

# Afghanistan Nutrition Solutions Series

## Case Study Enhancing Skills for Improved Infant and Young Child Nutrition – Baby Friendly Village Approach Takhar Province, Afghanistan



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## **About the Afghanistan Nutrition Solutions Series**

The Afghanistan Nutrition Solutions Series is a collaboration with program implementers and policymakers in Afghanistan to identify and refine promising programmatic platforms for scaling-up effective nutrition solutions in the country. The overarching framework for the Series is the Government of the Islamic Republic of Afghanistan's Nutrition Action Framework. The Nutrition Action Framework outlines a multisectoral approach for addressing, in a sustainable way, the alarmingly high rates of child and maternal malnutrition in Afghanistan. The Series builds on the global knowledge base to support Afghanistan-specific analysis, technical assistance, and pilots that generate contextualized nutrition solutions in relevant sectors. These solutions are generated by combining global evidence with in-depth knowledge of the Afghan context. Each of the notes in this series is the result of the review of evidence, additional information gathering in Afghanistan, and engagement with a range of stakeholders.

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### **Acknowledgements**

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## **Executive Summary**

The following document summarizes the findings and lessons from the Care for Afghan Families pilot intervention, “Baby Friendly Village Project.” This pilot program was intended to promote appropriate infant feeding practices not only among mothers, but also among their broader community and social support networks, especially among their mothers-in-law and husbands. For this intervention, Care for Afghan Families received a South Asia Development Marketplace for Nutrition award from the World Bank and its development partners.

Afghanistan has high rates of malnutrition and a high infant mortality rate of 77/1000 births. Infant and young child feeding practices are a key determinant of malnutrition in Afghanistan, and thus far, relatively little attention has been given to this issue. This report was prepared to inform the scaling up of infant and young child feeding through the Government of the Islamic Republic of Afghanistan’s Basic Package of Health Services.

The case study outlines the Baby Friendly Village Project intervention objectives, the project’s approach, monitoring and evaluation issues, findings, and lessons learned. The overall goal of the Baby Friendly Village Project was to promote early and exclusive breastfeeding for children <6 months old and to encourage families to offer age-appropriate complementary foods to children 6-24 months. Forty primary intervention villages were selected in Takhar Province. A Breastfeeding Support Group was established in each village together with a Breastfeeding Counseling Corner in each district level health facility that provided the Basic Package of Health Services. While the sample size for the baseline and follow-up surveys is too small when looking exclusively at Takhar Province, the total sample size for Takhar, Badakhshan, and Kunduz Provinces potentially can detect (with statistical significance) an absolute difference of 17% or greater in the proportion of various infant feeding indicators across the 3 provinces.

This pilot encountered several monitoring and evaluation issues which should be factored into future pilots in Afghanistan and elsewhere. The baseline and follow-up survey sample sizes were too small to detect the expected changes for each intervention province, collecting on-going program monitoring data posed a problem because of high illiteracy rates, the methodology was not adequately considered as part of the intervention, and actual versus intended population coverage of the intervention was in dispute (i.e., members of primary versus secondary intervention villages that received healthcare and infant feeding counseling). Despite its monitoring and evaluation challenges, the pilot has generated a number of important lessons for policymakers and program implementers in Afghanistan.

The Care for Afghan Families intervention shows that for future similar projects, sufficient technical support should be provided to assist the implementing agency with the overall planning of the intervention, including conducting the needed formative studies to guide the education, communication, and social marketing messages and approaches for the various target groups, i.e. mothers vs. husbands vs. mothers-in-law, etc. Special assistance would be needed to help with the design and implementation of an appropriate and feasible program monitoring system to track the quality and coverage of the intervention and to assess its

anticipated impact. The potential use of mobile phone technology could be explored both for the delivery of intervention messages, information to community-based implementers, and even for data collection and reporting. Finally, it is important to pretest the intervention strategy as well as the data collection methodology prior to full-scale implementation. Public health impact from an intervention can be achieved by ensuring its quality and sustained high population coverage (>80%) over time. While many unknowns exist in a country such as Afghanistan, this report illustrates some of the lessons learned from the Care for Afghan Families pilot intervention on infant and young child feeding-Baby Friendly Village Project- and provides recommendations for future initiatives.

## I. Introduction

International recommendations are that newborns should begin breastfeeding within one hour after birth, be exclusively breastfed up to six months of age, and then start consuming nutrient-rich complementary food at six months with continued breastfeeding. In addition to the lack of knowledge about proper infant and young child feeding practices among Afghan mothers, their decisions about child feeding are heavily influenced by their mothers-in-law, husbands, and other influential extended family members who also are likely not to know about basic nutritional needs or appropriate feeding for newborns and young children.<sup>1,2,3</sup>

In addition to the ongoing political instability, violence, and insecurity in the country, the poor health status of the population also hinders the socioeconomic development of Afghanistan.<sup>4</sup> Although there have been substantial improvements during the past decade, the burden of morbidity and mortality still remains very high in Afghanistan, and levels of child undernutrition are very high. The 2010 Afghan Mortality Survey reported an infant mortality rate of 77/1000 births.<sup>5</sup> Diarrhea, acute respiratory infections, and vaccine-preventable illnesses account for nearly 60% of deaths among children under five years in Afghanistan.<sup>6</sup> The Ministry of Public Health's 2004 National Nutrition Survey, using World Health Organization references, finds that 60.5% of children under the age of five are stunted and 33.7% are underweight. The stunting levels are among the highest in the world. Acute undernutrition (wasting) in children under five is 8.7%, lower than would be expected for a country experiencing protracted conflict, but these wasting levels remain very high in the first

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<sup>1</sup> Tchibindat, Felicite, and Zakia Maroof. 2003. *Caring Practices Formative Research in Panjsheer Valley Community, Parwan, Afghanistan*. Afghanistan: United Nations Children's Fund (UNICEF).

<sup>2</sup> Tchibindat, Felicite and Zakia Maroof. 2003. *Caring Practices Formative Research in Gozara, Herat, Afghanistan*. Afghanistan: United Nations Children's Fund (UNICEF).

<sup>3</sup> Save the Children. 2002. *Breastfeeding and Weaning Beliefs and Practices in Parts of Northern Afghanistan*. Afghanistan Office: Save the Children.

<sup>4</sup> The World Bank. "Nutrition at a Glance: Afghanistan." *Nutrition Profiles*. Washington, D.C.: World Bank. <http://siteresources.worldbank.org/NUTRITION/Resources/281846-1271963823772/Afghanistan.pdf>. Accessed May 6, 2012.

<sup>5</sup> Afghan Public Health Institute, Ministry of Public Health (APHI/MoPH) [Afghanistan], Central Statistics Organization (CSO) [Afghanistan], ICF Macro, Indian Institute of Health Management Research (IIHMR) [India], and World Health Organization Regional Office for the Eastern Mediterranean (WHO/EMRO) [Egypt]. 2011. *Afghanistan Mortality Survey 2010*. Calverton, Maryland, USA: APHI/MoPH, CSO, ICF Macro, IIHMR and WHO/EMRO.

<sup>6</sup> United Nations Development Programme (UNDP). "Afghanistan Reduce Child Mortality (Goal 4)." UNDP, <http://www.undp.org.af/MDGs/goal4.htm>. Accessed May 5, 2012.

few years of life (18.1% in children 1–2 years).<sup>7</sup> While in Afghanistan we do not have data for the percentage of children under 6 months of age who are exclusively breastfed,<sup>8</sup> in developing countries more than 60% of all children are not exclusively breastfed for the vital first 6 months.<sup>9</sup> In developed countries, appropriate breastfeeding of infants has been shown to reduce infant morbidity and mortality.<sup>10</sup> According to a joint study on energy and water activities by the United States Agency for International Development and the Association for Rural Development, Inc. (from September 2009–September 2012), only 12–27% of Afghans living in rural areas have access to clean drinking water, and even fewer have access to safe sanitation.<sup>11</sup> A very high prevalence of non-exclusive breastfeeding of less than six month old infants,<sup>12</sup> a lack of safe water and appropriate sanitation are direct contributors to the high levels of diarrheal disease and respiratory illness which are a main cause for the high rates of childhood morbidity and mortality.

A large proportion of infants in Afghanistan are introduced to complementary foods too early (before six months) or too late (after six months), and the micronutrient content in the typically available foods for most infants and toddlers generally is inadequate.<sup>13</sup> This contributes to vitamin and mineral deficiencies that are evidenced by the high prevalence of chronic malnutrition-or stunted growth-and anemia among young children in the country.<sup>14</sup>

The Government of the Islamic Republic of Afghanistan supports the implementation of policies and interventions to reduce morbidity and mortality among the population, especially among mothers and young children. Improving infant and young child nutrition, especially through appropriate breastfeeding and complementary feeding of infants and toddlers, is essential toward reaching that goal.

