

*Nutrition Section
UNICEF New York
June 2009*

Infant and Young Child Feeding Programme Review

Case Study: Sri Lanka



unite for
children

unicef 

Table of Contents

Acknowledgments	3
Acronyms and abbreviations	4
Executive summary	5
1. Introduction	6
2. Country profile	6
2.1 Demographic, health and nutrition indicator.....	7
2.2 Trends in breastfeeding rates.....	8
3. Key findings.....	8
3.1 Challenges identified	8
3.2 Program coordination and mobilization of partners	9
3.3 IYCF policies and plans	10
3.4 Key program components	11
3.5 Integration strategies and cross-cutting issues	21
3.6 Human rights-based approach to programming and gender mainstreaming	23
3.7 UNICEF's role and resources	23
4. Discussion	24
4.1 Factors contributing to results	24
4.2 Lessons learned	25
4.3 Remaining challenges	26
5. Recommendations	27
Annexes:	29
1. Documents reviewed	31
2. Key informants	

Acknowledgments

This case study is part of a review of infant feeding programmes which was conducted as a joint effort between UNICEF's Nutrition Section and the Academy for Educational Development (AED), in order to understand the factors that influenced breastfeeding programme outcomes, distil general lessons learned from the experience of these countries and make recommendations for programming on infant and young child feeding. The review included detailed individual case studies from six countries, as well as a consolidated report which draws upon these case studies. The six countries are Bangladesh, Sri Lanka, Uganda, Benin, the Philippines and Uzbekistan, chosen to represent a range of regions and diverse scenarios in terms of breastfeeding programming efforts and outcomes.

On the part of AED, the review was led by Luann Martin, who also visited Sri Lanka and prepared this case study report.

In Sri Lanka, S.M. Moazzem Hossain, Chief of Health and Nutrition for UNICEF, and Renuka Jayatissa, UNICEF/Sri Lanka Nutrition Specialist, offered valuable guidance and assistance in arranging the interviews and stakeholder workshop. S.M. Ariyarante, Chief of UNICEF's office in the Southern Province, provided an excellent orientation to UNICEF's and the MOH's work in that region. Chayitri Senanayke of the UNICEF/Sri Lanka Office served as a most helpful guide, translator, and rapporteur. Interviewees at UNICEF, WHO, government agencies, and health facilities in Colombo and Hambantota, as well as those who had retired from government service, were generous in sharing their experiences and suggestions. And finally, all the respondents above, and other stakeholders gave useful suggestions for future programming during a working session on the final day of the visit.

The Nutrition Section at UNICEF headquarters – Nune Mangasaryan, Christiane Rudert, Mandana Arabi, David Clark and Julia Krasevec, provided technical inputs and oversight during the review process, as well as during the preparation and finalization of the country case study reports.

Funding for the case studies was provided by UNICEF, USAID through the Africa's Health in 2010 Project, and AED.

Acronyms and abbreviations

BCC	behavior change communication
BFHI	Baby-friendly Hospital Initiative
DHS	Demographic and Health Survey
ECD	early childhood development
HRBAP	human rights-based programming
IBFAN	International Baby Food Action Network
IEC	information, education, communication
IMCI	integrated management of childhood illness
IYCF	infant and young child feeding
MNH	maternal and neonatal health
MOH	Ministry of Health
NGO	non-governmental organization
PHM	public health midwife
PNIP	Participatory Nutrition Improvement Program
PMTCT	prevention of mother-to-child transmission (of HIV)
TOT	training of trainers
UNICEF	United Nations Children's Fund
WHO	World Health Organization
WFP	World Food Program

Executive summary

This case study is one of six in a review of the contributions of UNICEF and its partners to infant and young child feeding (IYCF). The Sri Lanka case study involved a review of relevant documents, a field visit in August 2008, interviews with 16 key informants, a stakeholder workshop, and analysis of the information.

Preliminary findings from the national 2006/07 Demographic and Health Survey indicate that the exclusive breastfeeding rate among infants under 6 months is 76 percent. At the time of the first DHS in 1987, the exclusive breastfeeding rate among children less than six months old was only 10 percent. In the next six years the rate increased to 17 percent and then jumped to 53 percent in 2000. Factors contributing to Sri Lanka's success in improving breastfeeding practices include a well-developed health system, strong breastfeeding advocates and dedicated professionals, supportive policies, multiple contacts of public health midwives with pregnant and postpartum women, use of a variety of communication channels, and extensive lactation management training for nearly all health workers in the field and in major hospitals.

