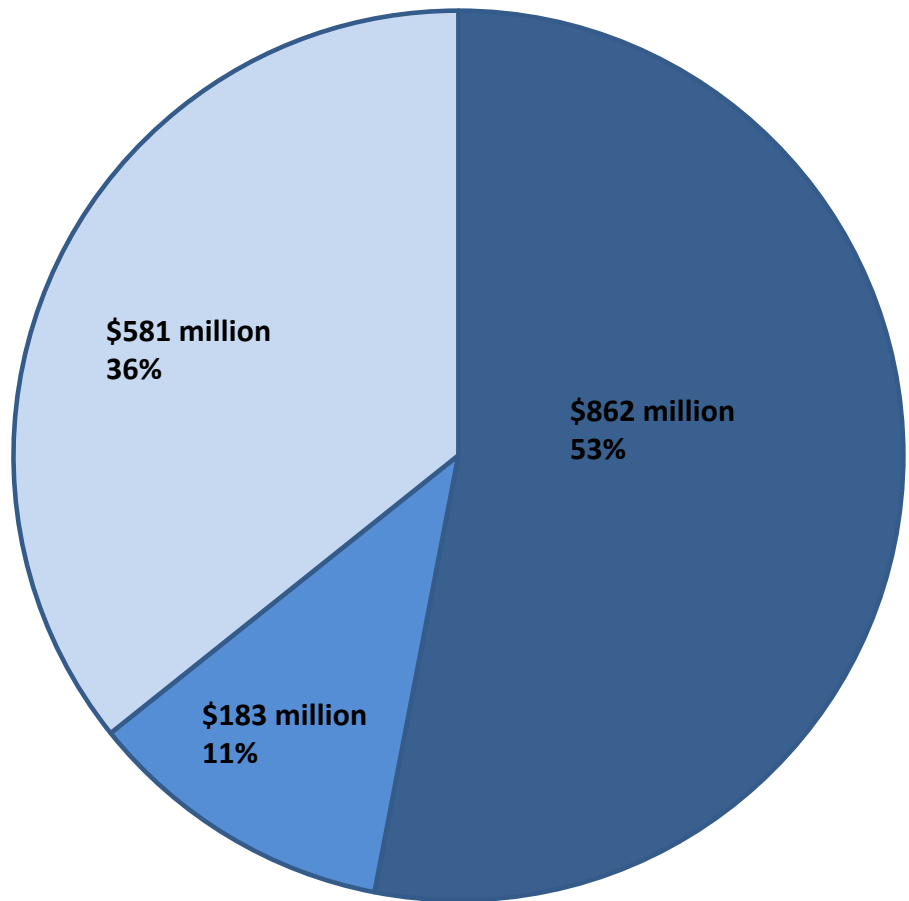


Growing discourse about women's empowerment and caring capabilities, but accounts for only 11% of nutrition sensitive aid

**Nutrition Specific:
\$347.7 million***



**Nutrition Sensitive:
\$1,626 million***



-  **Increasing Food Availability, Food Accessibility, and Food Security**
-  **Improving the Care Environment, Including Gender Roles and Women's Empowerment**
-  **Improving Public Health, Water, and Sanitation**

Ickes, Trichler & Parks. Building a Stronger System for Tracking Nutrition-Sensitive Spending: A Methodology and Estimate of Global Spending for Nutrition-Sensitive Foreign Aid. Food and Nutrition Bulletin 2015.