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<sup>7</sup> Levitt, Emily, Kees Kostermans, Luc Laviolette, and Nkosinathi Mbuya. 2011. *Malnutrition in Afghanistan: Scale, Scope, Causes, and Potential Response*. Washington, D.C.: The World Bank Group. [www-wds.worldbank.org/external/default/WDSContentServer/WDSP/IB/2010/11/15/000356161\\_20101115233235/Rendered/PDF/578720PUB0Maln11public10BOX353782B0.pdf](http://www-wds.worldbank.org/external/default/WDSContentServer/WDSP/IB/2010/11/15/000356161_20101115233235/Rendered/PDF/578720PUB0Maln11public10BOX353782B0.pdf).

<sup>8</sup> United Nations Children’s Fund (UNICEF). 2011. *The State of the World’s Children: Adolescence An Age of Opportunity*. New York: UNICEF: 92. [http://www.unicef.org/sowc2011/pdfs/SOWC-2011-Main-Report\\_EN\\_02092011.pdf](http://www.unicef.org/sowc2011/pdfs/SOWC-2011-Main-Report_EN_02092011.pdf).

<sup>9</sup> United Nations Children’s Fund (UNICEF). “Nutrition: The Big Picture,” UNICEF, [http://www.unicef.org/nutrition/index\\_bigpicture.html](http://www.unicef.org/nutrition/index_bigpicture.html).

<sup>10</sup> National Institutes of Health (NIH). 2004. “Breastfeeding Decreases Infant Mortality.” *NIH News*. Bethesda, MD: NIH. <http://www.nih.gov/news/pr/may2004/niehs-02.htm>. Accessed May 5, 2012.

<sup>11</sup> United States Agency for International Development (USAID). 2011. *Fact Sheet: Afgan Sustainable Water Supply and Sanitation (SWSS)*. Kabul, Afghanistan: USAID. [http://afghanistan.usaid.gov/en/USAID/Activity/151/Afghan\\_Sustainable\\_Water\\_Supply\\_and\\_Sanitation\\_SWSS](http://afghanistan.usaid.gov/en/USAID/Activity/151/Afghan_Sustainable_Water_Supply_and_Sanitation_SWSS)

<sup>12</sup> Levitt, Emily, Kees Kostermans, Luc Laviolette, and Nkosinathi Mbuya. 2011. *Malnutrition in Afghanistan: Scale, Scope, Causes, and Potential Response*. Washington, D.C.: The World Bank Group. [www-wds.worldbank.org/external/default/WDSContentServer/WDSP/IB/2010/11/15/000356161\\_20101115233235/Rendered/PDF/578720PUB0Maln11public10BOX353782B0.pdf](http://www-wds.worldbank.org/external/default/WDSContentServer/WDSP/IB/2010/11/15/000356161_20101115233235/Rendered/PDF/578720PUB0Maln11public10BOX353782B0.pdf).

<sup>13</sup> Ministry of Public Health(MoPH)-Islamic Republic of Afghanistan. 2010. *Strategy for the Prevention and Control of Vitamin and Mineral Deficiencies in Afghanistan*. Kabul, Afghanistan: MoPH.

<sup>14</sup> Ministry of Public Health (MoPH)-Islamic Republic of Afghanistan, United Nations Children’s Fund (UNICEF), Centers for Disease Control and Prevention (CDC), and Tufts University. 2004. *Afghanistan National Nutrition Survey*. Atlanta, Georgia: CDC.

## II. Background

In 2009 the World Bank and its development partners launched a South Asia Development Marketplace for Nutrition that invited proposals from civil society organizations for innovative approaches to address malnutrition in the countries of the region. Care for Afghan Families, a Non-Governmental Organization established in Kabul in 2003, was the recipient of the Development Marketplace award in Afghanistan. Care for Afghan Families also is contracted by the Ministry of Public Health of the Government of the Islamic Republic of Afghanistan to deliver the nationally approved Basic Package of Health Services in Badakhshan, Kunduz, and Takhar Provinces in northern Afghanistan. As its Development Marketplace project, Care for Afghan Families chose to implement an innovative model to improve knowledge, attitudes, and practices related to age-appropriate infant and young child feeding practices in selected districts of the aforementioned provinces. Delivery was facilitated by its existing capacity and experience in delivering primary healthcare services in that region and by the trust built with the local population through the exposure to the organization and its activities.

The innovative aspect of Care for Afghan Families' pilot intervention called "Baby Friendly Village Project" (BFVP) was to promote appropriate infant feeding practices not only among mothers, but also among their broader communities and social support networks, especially their mothers-in-law and husbands who have significant influence over the feeding of young children in most Afghan families. While this approach may not be innovative in some other countries, it was an important step forward for infant and young child feeding in Afghanistan. This document summarizes the lessons and findings from the intervention in four districts (Rustaq, Dasht-e-Qalah, Khoja Khar, and Farkhar) of Takhar Province (Figure 1).

The purpose of the case study is to analyze and share the main lessons learned from the experience in order to inform additional phases of scale up by Care for Afghan Families and other development partners. While this review points to weaknesses in data collection during the pilot, this experience provides a number of important lessons for advancing infant and young child feeding practices in Afghanistan. It also points to the value of designing up-front and simple, yet robust, data collection systems when carrying out an innovative pilot.

Infant and young child feeding practices are a key determinant of malnutrition in Afghanistan, and there has been relatively little attention given to this issue. However, nutrition recently has become a higher priority in Afghanistan. A Nutrition Action Framework has been prepared by five core ministries, including the Ministry of Public Health that implements the Basic Package of Health Services through which this pilot was conducted. Improving infant and young child feeding knowledge and practices is a core priority for the Ministry of Public Health and its partners. Through the Basic Package of Health Services, it is anticipated that this review will inform the scaling up of infant and young child feeding practices.

### **III. Project Goal and Objectives**

The overall goal of the Baby Friendly Village Project was to promote early and exclusive breastfeeding and to encourage families to offer age-appropriate complementary foods to children 6-24 months old. The project objectives were to:

1. Improve knowledge, attitudes, and practices of pregnant and lactating mothers about optimal infant and young child feeding.<sup>15</sup>
2. Raise awareness of and promote supportive attitudes about optimal infant and young child feeding practices among husbands and mothers-in-law.
3. Increase the proportion of women who reported initiating breastfeeding within one hour of delivery by 10-15% and increase those exclusively breastfeeding their infants up to six months of age compared to the national baseline by 10-15% (currently at ~60% and ~35% respectively).<sup>16</sup>

### **IV. Intervention Design and Implementation**

The Baby Friendly Village Project had two overall intervention components: 1) encouragement of recommended infant and young child feeding practices at the community level by village-based Breastfeeding Support Group volunteers (see Section IV-1 below) and; 2) infant and young child feeding counseling and guidance by trained Breastfeeding Counselors at the health facility in each target district (see Section IV-2 below).