Sri Lanka was one of the first countries, globally, to develop supportive policies, including maternity protection legislation and a code of marketing of breastmilk substitutes prior to the formulation of the International Code. One international recommendation that the health community was slow to adopt was the extension of the duration of exclusive breastfeeding from 4 to 6 months. This became official policy in 2006, but resistance remains among some pediatricians. The Baby-friendly Hospital Initiative was launched in Sri Lanka in 1992 with great political support and attention but lacked adequate training and external assessment. Based on their own assessment, about 84 government hospitals (14 percent of total) are certified as baby-friendly, although the criteria are not strictly adhered to. One-half of all births are estimated to take place in these facilities. In the 1990s Sri Lanka invested heavily in lactation management training.

Public health midwives provide the link between the community and health services. Compared to some countries, nongovernmental and community organizations have played a modest role in breastfeeding promotion in Sri Lanka. Maternal and child health, multi-sectoral nutrition, and early childhood development programs have been the major vehicles for IYCF promotion in the past 10 years. At times either the Ministry of Plan Implementation or the Ministry of Health had primary responsibility for IYCF. At present the Family Health Bureau of the Ministry of Health oversees IYCF activities.

The devastating tsunami in December 2004 found Sri Lanka without guidelines for infant feeding in emergencies. During the 18 days following the tsunami when the guidelines were under development, the mass media issued appeals for infant formula. Initially, formula and feeding bottles were distributed without controls to protect breastfeeding, particularly in the eastern border areas, until the guidelines were issued.

Despite the impressive achievements in IYCF practices in Sri Lanka, there is "unfinished business" to attend to. Work began in 2005 on the development of a national IYCF strategy, which has not yet been finalized. Program gaps identified during the review include inadequate staffing of the Family Health Bureau, fragmentation of nutrition among directorates, overstretched public health midwives, low level of behavior change communication skills among service providers, limited use of community resources to support breastfeeding, and insufficient monitoring of Code compliance and the Baby-friendly Hospital Initiative.

The review sets forth a number of recommendations, including the formation of a national IYCF coordinating body with a multi-disciplinary team of experts; development of a plan of action with a clear vision for achieving scale through the health system, community, and communication actions; revitalization of a monitoring committee for Code implementation; and full institutionalization, expansion and independent monitoring of the Baby-friendly Hospital Initiative. Incorporation of the BFHI criteria in standard hospital operating procedures and accreditation systems will help build sustainability. Advocacy at various levels, engagement of new partners, and cultivation and training of a new generation of breastfeeding champions are also prerequisites for sustainability. Community-based breastfeeding promotion and support can be expanded through recruitment of more public health midwives, engagement of community resource persons such as lay counselors, strengthening social support networks for breastfeeding women, and development of an evidence-based communications strategy for IYCF.

1. Introduction

This case study is one in a series of six in a review of the contributions of UNICEF and its partners to infant and young child feeding (IYCF) over the past few years, with the primary focus on breastfeeding. The other countries studied include Bangladesh, Benin, the Philippines, Uganda, and Uzbekistan.

The aim of the IYCF review, commissioned by UNICEF, was to: 1) better understand the contextual and programmatic factors that led to changes in feeding practices in selected countries, 2) assess the contributions by different actors, 3) document a series of innovations, good practices, and lessons learned to improve future programming, and 4) identify ways of overcoming challenges to improved practices. The review in Sri Lanka begins in the 1980s with restrictions on the marketing of breastmilk substitutes, but most of the paper focuses on the past 10-15 years.

The development of the case study for Sri Lanka involved a review of relevant documents, a visit to Colombo and Hambantota between August 11 –15, 2008, and analysis of the information and data obtained during the visit. (See documents reviewed in Annex 1). The field work included semi-structured interviews of 16 key informants, involving staff from UNICEF, World Health Organization (WHO), Family Health Bureau, and three health facilities as well as retired individuals who had played a leading role in breastfeeding promotion. Two interviews were conducted by phone.

In addition, a 3½ hour stakeholder workshop was held the final day of the visit with 22 participants representing the above organizations as well as the Nutrition Coordination Division, Health Education Bureau, Medical Research Institute, University of Sri Jayewardenepura, College of Pediatricians, and Sarvodaya Women’s Movement. Participants commented on findings from the review on IYCF policies and legislation, breastfeeding advocacy, the Baby-friendly Hospital Initiative (BFHI), pre-service and in-service training, and community-based activities.

