

MANAGEMENT OF AT-RISK MOTHERS AND INFANTS UNDER 6-MONTHS



The MAMI Vision: to nutritionally assess every infant under six months of age, at every community and health-service contact and appropriately supported to survive and thrive.

WHAT IS MAMI?

Infants under 6 months (u6m) are unique. Mental, physical and behavioral development between 0 to 6 months is exponential compared to later in childhood. The wellbeing of an infant is intrinsically linked to that of their caregiver, dependent on them for all their basic needs.

Younger infants are at greater risk of death than older children, with infant feeding practices closely linked to risk. Globally, approximately 1 in 5 infants u6m are malnourished with 18% born low birthweight (<2500g), 20% underweight (WAZ<-2), 21% wasted (WHZ<-2) and 17% stunted (HAZ<-2). Malnutrition underlies approximately 50% of child deaths.¹ Globally, the public health approach to managing malnourished children over 6 months of age has been revolutionized and Community-based Management of Acute Malnutrition (CMAM) is a proven and widely adopted intervention. However, strategies for managing malnourished infants u6m through community-based approaches has fallen behind. In reality, 1 in 5 to 1 in 10 malnourished infants ever receive care. Mothers and babies being unseen, unassessed, and untreated.

Beyond the gap in nutrition treatment programs, infants and their mothers fall through gaps in other public health programs. Newborn care ends after 1 month of life with infants born low birthweight lost to the health system as a result in many countries and immunization services usually a limited service separate to nutritional counselling or other services.

THE MAMI APPROACH

The Management of At-Risk Mothers and Infants under 6 months (MAMI) Approach guides the holistic case management of at-risk infants under 6 months through community-based services. **The MAMI Vision is that every infant under six months of age, at every community and health-service contact, is nutritionally assessed and appropriately supported to survive and thrive.** MAMI looks to leverage and build on existing services that help to prevent and treat malnutrition and nutritional risk (Figure 1).

The **MAMI Care Pathway** provides a guide for health workers to assess, identify/classify and manage at risk mothers and infants u6m in the community.

When a mother and child present to a contact point, the pathways guides assessment of: **Integrated Management of Childhood Illness (IMCI) danger signs, anthropometrics** of infant and mother, **feeding practices, clinical symptoms, and maternal wellbeing.**

Support provided to the mother and infant includes:

- Referral of severe cases for **inpatient care**
- **1-on-1 counselling** and weekly follow up for challenges identified
- **Referral to existing public health** services for additional support needs
- **Group education** on nutrition and care practices
- Linkages to **social support** networks existing within the community

PROGRAMMING EXPERIENCE

Piloting the MAMI Approach in Bangladesh

The prevalence of malnutrition in infants u6m is particularly high in Bangladesh with 19.9% wasted, of which 4.9% are severely wasted.⁴ As is typical in many countries, current guidelines in Bangladesh recommend only inpatient, clinical care for infants u6m with acute malnutrition (or wasting).

Save the Children pioneered research in Barisal district from 2013-2016, identifying caseload and risk factors for nutritionally vulnerable infants u6m. In the study area, 5.9% of infants had severe acute malnutrition (SAM) in the pre-harvest season while 14.4% and 14.7% of infants u6m were low weight for their age. Low birth weight, low family income, sub-optimal breastfeeding practices, inappropriate handwashing practices, lack of sanitary toilets and maternal depression were strong risk factors.

Save the Children received additional funding to pilot the MAMI approach and version 1.0 of the MAMI tool for the from 2016-2018.

Figure 1: The MAMI Approach





A MAMI counsellor screens waiting mothers and infants in Rohingya refugee camps, Bangladesh. Photo Credit: Save the Children, Bangladesh

Effectiveness of the MAMI Approach

Save the Children conducted research from 2016 to 2018 on the pilot MAMI program initiated in Barisal, Bangladesh to estimate how effective the MAMI approach was compared to current, standard inpatient protocol. Over 375 total cases were admitted to the study. Respondents reported quicker and better treatment than the standard inpatient care. The MAMI Tool was also found to be necessary in providing a framework for implementation of the MAMI approach.²

CASE STUDY

PILOTING THE MAMI APPROACH IN THE ROHINGYA RESPONSE

AN EMERGENCY CONTEXT

Following the displacement of an estimated 700,000 Rohingya refugees fleeing large-scale violence in Rakhine State, Myanmar from August 2017 through June 2018, a pilot MAMI program was implemented by Save the Children and UNICEF in the Rohingya Response. The response was based on experience gained by Save the Children in Barisal, Bangladesh from 2014-2016. MAMI activities were integrated into existing IYCF-E programs in 7 Mother Baby Areas. From November 2017 to June 2018, 1,964 infants-mother pairs were referred to MAMI sites, of whom 762 were enrolled in outpatient care and 78 complicated cases referred for inpatient treatment. These large numbers enrolled demonstrate the dire need for assessment and appropriate referral of at-risk mothers and infants in emergency settings.

“The community volunteer along with the counselors came to my home and brought me and my twins here [Nutrition Centre]. When I first came here, each of them was only one kilogram. Every week I bring them here and take lessons about proper breastfeeding, the proper way to raise children and keep them clean and healthy.” - mother enrolled in the MAMI Program, Cox’s Bazar Rohingya camps.

Cost efficiency of the MAMI Approach

Save the Children also conducted cost efficiency research on the Barisal, Bangladesh pilot comparing this new treatment method by highlighting cost differences between standard inpatient protocol and the MAMI model from a societal prospective, considering costs to both the healthcare provider and caregivers. They found the absolute cost per clinic of the MAMI intervention is higher from a healthcare provider perspective than the cost of the standard control protocol but is more cost-efficient per child treated and less costly to caregivers.^{3 2}

NEXT STEPS

Save the Children’s vision is to support the establishment of the MAMI Approach in various contexts worldwide. More programming experience is needed to learn, develop and strengthen critical services for the millions of infants and mothers who are unseen, unassessed and untreated.

To see them. To assess them. To support them.

For programming support on MAMI, please contact: mami@savechildren.org

This work reflects the efforts of the MAMI Global Network. To access key MAMI information and resources, please visit: www.enonline.net/ourwork/research/mami

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