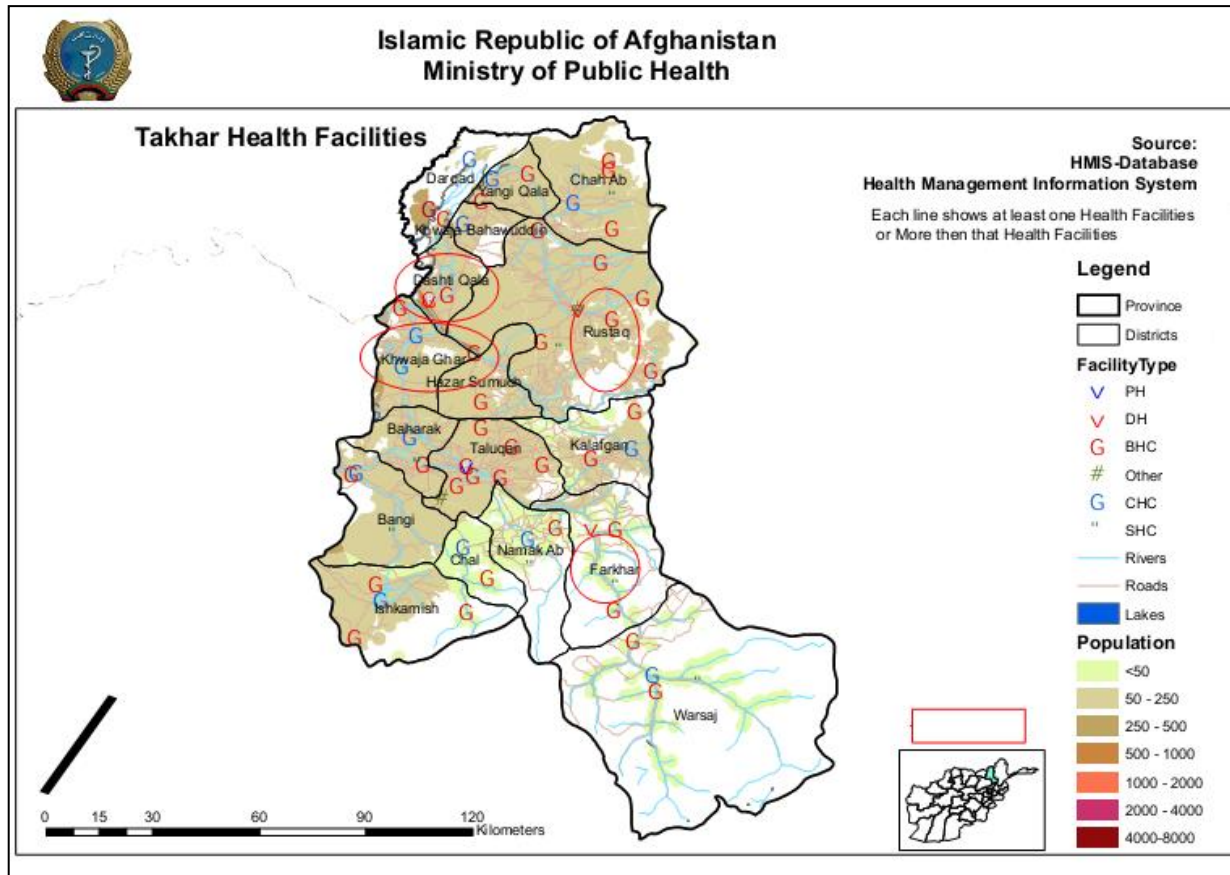
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<sup>15</sup> This first objective was to increase knowledge and awareness about breastfeeding and complementary feeding and applied to 3750 community members and 5000 breastfeeding mothers across the intervention villages in the three provinces.

<sup>16</sup> Ministry of Public Health (MoPH)-Islamic Republic of Afghanistan, United Nations Children's Fund (UNICEF), Centers for Disease Control and Prevention (CDC), and Tufts University. 2004. Afghanistan National Nutrition Survey. Atlanta, Georgia: CDC.



**Figure 1: Map of Takhar District**

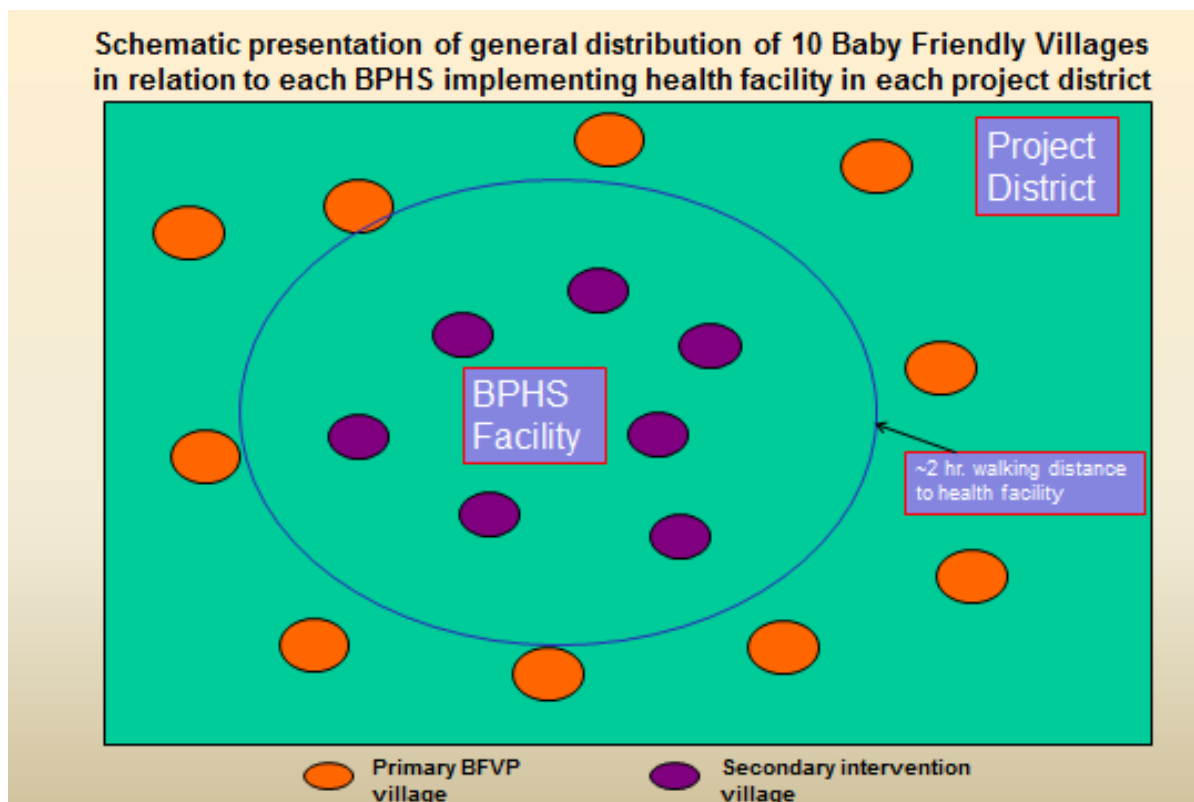


The District Hospitals in *Rustaq*, *Farkhar*, and, *Dasht-e-Qala* Districts and the Comprehensive Health Center in *Khoja Khar* District, which all were operated by Care for Afghan Families and implemented the Ministry of Public Health approved the Basic Package of Health Services, served as the “intervention nodes” through which the project was coordinated. Relevant “project staff” (see Section IV-3 below) based in those health facilities worked with local village volunteers and within the health facilities to implement the project activities.

#### ***IV-1 Village-based Encouragement of Appropriate Breastfeeding***

In each of the four project districts in Takhar Province, ten villages that were more than 2-hours walking distance from the district health facility were selected as the primary intervention villages. Thus, a total of 40 Baby Friendly Village Project villages were selected in Takhar Province (see Figure 2). The villages were selected based on accessibility as well as the communities’ acceptance of the project. The fact that the population generally was familiar with Care for Afghan Families as the main provider of health services in the intervention districts was essential in getting the villagers’ “buy-in” and participation.

**Figure 2: Selection of Baby Friendly Villages in Relation to Basic Package of Health Services**



A Breastfeeding Support Group was established in each of the primary intervention villages. Each Breastfeeding Support Group consisted of 10 volunteer village members—including the village’s two Community Health Workers (one female and one male) and eight other influential villagers (four females and four males, e.g. mullah, school teacher, and respected elderly). Therefore a total of 400 Breastfeeding Support Group volunteers were recruited across the 40 primary intervention villages and were informed about basic infant and young child feeding concepts (with a primary focus on appropriate breastfeeding initiation and duration) to share with their fellow villagers.

The Breastfeeding Support Group volunteers signed or marked via thumbprint a brief agreement to promote and to encourage appropriate infant and young child feeding within their communities as best as they could. They also agreed to refer mothers who had difficulties with breastfeeding to the Breastfeeding Counseling Corner established in their respective district’s health facility for more guidance and counseling by a specially trained Breastfeeding Counselor.

The Community Health Worker members of the Breastfeeding Support Groups were to share relevant information on infant and young child feeding with pregnant and lactating women and their family members during routine outreach home health visits within their villages, as well as when villagers sought services at the village health post. The Community Health Workers

as well as the other eight Breastfeeding Support Group members also were to discuss and to promote appropriate infant and young child feeding practices whenever opportunities arose, such as during social visits with relatives and friends and/or at community gatherings such as weddings, prayer services, or funerals.

Mothers who had potential lactation difficulties were identified primarily by the village Community Health Workers. Examples of mothers who the Community Health Workers identified as having lactation difficulties were:

1. Mothers with infants whose health was thought to be deteriorating.
2. Mothers who complained about having breastfeeding difficulties.
3. Mothers who were brought to the attention of the Community Health Worker by family members.

Husbands and mothers-in-law were identified and approached as well at this time, although no specific or systematic process was used by Community Health Workers to approach these family members. The selection process for potential mothers with lactation difficulties, their husbands, and their mothers-in-laws was an ad-hoc process through with primary healthcare services in villages would suggest community members to the Community Health Workers.