2. Country profile

2.1 Demographic, health and nutrition indicators

Sri Lanka is a lower middle-income country with a well-established and extensive health service delivery network developed more than four decades ago. Approximately 99 percent of women receive antenatal care and 98 percent deliver in a health facility. Under-five, infant, and maternal mortality rates have dropped significantly. Neonatal mortality now accounts for nearly 84 percent of all infant deaths.

Underweight rates have been decreasing (from 29 percent in

2000 to 22 percent in the 2006/07 preliminary Demographic and Health Survey (DHS) data). Stunting rates, however, show little improvement with rates of 14 percent in 2000 and 18 percent in 2006/07 (preliminary DHS data). Undernutrition rates are higher in rural areas, isolated villages, and among the tea-growing estate sector in the highlands of Sri Lanka than the national figures would suggest. For example, the prevalence of stunting in Colombo is 8 percent compared to 41 percent in the Nuwara-Eliya district.

At the 2008 launch of National Nutrition Month, UNICEF country representative Phillippe Duamelle said, “For a country that suffers no significant food shortages and provides extensive free maternal and child health services, it is paradoxical that undernutrition affects such a large proportion of the population.”

Indicator	2007
Total population (millions) ^a	19.3
Urban population (%) ^a	15
Under-5 mortality rate ^b	21
Infant mortality rate ^b	15
Neonatal mortality rate ^b	10
Low birthweight (%) ^b	17
Moderate and severe stunting (%) ^b	18
Moderate and severe wasting (%) ^b	15
Moderate and severe underweight (%) ^b	22
Antenatal coverage (%) ^b	99
Institutional deliveries (%) ^b	98
Living below US\$1.25 per day (%) ^a	14
Sources: ^a State of the World’s Children 2009 ^b Sri Lanka DHS 2006/07 preliminary findings	

At the launch, the Minister of Healthcare and Nutrition, Hon. Nimal Siripala de Silva, remarked, “The Government of Sri Lanka has placed undernutrition at the forefront of its health priorities, and UNICEF is backing this effort to the hilt. We know that a minimum package of high-impact and cost-effective interventions can be integrated into the lifestyles of women and children to ensure that good nutrition practices are sustained.” Both the *Lancet Child Survival* and the *Nutrition Series* identify breastfeeding counseling and promotion of appropriate complementary feeding as part of this minimum package. Professor Zulfiqar Bhutta, one of the series’ authors and the keynote speaker at the Nutrition Month ceremony in Sri Lanka, said that a public health campaign targeting exclusive breastfeeding for six months would help Sri Lanka achieve its nutrition goals.

Improvement of breastfeeding, complementary feeding, and hygiene practices and the delivery of timely and appropriate health care can all contribute to the reduction of undernutrition in Sri Lanka. This IYCF program review will identify the challenges encountered during the past two decades in improving IYCF practices, the policies and programs enacted to address these challenges, and the results that have been achieved. The review will also identify remaining gaps and recommend actions to move the IYCF agenda forward and contribute to the achievement of Sri Lanka’s Millennium Development Goals.

2.2 Trends in breastfeeding rates

Preliminary findings from the national¹ 2006/07 Demographic and Health Survey (DHS) indicate that the exclusive breastfeeding rate among infants under 6 months, as measured by 24-hour recall, is 76 percent. At the time of the first DHS in 1987, the exclusive breastfeeding rate for 0-5 months was only 10 percent. In the next six years the rate increased to 17 percent and then jumped to 53 percent in 2000 as shown in figure 1. Figures 2 and 3 illustrate the 20-year shift from early introduction of water, other liquids, and milk/infant formula to longer durations of exclusive breastfeeding. The challenge is to continue this upward trend, and increase exclusive breastfeeding among infants 4-5 months old. Today approximately 53 percent of infants in this age group are exclusively breastfed. In 2000 only 8 percent of 4-5 month olds were exclusively breastfed, which is not surprising since the recommendation at the time was for exclusive breastfeeding from 4-6 months. Another challenge is to maintain the extended duration of breastfeeding. The majority of women (83 percent) continue to breastfeed until their children are at least two years of age.

The preliminary report of the 2006/07 DHS does not present data on the timing of breastfeeding initiation, colostrum feeding, bottlefeeding, or types of complementary foods or feeding frequency. The 2000 DHS reported that colostrum feeding rose from 55 percent in 1993 to 77 percent in 2000 and that bottle-feeding among infants under 3 months declined during that period from 42 percent to 12 percent. Around 2006/07 UNICEF funded a knowledge, attitudes, and practices survey and an anthropological study on the determinants of child undernutrition. When released, the findings will offer insights on food beliefs and practices and the reasons for early or delayed initiation of complementary feeding. The information, analyzed for rural and urban areas and the estate sector, will be beneficial for tailoring messages and strategies for different populations. One of the preliminary findings shows that initiation of breastfeeding within the first hour of birth is now the norm with rates above 90 percent in urban, rural, and estate areas.