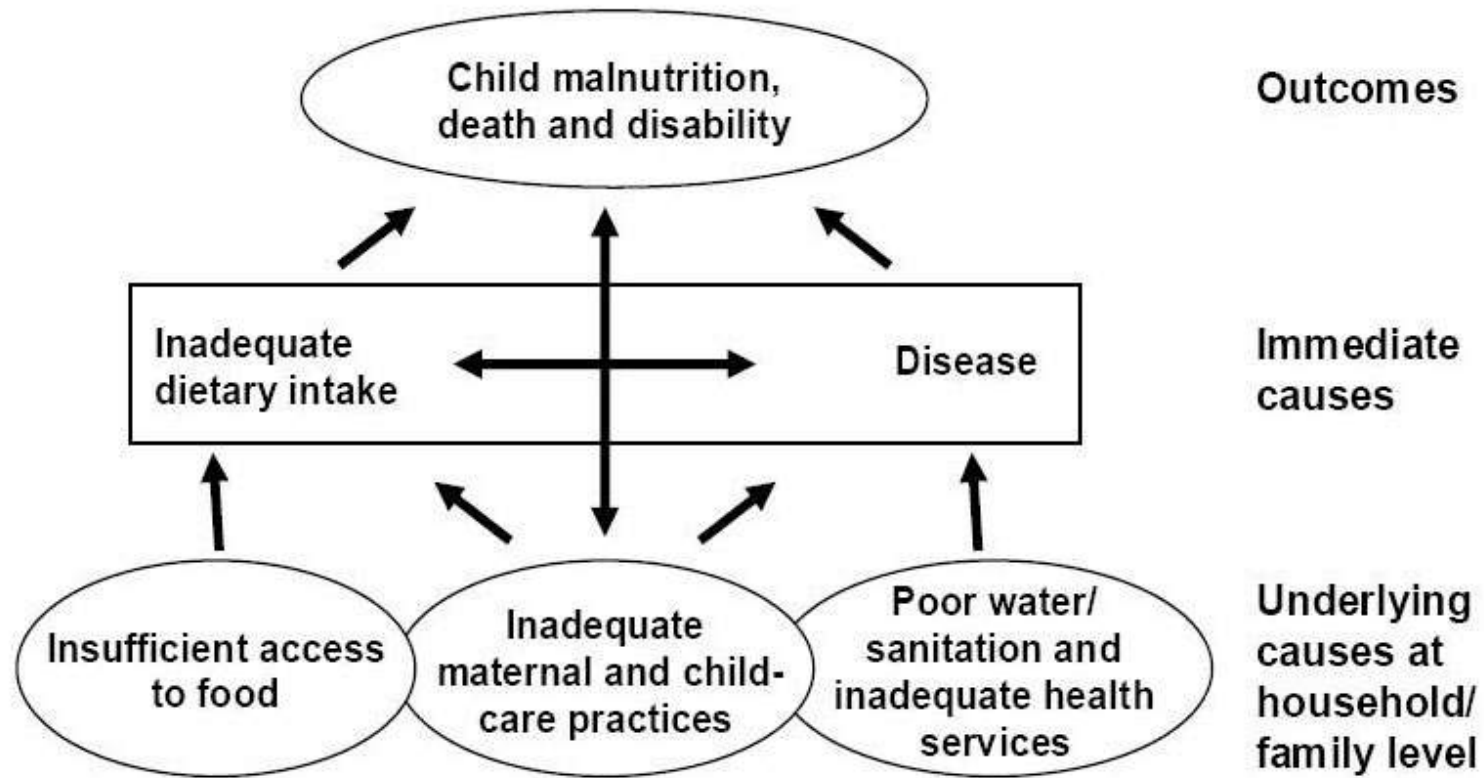
The Maternal Opportunity for Making Change (MOM-C) Tool

(Ickes & Lea, Emergency Nutrition Network, 2015)

- A rapid screening assessment developed in western Uganda for use with a C-MAM program
- Assesses 4 domains of capabilities:
 - general decision-making
 - social support
 - psychological health
 - health-related decision-making







- Informational social support
- Emotional social support
- Reproductive decision-making
- Marketplace access
- Maternal access to care
- Physical autonomy (violence, travel)

Maternal Literacy, Facility Birth, and Education Are Positively Associated with Better Infant and Young Child Feeding Practices and Nutritional Status among Ugandan Children.
Journal of Nutrition. 2015.

- Modelled associations with five domains of capabilities with IYCF practices and child anthropometry using nationally representative data from 2006 and 2011
- 1009 maternal-child dyads in 2006, 888 dyads in 2011.
- Literacy, media access and health facility delivery were strongest drivers of children's diet quality, nutritional status



Maternal capabilities influence adoption of health behaviors, including child feeding practices

- Delivery at health facility increased odds of BF within 1 hour of childbirth
 - OR = 1.34 (1.03, 1.74)
- Literacy increased likelihood of feeding the min. meal frequency in both time periods
 - OR (2006) = 1.87 (1.28, 2.74); OR (2011) = 1.66 (1.11, 2.48)
- Literacy and delivery at health facility increased odds of feeding iron rich foods
 - OR = 1.61 (1.10, 2.37) and 1.68 (1.19, 2.37)
- Minimum acceptable diet was also more likely among literate mothers
 - OR = 2.25 (1.13, 4.47)



What's on the horizon at UW in NSP?

Washington's Food Insecurity Nutrition Incentives (FINI) Project, Drivers of FV Selection at FMs and Retail Food Stores



Maternal perceptions of child appetite in Bangladesh



New collaborations around U.S. based food security, parenting and nutrition



Mid-line evaluation of the USAID-Population Services International Social MCH marketing program



Vies saines. Résultats mesurables.