The main incentives for the Breastfeeding Support Group volunteers were: (1) being recognized in the community as a trained source of information on infant feeding and (2) receiving a small per diem for attending the required training workshops and other relevant project related group events. Strategies for sustaining the active involvement of the Breastfeeding Support Group volunteers, other than the Community Health Workers who are part of the primary healthcare network that delivers the Basic Package of Health Services, were not considered as part of this pilot intervention. However, it was anticipated that once informed about infant and young child feeding concepts, the volunteers would continue to share their knowledge with villagers beyond the life of the project and encourage families to support mothers to appropriately breastfeed their infants.

#### ***IV-2 Health Facility-based Breastfeeding Counseling***

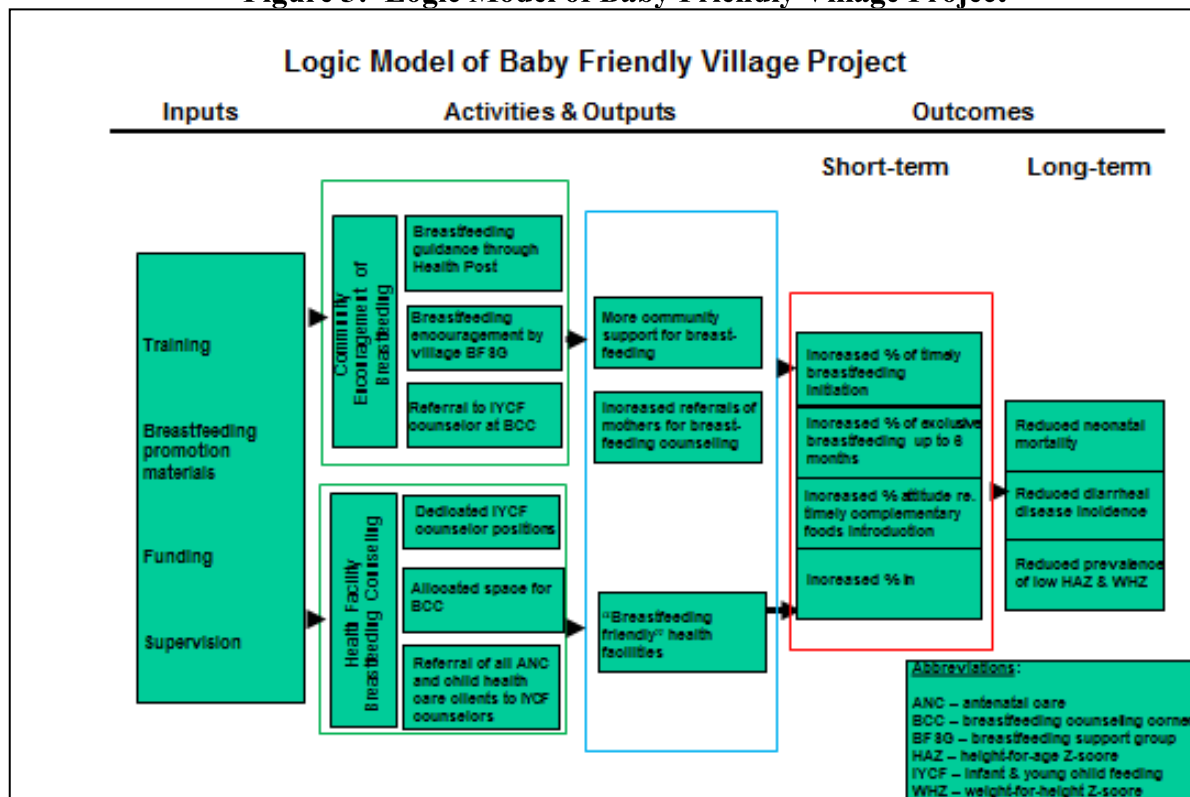
As indicated above Care for Afghan Families was contracted by the Ministry of Public Health to provide healthcare services in Takhar Province and implemented the Basic Package of Health Services within the health facility in the four Districts where the Baby Friendly Village Project was implemented. As an essential component of the project, Care for Afghan Families' management designated space within each of the main health facilities in each of the four districts as a Breastfeeding Counseling Corner. One midwife in each health facility was assigned to serve as a Breastfeeding Counselor to serve pregnant and lactating women who visited the facility for preventive or minor health services for themselves or their children, or were specifically referred for counseling by the Community Health Workers of the primary intervention villages. To help meet the client caseload, the counselors' midwifery responsibilities were minimized by reassignment of other staff midwives within the health facility to adequately cover clients seeking antenatal care services.

Each Breastfeeding Counselor was on duty to offer advice and guidance to mothers and caregivers of children <24 months old, regardless of the mothers' village of residence (see Figure 2), about appropriate infant and young child feeding practices with a special focus on breastfeeding. However, the Breastfeeding Counselors especially were responsible to serve lactating mothers who were referred from the primary intervention villages because of difficulties with breastfeeding (e.g. improper latching of the baby to nipple, nipple pain or discomfort, mastitis, not producing insufficient milk, etc.). The Breastfeeding Counselors also engaged mothers-in-law or husbands who accompanied the clients in the counseling sessions to help develop key family support for the lactating mothers. For this paper, no information on quality of counseling or client perception is available.

In addition to the designation of a Breastfeeding Counselor and a Breastfeeding Counseling Corner within each target health facility, Care for Afghan Families' management scheduled a number of training sessions for the relevant staff of each health facility, so they would routinely refer all pregnant and lactating clients to the Breastfeeding Counseling Corner for breastfeeding counseling services, regardless of the clients' village of residence.

The overall approach of the Baby Friendly Village Project is summarized as a logic model in Figure 3.

**Figure 3: Logic Model of Baby Friendly Village Project**



**IV-3 Training of Project Team**

The implementation of the Baby Friendly Village Project activities in Takhar Province depended on the staff within each district health facility, teams of village-based volunteers, and Care for Afghan Families’ management staff in Takhar Province and in Kabul city. The categories of project team members and their primary responsibilities are summarized in Table 1. Furthermore, as illustrated in Figure 4, the training of the various tiers of team members was carried out in a hierarchical manner.

**Table 1: Baby-Friendly Village Project Team Member Roles and Responsibilities**

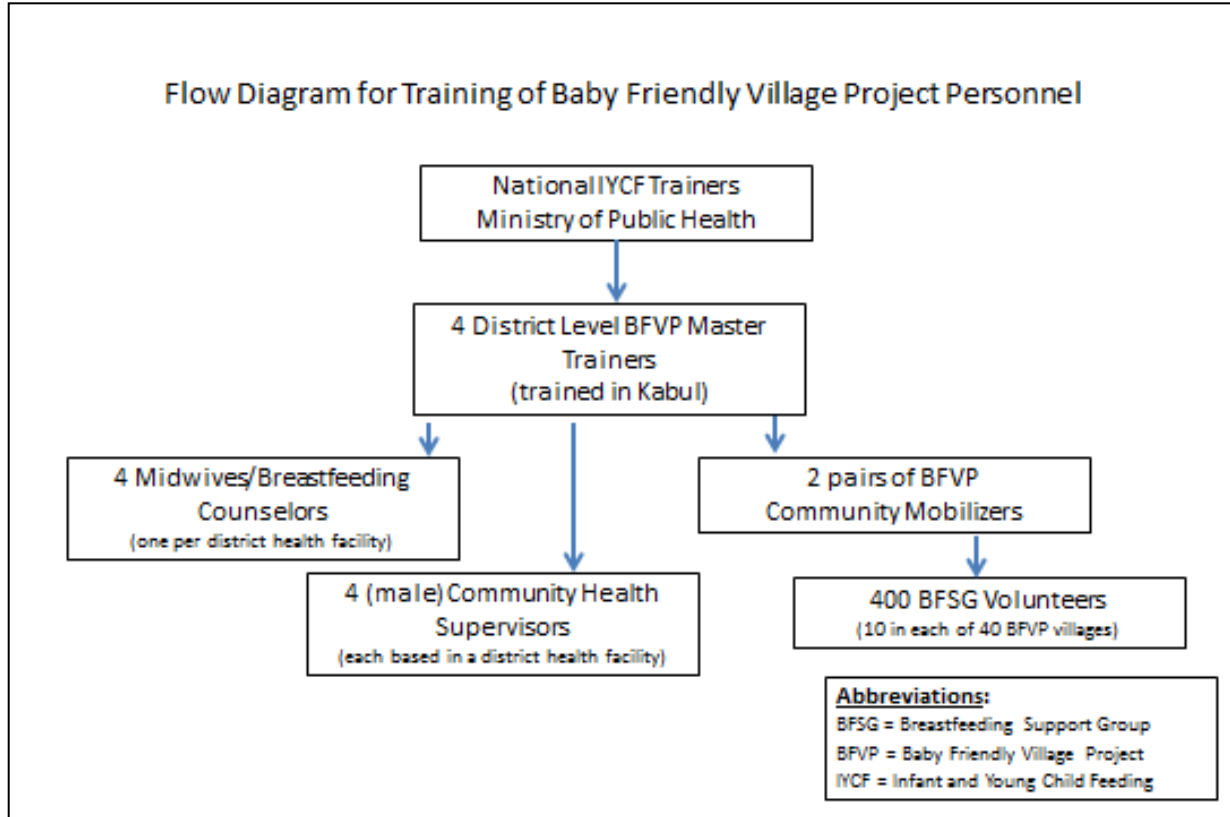
Paid personnel		Roles and Responsibilities
	Breastfeeding Counselors – District health facility midwives who are regular facility staff; i.e. did not require project funds for their salaries	Provide preventive infant and young child feeding (primarily breastfeeding) counseling to pregnant and lactating women during routine Basic Package of Health Services care and maternal and child health services (e.g. antenatal care, postnatal care, and vaccinations); assist mothers who deliver in the Basic Package of Health Services facility with early breastfeeding initiation; counsel mothers referred from the Baby Friendly Village Project sites due to lactation difficulties. (Data are not readily available to assess the level of Breastfeeding Counselors’ daily client caseloads.)
	Community Mobilizers– two pairs (female and male) hired for the duration of the project and paid using project funds to support all 40 primary intervention villages	Train village Breastfeeding Support Group volunteers in basic infant and young child feeding (especially breastfeeding) concepts and monitor their activities through weekly site visits (the actual frequency and regularity of such site visits were dependent on the local security situation).
	Community Health Supervisors – one male staff member within each of the four target district health facilities	Responsible for monitoring all activities of the health posts and Community Health Workers in <u>all</u> the district villages (>100). When feasible, each Community Health Supervisor also looked into the activities of the Breastfeeding Support Group members in each of the 10 project villages in his district (it is highly unlikely that the Supervisor was able to visit the Baby Friendly Village Project sites more than once during the 18 month project period).
	Care for Afghan Families management staff – project focal point in Takhar Province, and technical and administrative staff in Kabul	Responsible for project supervision and monitoring, and technical and administrative support toward Baby Friendly Village Project implementation.