It should be noted that the Northern Province was excluded in the 2006/07 survey.

Figure 1

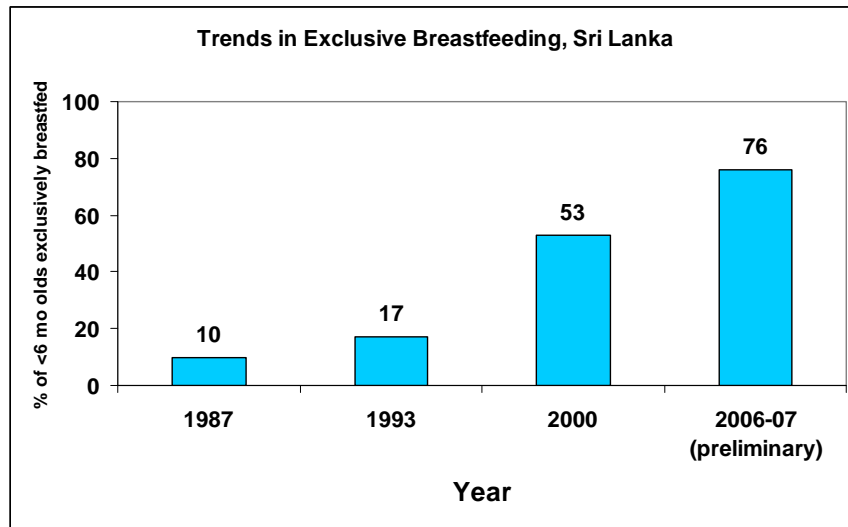


Figure 2.

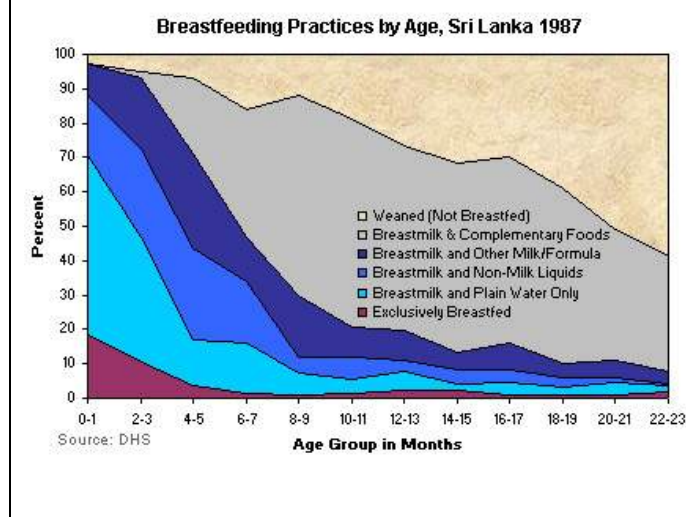
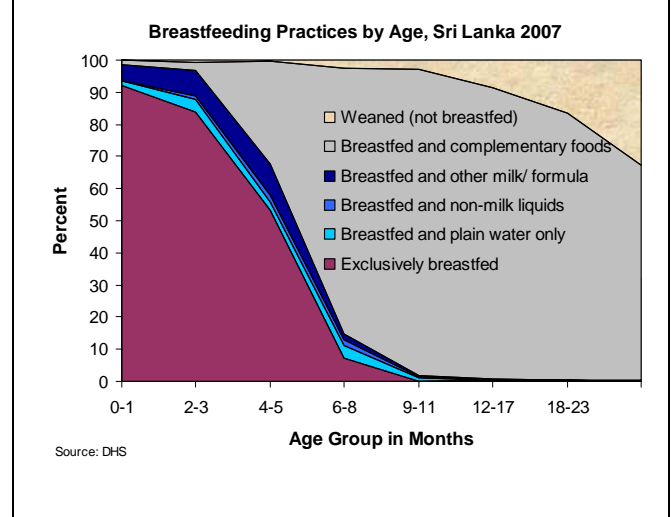


Figure 3.