Unpaid volunteers		
	Community Health Workers – one female; one male per village, who also were members of their village Breastfeeding Support Group	Promoted appropriate infant and young child feeding practices among the village population “as best as they could” given their other health post service delivery activities as well as daily life responsibilities. Referred lactating women and their infants to the Basic Package of Health Services facility Breastfeeding Counseling Corner as needed. (There are no data to assess the extent of Community Health Workers activities within the Baby Friendly Village Project; data also are not readily available on the number of Breastfeeding Counseling Corner referrals by village.)
	Breastfeeding Support Group members – 4 females and 4 males per village	Promoted appropriate infant and young child feeding practices among the village population “as best as they could” given their other daily life responsibilities. The most common approach was to deliver infant and young child feeding messages during community gatherings.

First, the National Infant and Young Child Feeding Trainers of the Public Nutrition Department of the Ministry of Public Health trained four District-based Master Trainers on infant and young child feeding concepts and counseling methods. Slide presentations, group discussions, and role-playing sessions were used for the training. The trainings were based on a United Nations Children’s Fund infant and young child feeding training course as adapted by the National Infant and Young Child Feeding Trainers in Afghanistan. No specific formative studies were performed in the intervention areas prior to the implementation of the project to assess the main reasons for the inappropriate infant and young child feeding practices or to develop the most appropriate communication messages to help influence the target groups’ attitudes and practices.

Each Master Trainer in turn trained one midwife who was assigned to serve as a Breastfeeding Counselor in the designated district health facility. This training was done essentially one-on-one, using presentation and discussion of topics and examples of breastfeeding difficulties and options to help mothers overcome them.

**Figure 4: Training of Project Team Members**



The Master Trainers also trained two female and male pairs of Community Mobilizers primarily on the basic concepts of appropriate breastfeeding practices and timely introduction of solid foods at six months of age. The Community Mobilizers specifically were hired for the duration of this project, and each pair was responsible for providing basic education and information on breastfeeding and complementary foods to the Breastfeeding Support Group volunteers in the 40 primary intervention villages. The male Community Mobilizers worked with the male Breastfeeding Support Group volunteers, while the female Community Mobilizers worked with the female Breastfeeding Support Group volunteers. Because these volunteers were illiterate, their training on infant and young child feeding topics was performed aurally using pictorial guides developed by the Ministry of Public Health. However, the pictorial guides were not formally assessed to determine if illiterate users can readily understand their content. As part of their education, the Breastfeeding Support Group volunteers also were instructed to refer mothers who had difficulty with lactation to the Breastfeeding Counselors at the district health facilities. As needed, the Community Mobilizers provided additional instruction to the Breastfeeding Support Group volunteers during periodic follow-up site visits to the villages.

Finally, each Master Trainer trained one Community Health Supervisor per project district on basic infant and young child feeding concepts. Each Community Health Supervisor was an employee of the district health facility and responsible for supervision and monitoring of the Community Health Workers across all the villages of the district (not only the Baby Friendly

Village Project ones). The role of the Community Health Supervisor primarily was to have sufficient understanding of infant and young child feeding concepts so as to be able to provide appropriate support to the Community Health Worker of a Baby Friendly Village Project community during overall monitoring visits to village health posts. However, given the number of villages for which each Community Health Supervisor was responsible, it was highly unlikely that he would visit any village more than once or twice per year.

In addition to the training of the Baby Friendly Village Project team members described above, various presentations and workshops were convened in each target district health facility to raise awareness for key staff about infant and young child feeding, so they could facilitate the referral of all relevant clients to the Breastfeeding Counseling Corner.

#### ***IV-4 Approach to Infant Feeding Promotion***

The findings of a few recent qualitative studies of infant and young child feeding practices in some communities in Afghanistan<sup>17,18,19</sup> have been used by the Ministry of Public Health in the development of its infant and young child feeding training topics for healthcare providers. However, no formative studies have been done to help formulate specific and targeted “behavior change communication” or “social marketing” messages to influence infant feeding practices within the Afghan population.

The Baby Friendly Village Project design did not include formative research to develop and test relevant behavior change communication messages related to infant and young child feeding targeted at lactating mothers, mothers-in-law and fathers (the primary target groups of the project) in the project areas. The basic assumption of the intervention was that educating and informing the adult female and male populations of the intervention communities about the health and nutritional importance of appropriate breastfeeding and complementary feeding of infants would help influence their attitudes and practices.

Overall, the promotion of appropriate infant and young child feeding in this intervention was done through “person-to-person” information sharing and encouragement at the village level. In addition to infant feeding “education,” the Breastfeeding Counselors offered counseling services to expecting and lactating mothers (and to relevant adults accompanying them to the district health facility—i.e. mothers-in-law and fathers) to encourage and to guide them to initiate breastfeeding within one hour of birth and to continue exclusive breastfeeding for six months. The nearest opportunities to “mass communication and promotion of breastfeeding” at the community level were when the village mullah would incorporate the topic during sermons in the mosque, but only males were reached in this manner. Various posters and brochures on infant feeding also were displayed at the district health facilities and village

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<sup>17</sup> Tchibindat, Felicite, and Zakia Maroof. 2003. *Caring Practices Formative Research in Panjsheer Valley Community, Parwan, Afghanistan*. Afghanistan: United Nations Children’s Fund (UNICEF).

<sup>18</sup> Tchibindat, Felicite and Zakia Maroof. 2003. *Caring Practices Formative Research in Gozara, Herat, Afghanistan*. Afghanistan: United Nations Children’s Fund (UNICEF).

<sup>19</sup> Save the Children. 2002. *Breastfeeding and Weaning Beliefs and Practices in Parts of Northern Afghanistan*. Afghanistan Office: Save the Children.



health posts. Although there is no information on the effectiveness of such tools, given the extent of illiteracy in the population, the influence of such tools was likely limited.

#### ***IV-5 Coordination of Interventions***

As can be anticipated, the rural nature of Takhar Province and the Baby Friendly Village Project districts, the relatively long distances between the primary intervention villages and the district centers, and the increasing insecurity in the northern parts of Afghanistan made coordination between villages and the project leadership rather challenging. Nevertheless, Care for Afghan Families developed an approach to coordinate the various aspects of the project within the overall infrastructure of the implementation of the Basic Package of Health Services.