Comparing survey results in Sri Lanka is challenging because of inconsistencies in survey questions, data presentation, age groupings, and survey areas. Many surveys lack data on the North and East. UNICEF’s 2004 Annual Report noted the challenge of monitoring, evaluating, and sharing information due to “the lack of representative and credible data on basic indicators related to the situation of children and women” and cited “the absence of respective nationwide surveys and a weak and unreliable government routine reporting system.” UNICEF has begun to address this problem by conducting baseline surveys on key child health, nutrition, education, and protection indicators in its focus districts

3. Key findings of the review

3.1 Challenges identified

To improve IYCF practices, program managers and breastfeeding advocates recognized that a number of problems needed to be addressed, including:

- Traditional practices that interfered with good feeding practices such as giving infants coriander water and discarding colostrum
- Complaints by mothers of insufficient breastmilk and perceptions that if a baby cried, the mother did not have enough breastmilk
- Problems with attachment and positioning
- Widespread availability of infant formula and promotion of its use, including by grandmothers
- Bottle feeding of young infants
- Limited lactation management skills among health providers as well as inadequate monitoring and supervision
- Hospital practices not conducive to the establishment of good breastfeeding practices
- Unsupportive workplace environments for breastfeeding women

In response to the problem, partners were mobilized and policies put in place.

3.2 Program coordination and mobilization of partners

The Global Strategy for Infant and Young Child Feeding recognizes the need for a wide range of actions and actors to achieve substantial impact. One person interviewed said that the number of partners engaged in breastfeeding promotion and support in Sri Lanka was insufficient given the importance of IYCF.

Government of Sri Lanka

In 1998 the Government housed nutrition in the Ministry of Plan Implementation and Parliamentary Affairs (MPI&PA) under the Prime Minister and formed a high-level National Nutrition Coordination Committee that combined health, agriculture, fisheries, and livestock. This structure signaled that nutrition was not the responsibility of a single ministry but required a national integrated effort. However, in 2005 nutrition was moved to the Ministry of Health. The debate continues regarding the appropriate home for nutrition, with some advocating for coordination by a higher body that links all ministries relevant to nutrition and others preferring to have the MOH take the lead.

At present, the Family Health Bureau is the central organization of the MOH responsible for planning, coordinating, monitoring, and evaluating maternal and child health (MCH) and family planning services. The Newborn Care Unit is responsible for implementation of the Baby-friendly Hospital Initiative. The Child Health Unit focuses on children one month to five years of age, coordination of activities related to the Sri Lanka Code of Marketing of Breastmilk Substitutes, appropriate IYCF practices, early child care, and growth monitoring and promotion.

The Ministry of Health is supported by a team of public health personnel comprising medical officers of health, public health nursing sisters, public health inspectors, supervising public health midwives, and public health midwives (PHMs). The public health midwives are the “front line” health workers who cover a population ranging from 2,000 to 5,000, although often their territory is much larger. In 2004 the MOH undertook recruitment and training of 500 new PHMs. The duties of the PHMs include:

- Home visits (domiciliary care) to pregnant and postpartum women and infants and young children
- Education and counseling on health and family planning
- Distribution of contraceptives and follow-up of contraceptive users
- Assistance to the Medical Officer of Health on clinic days

Health professional bodies and research institutes

The Sri Lanka College of Pediatricians and individual members have been influential in developing supportive IYCF policies and inspiring medical students to promote, protect, and support breastfeeding. The Medical Research Institute has conducted IYCF-related surveys and participated in discussions of policies and guidelines.

Non-governmental organizations

Many of those interviewed said that NGOs have played a minor role in nutrition and IYCF. No interviews were arranged for this author with NGO representatives. A 2007 review of maternal and newborn health services found that the opportunities for partnership with NGOs were not seized because government health providers thought the NGOs lacked skills and expertise. Moreover, an interest in and a framework for collaboration were absent at provincial and district levels. WHO is presently supporting the Nutrition Division of the MOH to strengthen the National Nutrition Alliance, a consortium of 26 NGOs working on food security and nutrition projects. In 2008 WHO provided funds to orient NGO staff in the Essential Nutrition Actions, which includes breastfeeding, complementary feeding, maternal nutrition, micronutrient supplementation, and behavior change communication (BCC). The Essential Nutrition Actions will be an ongoing focus area of the Alliance.

Two NGOs have been particularly supportive of breastfeeding.

- *Sarvodaya* is a Sri Lankan organization involved in women's empowerment, community development, and micro-credit. The Sarvodaya network covers 15,000 villages. Sarvodaya is the representative of the International Baby Food Action Network (IBFAN) in Sri Lanka and plays an active role during World Breastfeeding Week. Community-based breastfeeding activities include mothers and fathers support groups.
- *Plan Sri Lanka* is a community development organization that has supported district training in lactation management and complementary feeding and the printing of educational materials in the Southern Province.