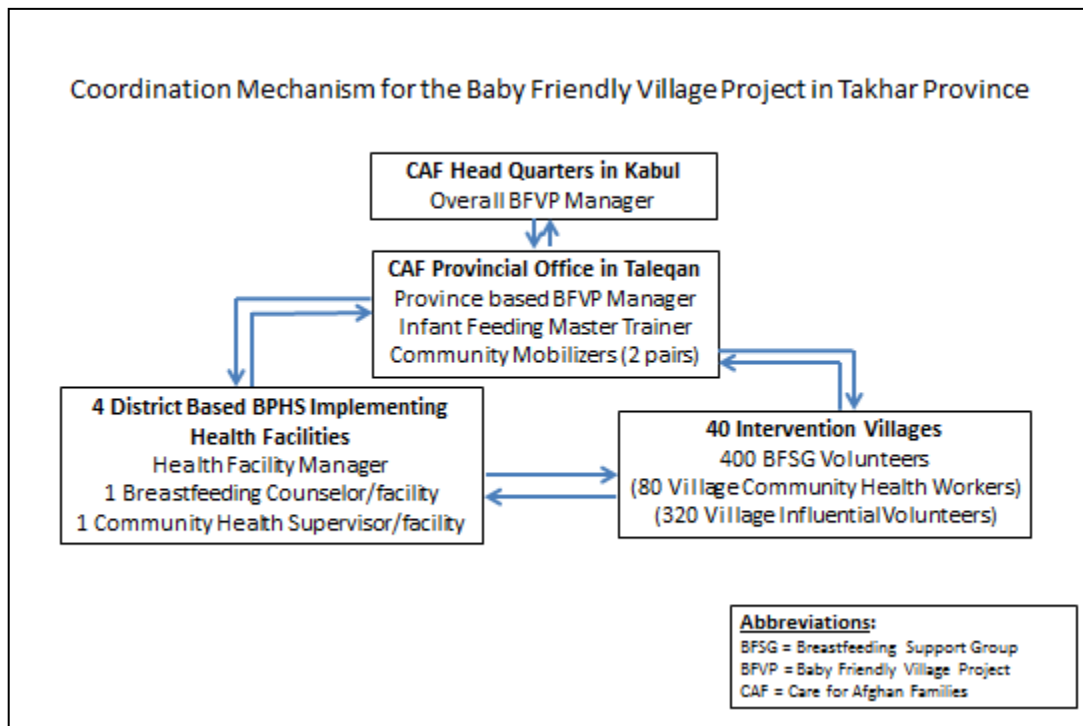
The overall coordination mechanism for the Baby Friendly Village Project is illustrated in Figure 5 below. The coordination process is summarized as follows:

- The Baby Friendly Village Project Manager based at the Care for Afghan Families Headquarters in Kabul was responsible for overall management and coordination of the project in Badakhshan, Kunduz, and Takhar Provinces.
- The Takhar Province Baby Friendly Village Project Manager (a regular Care for Afghan Families staff member) was based within the Care for Afghan Families provincial office in the town of Taleqan, the capital of Takhar Province. This individual was responsible for coordinating Baby Friendly Village Project strategies and activities across the four intervention districts in the province and spent about 10% of time visiting the project's Breastfeeding Counseling Corners and primary intervention villages in the four project districts.
- The Provincial Infant and Young Child Feeding Master Trainer (a regular Care for Afghan Families staff member) who was trained by the National Master Trainers in the Ministry of Public Health in Kabul (see Section IV-3, above) also housed in the Care for Afghan Families' provincial office in Taleqan, was responsible for training the health facility Breastfeeding Counselors in each of the four project districts, was responsible for training the project Community Mobilizers, and was accountable for providing further support to both groups as needed.
- The two male and female pairs of Community Mobilizers, hired using project funds, were based in the Care for Afghan Families' provincial office in Taleqan, and they visited the project district health facility and the Baby Friendly Village Project villages on weekly and monthly schedules. During this time, they would provide needed support and service as a conduit of information between the local sites and the Baby Friendly Village Project managers in Taleqan and Kabul. The Community Mobilizers specifically were responsible for training the Breastfeeding Support Group volunteers in the 40 intervention villages and for providing them support and encouragement to promote good infant and

young child feeding practices within their communities. The Community Mobilizers also transmitted relevant information between the village-based Community Health Workers, the Breastfeeding Counselors, and the Community Health Supervisors, who were Basic Package of Health Services implementation staff within each district health facility. In addition to site visits, the Community Mobilizers used mobile phones to communicate with the district and village project sites as needed.

- The four project district health facility directors oversaw the Baby Friendly Village Project related activities of the Breastfeeding Counselors and Community Health Supervisors based in those facilities and supported them as needed. Key examples of such support were designating a facility midwife as a Breastfeeding Counselor, designating space in the facility as a Breastfeeding Counseling Corner, encouraging the education of all relevant health facility staff on infant and young child feeding and approving facility policies and procedures to ensure referral of all appropriate facility patients and clients to the Breastfeeding Counseling Corner.

**Figure 5: Coordination Mechanism**



- The Community Health Supervisor, who is a regular staff member of each district health facility and responsible for the overall program’s infant and young child feeding training and support and monitoring of the Community Health Workers in all their health services delivery activities at the village level, also followed up on the Baby Friendly Village Project activities of the Community Health Workers and the Breastfeeding Support Group volunteers

during their monthly or bi-monthly visits to the villages. The Supervisors used simple “checklists” to assess the situation and report back to the district health facility director and the Community Mobilizers as needed.

- At the village level, the Community Health Workers oversaw and helped coordinate the activities of the Breastfeeding Support Group volunteers, including requesting support from the Community Mobilizers or communicating with the Breastfeeding Counselors in the health facilities during scheduled meetings or via mobile phone.

#### ***IV-6 Project Monitoring and Evaluation Issues***

Based on their local experience as primary health service providers in Takhar Province, the project designers in Care for Afghan Families believed that infant feeding practices in that area were not optimal and that the prevalence of timely breastfeeding initiation and exclusive breastfeeding was low among the target populations. To generate “baseline” data on infant feeding attitudes and practices (among lactating women, mothers-in-law and husbands) across the intervention areas, a quantitative survey using Lot Quality Assurance Survey methodology was carried out. Because the Baby Friendly Village Project was implemented in selected districts in Badakhshan, Kunduz and Takhar Provinces (as already mentioned), the survey was intended to provide prevalence estimates on indicators of infant and young child feeding attitudes and practices for each province (not at district level) with the combined data to describe the situation in the three provinces as a whole. A follow-up survey using the same methodology was carried out at the end of the project to assess its impact on infant and young child feeding attitudes and practices across the three intervention provinces. However, the survey sample size was too small (substantially <100) to provide reliable estimates for each province (see Table 2), and thus, highly unreliable for each intervention district as well.

The Lot Quality Assurance Sampling survey method was used because Care for Afghan Families was familiar with this data collection method and considered it a relatively low cost and feasible approach for community based quantitative data collection.

**Table 2: Baseline Lot Quality Assurance Sampling Survey Sample Size**

<b>Respondent Category</b>	<b>Province</b>			<b>TOTAL (N)</b>
	<b>Badakhshan (N)</b>	<b>Kunduz (N)</b>	<b>Takhar (N)</b>	
Mothers of children less than six months	43	38	37	118
Mothers of children 6-24 months	46	38	37	121
Fathers of children 0-24 months	46	38	37	121

Due to the very high rate of illiteracy in the intervention area populations, even among the Community Health Workers (who also were responsible to deliver other primary health services as part of their regular Basic Package of Health Services responsibilities) it was difficult to collect on-going program monitoring data in the intervention villages. For example,

it was not feasible for the Breastfeeding Support Group volunteers to keep records on the numbers of pregnant versus lactating women, mothers-in-law, or fathers they informed or advised on appropriate breastfeeding. However, the Breastfeeding Support Group volunteers shared their progress and overall thoughts on the population's acceptance (or lack thereof) qualitatively with the Community Mobilizers or Community Health Supervisors that visited their villages. The latter in turn conveyed the information to the other project team members and managers. However, a systematic method for recording the qualitative findings was not developed.

The main program monitoring output indicators that were reported included:

1. The numbers and types of project team members involved in one capacity or another (see Table 1, above).
2. The number of lactating women referred by the Community Health Workers of the primary intervention villages to the Breastfeeding Counseling Corners for counseling.<sup>20</sup>

With regard to the proportion of the target populations that was covered or reached by the intervention, one project objective was to “increase the knowledge and awareness of 3750 community members about breastfeeding and complementary feeding.” That number is the total number of Breastfeeding Support Group volunteers that were to be trained to support the intervention villages in Badakhshan, Kunduz and Takhar Provinces combined; the appropriate number for Takhar Province would have been 400 but was not specified because Care for Afghan Families project implementers did not anticipate reporting data for each of the individual provinces as opposed to the project data as a whole. Although the Breastfeeding Support Group volunteers were residents of the intervention villages, their numbers should not be considered to represent the coverage of the general population of those villages.