International organizations

- *UNICEF's* assistance includes technical assistance and support for program implementation, described later in this paper.
- *The World Health Organization* provides technical input; contributes to development of health policy, strategies, and plans; and funds some training courses. With the appointment two years ago of a National Professional Officer who had spent a decade coordinating the government's IYCF activities, WHO's country office now has high-level expertise in IYCF that was lacking in the past.
- *The World Food Program* provides funds to NGOs for nutrition education and community mobilization and distributes Thriposha, a supplementary food made of maize and soya beans that is produced in Sri Lanka and given to pregnant women and children 6-59 months old who exhibit growth faltering during three consecutive weighings.² Thriposha is given as a supplement to the usual complementary food to boost weight gain in children with growth problems.
- *The World Bank* has supported a few training activities, production of materials, and lactation management centers.

Bilateral organizations that have indirectly supported breastfeeding activities include AusAid and Sida through their funding of materials for the Early Childhood Development Program.

3.3 IYCF policies and plans

Policy development is a lengthy process in Sri Lanka. UNICEF Sri Lanka found that gaining national-level consensus on key issues and messages was a pre-requisite for community-based nutrition interventions at sub-national levels (UNICEF 1999 annual report). Policies must be approved by the Cabinet. Guidelines can be issued in a circular by the Ministry of Health and usually signed by the Director General of Health Services, but they do not carry as much weight as policies. Many years have been spent by breastfeeding advocates trying to develop sound policies and guidelines. Efforts related to some of the major IYCF policies and guidelines in the past several years are highlighted below.

Exclusive breastfeeding. A nationwide campaign between 1996 and 1999 promoted exclusive breastfeeding for 4-6 months. Sri Lanka was an early adopter of many international IYCF recommendations but was slow to

² Weight for age is below -2 Standard Deviations using the new Child Health Development Record or in the 3rd centile using the old Child Health Development Record.

endorse the 2002 WHO recommendation that extended the duration of exclusive breastfeeding to 6 months, especially since it had at one time promoted 6 months of exclusive breastfeeding until the international recommendation changed to 4-6 months. The new recommendation of 6 months caused confusion and met with resistance. With firm and sustained engagement of the government, the 6 month recommendation with continued breastfeeding to two years and beyond became official policy in 2006. Some pediatricians remain unconvinced and continue to recommend 4-6 months of exclusive breastfeeding.

Early Childhood Care and Development policy. In 2004 Parliament approved the UNICEF-supported policy on integrated early childhood development. The policy, adopted before 6 months became official policy, recommends 4-6 months of exclusive breastfeeding and sustained breastfeeding up to two years. The integrated approach promotes health, nutrition, psychosocial stimulation, safe water, and hygiene and sanitation services. The policy identifies breastfeeding and complementary feeding as key care practices.

Guidelines on Infant and Young Child Feeding. The guidelines, issued by the Director General of Health Services through a circular in October 2007, recommend 6 months of exclusive breastfeeding and focus on different aspects of complementary feeding (frequency, quantity, quality, consistency, safety, responsive feeding, and feeding during and after illness). The document was developed through a series of workshops with experts from the Family Health Bureau, Health Education Bureau, Medical Research Institute, Nutrition Coordination Division, Sri Lanka College of Pediatricians, Nutrition Society of Sri Lanka, and UNICEF with a review by IYCF experts from WHO/Geneva. The purpose of the guidelines is to ensure “appropriate, correct, and uniform messages.” Orientation workshops on the guidelines were held for medical officers of health.

National IYCF strategy. In 2005 work began on the development of a national IYCF strategy. The Global Strategy for Infant and Young Child Feeding served as a guidepost. In the view of one person who has been instrumental in IYCF programming, “The Global Strategy is a useful framework, but implementation at the country level is not easy. The detailed implementation plan developed by WHO is less relevant for a place like Sri Lanka that has a strong health system.” The strategy has not yet been finalized. Some people believe that a separate strategy is unnecessary and that energy should be spent on the development of a plan of action. They argue that the IYCF guidelines can be incorporated in the National Nutrition Policy, which is in final draft after nearly six years of development.

Protocol on managing nutritional problems. In January 2008 the Director General of Health Services sent a general circular letter to healthcare personnel with a *Protocol on Managing Nutritional Problems among under five children in the community*. The protocol was developed through a series of workshops with experts and representatives from the College of Pediatricians to strengthen growth monitoring and promotion.