Another population coverage objective was to “improve (the) knowledge and practice of 5000 breastfeeding mothers” (again across the intervention villages in three provinces; the figure for the Takhar villages was not specified because Care for Afghan Families project implementers did not anticipate reporting data for each of the individual provinces as opposed to the project data as a whole). This implied that the total estimated population of pregnant/lactating women in those villages would be covered. This is highly unlikely, and it would have been more accurate to assess the actual population coverage of the interventions during the follow-up survey. Unfortunately, no data were collected on the proportion of lactating women, mothers-in-law, or husbands that were reached or what their primary source of information/guidance regarding infant feeding was (e.g. Breastfeeding Support Group volunteers, Breastfeeding Counselors, village mullahs, etc.). This lack of data might be a result of Care for Afghan

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<sup>20</sup> The total number of pregnant or lactating women who received counseling at the Breastfeeding Counseling Corners included those who were specifically referred by the Community Health Workers. This figure was reported as a cumulative count of women who received counseling prior to and during each month of the intervention. Therefore, it appeared as if there were dramatic increases in the numbers of Breastfeeding Counseling Corner clients at each consecutive month. Disaggregated counts for each month would have been the appropriate method of reporting of the numbers of clients served. Also, women who had repeat visits were not distinguished from women who had single visits to the health facility.

Families project implementers' minimal technical skills and expertise. It also is important to note that women from the surrounding "secondary intervention" villages also were routinely referred to the Breastfeeding Counseling Corner by the health facility staff, in addition to lactating women from the primary intervention village (see Figure 2) who were referred to the Breastfeeding Counseling Corners. Although data were not collected, anecdotal reports suggest that the majority of mothers served in each Breastfeeding Counseling Corner were residents of the "secondary intervention" villages. Therefore, infant and young child feeding practices may also have been impacted by the latter villagers. Although 303 lactating women were reportedly referred from the primary intervention villages to the Breastfeeding Counseling Corners because of lactation difficulties, data were not readily available to assess the proportion of them that overcame their difficulties. Furthermore, it is not possible to assess what percent of all lactating women served by the Community Health Workers were referred to the Breastfeeding Counseling Corners. In addition, the number or proportion of women counseled at the Breastfeeding Counseling Corners more than once during each reporting period is not known.

The impact objectives of the intervention called for 10% - 15% increases in the proportion of women who reported initiating breastfeeding within one hour of delivery and the same increase for those exclusively breastfeeding their infants up to six months of age compared to the national baseline (~60% and 35%, respectively).<sup>21</sup> Since it was likely that the national estimates would not have applied to the population in the intervention areas, it would have been more appropriate to modify the objective after the baseline infant and young child feeding survey in the intervention areas.

## **V. Lessons Learned**

### ***V-1 Proper Management by Basic Package of Health Services Implementing Non-Governmental Organizations***

One of Care for Afghan Families' goals as an organization was to strengthen nutrition interventions toward improving the health status of the Afghan population. Care for Afghan Families' senior staff consisted of Afghan physicians who had received training on maternal and child nutrition through a variety of professional and academic avenues. Care for Afghan Families submitted a funding proposal based on the Baby Friendly Village Project intervention which it conceptualized. As advocates of maternal and child nutrition, Care for Afghan Families management modified the health service delivery policy and trained and encouraged all the health facility staff in all the project districts to ensure that appropriate clients were routinely referred to the Breastfeeding Counseling Corner for infant feeding counseling services.

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<sup>21</sup> Ministry of Public Health (MoPH)-Islamic Republic of Afghanistan, United Nations Children's Fund (UNICEF), Centers for Disease Control and Prevention (CDC), and Tufts University. 2004. Afghanistan National Nutrition Survey. Atlanta, Georgia: CDC.

## Recommendations

1. Ensure that Non-Governmental Organizations selected to implement the Basic Package of Health Services for infant feeding promotion interventions have the following characteristics: (i) The senior staff includes highly trained Afghan physicians; (ii) the organization has a firm commitment to improving the health of the Afghan population and to promoting appropriate infant and young child feeding practices, and (iii) the organization has a commitment to sustaining its maternal and child health nutrition services and to further support the services of the infant feeding counselors within Baby Friendly Village Project health facilities.
2. Given the relatively high coverage of mobile phones, even in rural areas in Afghanistan, consider options to utilize this technology to help coordinate activities with the local communities and to monitor the activities and needs of village Community Health Workers and Breastfeeding Support Group volunteers.

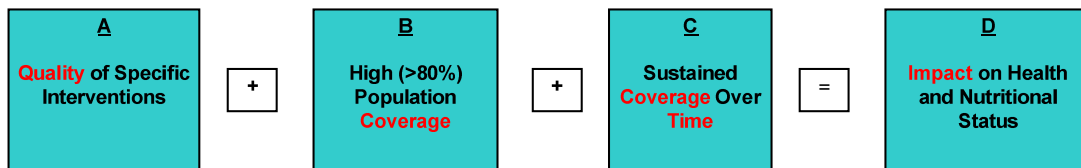
### *V-2 Ensuring Quality and Population Coverage of Interventions*

The effectiveness or impact of a public health program depends on:

- a. Implementing quality interventions and activities;
- b. Achieving high coverage or reach of the quality intervention and activities among the target population;
- c. Sustaining the high coverage of the quality interventions and activities over time.

**Figure 6: Formula for Public Health Success**

“Formula” to Describe Public Health Success of an Effective Maternal & Child Health/Nutrition Program



On-going data collection and information reporting



Source: Parvanta I. Guide for Developing a Population Based Flour Fortification Program Monitoring and Surveillance System Using Non-Probabilistic Data Collection. Smarter Futures, Final Draft, February 12, 2012.

To be truly population based, equitably beneficial, and effective, it is recommended that the vast majority (e.g.  $\geq 80\%$ ) of the target population be covered or reached by the program.<sup>22</sup> One focus of the Baby Friendly Village Project implementers was to inform the primary healthcare service providers (i.e., the Basic Package of Health Services) about appropriate infant and young child feeding methods, so these providers would educate and encourage their clients accordingly. Another equally important principal that guided the intervention design was that mothers-in-law and husbands should be educated about infant feeding (especially early and exclusive breastfeeding) to better enable mothers' breastfeeding practices because the infant feeding choices of Afghan mothers are heavily affected by their mothers-in-law and husbands. Unfortunately, no assessments of how to better incorporate mothers-in-law and husbands in Afghanistan appear to be available.

Such an "infant and young child feeding education" approach likely would help change the breastfeeding decisions and practices of some mothers. However, it generally is accepted that a "behavior change communication" approach is more effective in modifying populations' attitudes and practices than a "health education" approach alone. Therefore, it would have been more appropriate for the Baby Friendly Village Project designers to carry out a formative study in the intervention areas to determine the appropriate "communication messages" that would most likely change the infant feeding related attitudes and practices of the target populations.

Regardless of the approach to the promotion of appropriate infant and young child feeding practices, it is important to ensure that the interventions and activities are carried out with sufficient quality and reach the majority of the target population. Without such verification, it would not be possible to determine which interventions or activities may be contributing to the lack of desired impact so that appropriate corrective steps may be taken. Even if positive changes in the population's infant and young child feeding attitudes and practices are detected, it would be difficult to attribute the findings to the intervention if its quality and coverage is not known.

No systematic quantitative or qualitative data system was established to assess the "quality" of the village-based or the health facility-delivered activities of the Baby Friendly Village Project. For example, it was not known how frequently or regularly the Breastfeeding Support Group volunteers discussed or shared infant and young child feeding issues with residents of the villages, or which types of occasions (e.g. scheduled outreach health activities of the Community Health Workers, social visits by Breastfeeding Support Group members to homes of relatives and neighbors, community events, etc.) were most often used for infant and young child feeding promotion in the primary intervention villages. It also is not known what proportion of the target groups (i.e., lactating women, mothers-in-law, husbands) were reached by the interventions in those villages. Similarly, it is not known what proportion of those same groups who resided in the secondary intervention villages (see Figure 2) received breastfeeding counseling services because lactating mothers and their accompanying adult relatives from

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<sup>22</sup> Pena-Rosas, J.P., I. Parvanta, F. van der Haar, and T.J. Chapel. 2008. "Monitoring and Evaluation in Flour Fortification Programs: Design and Implementation Considerations." *Nutrition Reviews*. 66(3): 148-162. <http://www.ncbi.nlm.nih.gov/pubmed/18289179>.

those villages also were referred to the Breastfeeding Counseling Corner when they sought health services at the project district health facilities.