3.4 Key program components

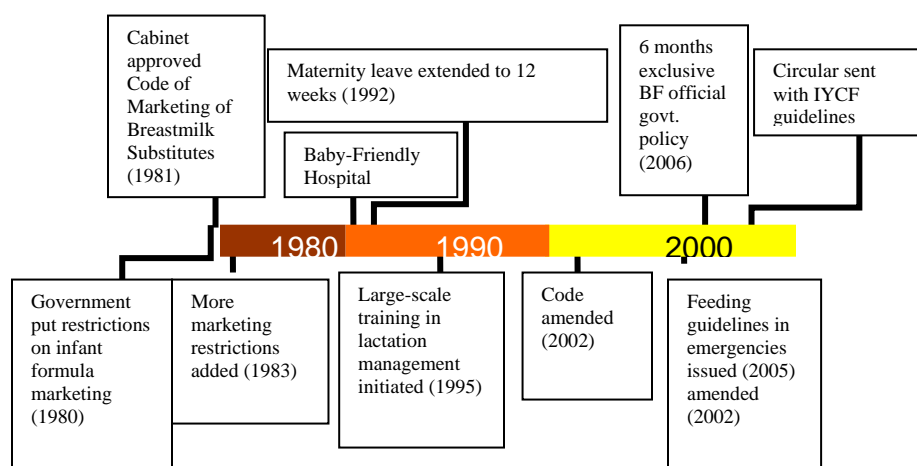
Although Sri Lanka does not have a national IYCF strategy or program, many components of the WHO/UNICEF Global Strategy for Infant and Young Child Feeding are in place. This section will look at each of these components.

Before doing so, mention should be made of several individuals who played a major role in the protection and promotion of breastfeeding. For several decades Dr. Priyani Soysa was a driving force behind breastfeeding promotion. A professor of pediatrics at the University of Colombo, Dr. Soysa served as the Chairperson of the ACC/SCN Consultative Group on Maternal and Young Child Nutrition, the principal investigator for several studies on breastfeeding, and a representative at the 1979 international meeting which gave birth to an International Code of Marketing of Breastmilk Substitutes. Dr. Hiranthi Wijemanne, a public health specialist with UNICEF from 1977-2003, was another strong breastfeeding advocate. Other key actors included Drs. Malini de Silva and Vineetha Karunaratne, former Directors of MCH; Drs. Sybil Wijesinghe and Anoma Jayathilaka, former Consultant Community Physicians for the Family Health Bureau in charge of the breastfeeding program; and medical officers of MCH in the Districts.

Timeline

The early 1980s were a period of heightened activity associated with the formulation of a Code of Marketing. The early 1990s were another period of intensive activities with the formation of a task force to promote breastfeeding, amendment of the Code, and launch of the Baby-friendly Hospital Initiative. Extensive training programs for health care providers in lactation management began in 1995. The 2000s can be characterized as a time of updating policies and guidelines.

Timeline of Achievements



Code of Marketing of Breastmilk Substitutes

In the 1970s infant formula was heavily subsidized by the government and widely available. A survey conducted in 1980 found 21 brands in Colombo shops. Sixty percent of mothers reported that they were aware of advertising of breastmilk substitutes. A study by Professor Soysa showed that women who knew of this advertising were more likely to use commercial formula and less likely to breastfeed. This situation prompted Sri Lanka to take action to regulate the marketing of breastmilk substitutes at a time when there was no international code. By November 1980 “the criticism of advertising had reached a point where government action forced a ban of media promotion of infant formulas in Sri Lanka” (Acta, 1984). The Sri Lanka Code for the Promotion of Breastfeeding and Marketing of Breast Milk Substitutes and Related Products (hereafter referred to as the Code) was developed in 1981. (Box 1 highlights milestones in the development and modification of the Code).

Box 1. Code History in Sri Lanka

1979: Consumer Protection Act stipulated that all ads for infant formula carry a similar message to promote breastfeeding.

1980: Government banned visual ads of infant formula to curb trend towards increased bottle feeding.

1981: Technical committee of experts developed the Sri Lanka Code for the Promotion of Breastfeeding and Marketing of BreastMilk Substitutes and Related Products. The President and the Minister of Plan Implementation submitted the draft Code legislation, and the Cabinet of Ministers approved it.

1983: Additional provisions related to marketing and advertisement of breastmilk substitutes added to the Consumer Protection Act.

1993: Agreement signed by the Ministry of Health and manufacturers or distributors of infant formula to end the distribution of free and low-cost supplies of infant formula, feeding bottles, and teats to health facilities and staff.