Thus, it is not possible to comment on whether the “primary” intervention villages with Breastfeeding Support Group volunteers could indeed be considered more “Baby Friendly” compared to the secondary intervention villages without Breastfeeding Support Groups. The population coverage of the Baby Friendly Village Project interventions also is not known. No information was available during the project implementation period on the proportion of lactating women versus mothers-in-law versus husbands that were advised or counseled by the Breastfeeding Support Group volunteers, Community Health Workers, or Breastfeeding Counselors. These data also were not collected in the follow-up survey. Although, a total of 303 referrals were made to the Breastfeeding Counseling Corners of women with breastfeeding difficulties, it is not known how many of those cases were repeat referrals. Since no records were kept on how many total lactating women were assessed by the Community Health Workers in the primary intervention villages, it is not known what proportion of the women were referred to the Breastfeeding Counseling Corner versus what proportion of them sought that service independently.

## **Recommendations**

1. Sufficient technical support should be provided to future infant and young child feeding project implementers on methods to develop the appropriate promotion messages and the design of their project quality and coverage monitoring system.
2. Formative studies should be done to develop targeted infant and young child feeding messages for pregnant or lactating women versus the women’s mothers-in-law versus husbands if the Baby Friendly Village Project is replicated in other areas.
  - Based on experience with the Baby Friendly Village Project, Care for Afghan Families staff in Kabul indicated that “beneficiaries will more easily understand very simple facts rather than complicated procedures.”
3. Consider implementing qualitative studies in a few villages where this project was recently implemented to understand how to better engage and support the village Breastfeeding Support Groups in the future and to determine how most female versus male villagers learned and would prefer to receive health promotion messages. This information could guide continuation or scaling up of the Baby Friendly Village Project approach by focusing on the most wanted channel for health communication.
4. Verify if the pictorial guides on infant and young child feeding education/promotion developed by the Ministry of Public Health had been adequately tested among illiterate groups. If the above qualitative study is carried out in the near future in the Baby Friendly Village Project communities, the utility of the pictorial guide also should be assessed for future use.
5. Determine the average time needed for individual counseling on infant and young child feeding at the Breastfeeding Counseling Corner. Based on that information and average daily caseloads at the Breastfeeding Counseling Corner, it can be assessed if the Breastfeeding Counselor can adequately meet the needs of her daily client caseload over time. If not, appropriate steps must be taken to ensure additional adequate time for effective counseling.



6. If possible, develop a simple data collection tool (based on the Community Health Workers required health service reporting tool) that could be used by Breastfeeding Support Group volunteers to keep track of the number of villagers they engage for infant and young child feeding promotion.
7. Implement a simple on-going data collection system to track individual patient caseloads in the Breastfeeding Counseling Corners, including types of visits for each patient (e.g., initial versus follow-up; preventive counseling versus addressing feeding difficulties, etc.)
8. Given the increasing coverage of mobile phones, even in rural areas of Afghanistan, consider options to utilize this technology to help coordinate activities with the local communities, to monitor the activities and needs of village Community Health Workers and volunteers, and to collect data on changes in population attitudes and practices related to infant and young child feeding.
9. In continuation, given the relatively high coverage of mobile phones, consider options to utilize this technology to systematically and periodically track the coverage of the Baby Friendly Village Project interventions at the community level.

### ***V-3 Assessing Project Impact***

As indicated above, “baseline” and “end-of-project” Lot Quality Assurance Sampling surveys were carried out to assess the impact of the Baby Friendly Village Project on infant and young child feeding attitudes and practices among pregnant and lactating women, mothers-in-law, and husbands in the project areas in Takhar Province as well as in Badakhshan and Kunduz Provinces. The surveys were intended to report province-specific and overall statistics but did not include sufficient sample sizes for this purpose.

To statistically detect a 10% increase in timely initiation of breastfeeding, i.e. an increase from 60% – 70%, and assuming a 100% subject participation (response rate) and no design effect due to the use of cluster survey methodology, a minimum sample size of about 360 subjects would be needed for the initial and the follow-up surveys. As shown in Table 2, survey samples were much too small to statistically detect changes in infant and young child feeding practices among the project populations in each province. However, the total sample size in each respondent category could detect (with statistical significance) an absolute difference of 17% or greater in the proportion of various infant and young child feeding indicators across all three intervention provinces combined.

Another issue that should have been considered is whether the intervention period was sufficient to achieve close to a 20% absolute change in the prevalence of infant and young child feeding indicators.

It also is important to note that both the primary intervention villages as well as the secondary villages (see Figure 2) were included in the Lot Quality Assurance Sampling survey “supervisory areas” for the baseline and end-of-project surveys. Thus, the actual survey samples from the Baby Friendly Village Project villages were even smaller than shown in Table 2. Therefore, the baseline and follow-up survey data were not representative of the primary intervention communities.

Furthermore, the design of the survey questionnaire also determined the quality and validity of the collected data. To elicit accurate and precise responses related to infant and young child feeding attitudes and practices required that the questions be written and asked using a vocabulary level that could be understood by the majority of the interviewees. In addition, the order of the questions asked and potential “skip patterns” in the questionnaire could substantially influence the interviewees’ responses; these must be carefully considered. All questionnaires must be adequately piloted and revised so as to enable the collection of accurate and reproducible data.

Another important concept that must be considered is that the composition of commonly spoken Dari usually is very different from the written one. Thus, questions posed to illiterate or less educated interviewees in the style and vocabulary level in the written questionnaires developed by Care for Afghan Families may not have been readily understood by the interviewees (the questionnaires were not tested in the community prior to the surveys). Thus, it is highly likely that each interviewer adapted the written questions in his or her own style so as to enable the interviewees to comprehend and respond. This could have contributed to differences, or biases, in the responses elicited based on how the same questions were asked by different interviewers and of different interviewees. Therefore, the quality of the survey data collected could be less than accurate.

Combining this potential inconsistency in the way questions were asked with the very small sample sizes of the surveys in Takhar Province may have created even larger variations in the findings. Finally, the survey data were not “cleaned” before analysis. Thus, potential errors and discrepancies that may have occurred when surveyors completed the questionnaires or when the data were entered in the database contributed to the questionable quality of the baseline and follow-up survey findings.

Based on the review of a very limited set of analyses of the project findings, there were dramatic changes in some of the indicators that had been analyzed. However, given these key limitations of the baseline and follow-up surveys, the findings cannot be readily interpreted.

## **Recommendations**

1. Technical support should be provided in the design of appropriate baseline and follow-up impact surveys in the future to address sample size; questionnaire design and format; data entry and cleaning; and data analysis, interpretation and reporting.
2. It may be better to design and implement a simple intervention “monitoring and surveillance” system to track the quality, coverage, and impact of the intervention over a period of time before a more detailed impact evaluation survey is implemented. This especially is recommended when an innovation such as this is being field-tested.
  - a. Simple tools for illiterate village health workers and volunteers would need to be developed. Alternatively, the use of mobile phones should be explored to allow for the collection of data by literate data collectors from a distance. This may help overcome some of the security related issues for “outsiders” visiting the villages, as well as reduce the cost and time of transport to remote and difficult to reach communities.

- b. Periodically track a few infant and young child feeding attitudes and practices (especially timely breastfeeding initiation and exclusive breastfeeding) among the clients of the Basic Package of Health Services facilities, instead of having to rely on special surveys.
3. It is important to thoroughly pretest the data collection instruments and questions before full-scale implementation.
4. The “standard” infant and young child feeding survey questions that have been published by international expert groups<sup>23</sup> should be adapted and used in future surveys. For example, in these internationally recognized surveys a series of questions are used to assess exclusive breastfeeding among infants <6 months old, and those questions are to be asked of mothers or caregivers of infants of a particular age range.

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<sup>23</sup> United States Agency for International Development (USAID). 2009. *Desk Review of Child Survival Qualitative Researches in Afghanistan and Proposed Steps for Follow-Up Research: BASICS*. Washington, D.C.: USAID. [http://www.basics.org/reports/Desk-Review-of-Qualitative-Research-for-Child-Health\\_Afghanistan.pdf](http://www.basics.org/reports/Desk-Review-of-Qualitative-Research-for-Child-Health_Afghanistan.pdf). AND

World Health Organization. Conclusions of a Consensus Meeting on Indicators for Assessing Infant and Young Child Feeding Practices. November 6-8, 2007 in Washington D.C., USA.