1999-2001: A 21-member technical committee was appointed to review the Code, close the loopholes, and

update the Code to reflect new technical guidelines. Numerous committee meetings were held over a three-year period with participation at times of infant food producers and relevant professional organizations. Reaching consensus among the experts proved challenging.

2002: The Cabinet of Ministers approved the amended Code after much deliberation. The Code was translated into Sinhala and Tamil.

Source: Nutrition Coordination Division, 2004

When the Code was adopted in 1981, the task of monitoring its implementation was assigned to the Food and Nutrition Policy Planning Division of the Ministry of Plan Implementation. When the National Nutrition Coordination Division moved from the Ministry of Plan Implementation to the Ministry of Health, Code monitoring became the responsibility of the Family Health Bureau. At that time no training was provided to Bureau staff in Code monitoring. More recently two people from the Family Health Bureau attended IBFAN's training on Code monitoring in Malaysia.

Finding an effective mechanism for Code monitoring has been an ongoing challenge. In a letter to the *British Medical Journal* in 1999, Terence Perera, former Senior Public Health Administrator of Family Health for the WHO South East Asia Region, wrote:

“Advertisements for formula milk not in keeping with the spirit and principles of the code continue to appear—even in some of the medical journals in Sri Lanka. As one of the respondents to the national questionnaire survey on breast feeding referred to in the letter, I made the point then (in 1996), and I make it now, that the national surveillance and monitoring mechanism to ensure compliance with the national code is ineffective. Without an effective mechanism for monitoring and proper implementation of the code, the power of advertising of breastmilk substitutes, rather than scientific knowledge about breast feeding, will influence healthcare professionals' attitudes to the promotion and protection of breast feeding.”³

A Code Monitoring Committee was set up in 2002. It does not play an active role at the moment.

Maternity Legislation

Women represent a sizable portion of the labor force in Sri Lanka. In 2006 the labor force participation rate for women 30-39 years old was 48 percent (UNDAP, 2007). In the tea and rubber industry of the plantation (estate) sector, more than 50 percent of the employees are women.

Professor Priyani Soysa was a strong advocate for maternity benefits to support breastfeeding women. She used scientific evidence of the benefits of breastfeeding, findings from her research studies, and persuasive skills to argue for supportive maternity legislation. In 1992 maternity leave⁴ was extended from six weeks to 84 working days. This law remains in force and includes the following provisions:

- Government service provides full pay for the first 84 *working* days followed by an optional half pay for the next 84 days (inclusive of weekends and other public holidays) and then no pay for 84 days (inclusive of weekends and other public holidays) (Public Administration Circular 4, February 3, 2005). The 2002 amendment to the law stipulated that the full benefits applied to the first two living children. For the third child, leave was limited to 42 days. These changes were intended to bolster Sri Lanka's population policy. The law was amended again in 2006, allowing full benefits, regardless of the number of children. During pregnancy, from the 5th month onwards, the worker can report to work 30 minutes late and leave the workplace half an hour early. After childbirth, if the mother returns to

³www.pubmedcentral.nih.gov/articlerender.fcgi?artid=1115532#B1

⁴In 1980 Sri Lanka's maternity protection law allowed two weeks of antenatal leave, four weeks of postnatal leave (or six weeks of postnatal leave without antenatal leave), full salary, and job protection during leave. The law required crèches at workplaces with 15 or more employees and two half-hour nursing breaks at the workplace, or two one-hour breaks if no crèches were available (Acta, 1984).

work before completion of six months of maternity leave, she can take nursing breaks until the baby reaches six months of age and can leave the workplace an hour early.

- Private sector employees are covered by the Maternity Benefits Ordinance and the Shop and Office Act. Under the Maternity Benefits Ordinance, factory workers and estate workers are granted 84 days (including weekends and other public holidays) of paid maternity leave (6/7th of the salary) for the first two children and 42 days fully paid leave for subsequent births. The employer pays for this period of leave. Breastfeeding women can take paid nursing breaks (60 minutes every 9 hours for 12 months if a crèche or suitable place is provided by the employer). If these facilities are not available, she can take paid nursing breaks (120 minutes) every 9 hours for 12 months. Workers covered under the Shop and Office Act can take 84 days (including weekends and other public holidays) of fully paid maternity leave for the first two children and 42 days fully paid leave for subsequent births. Nursing breaks are not included in this act.
- Informal sector employees are not granted maternity leave or nursing breaks through any ordinance or act.

With the various changes, it is not surprising that those interviewed did not give consistent responses on the benefits provided under the current law. Those who have been involved in maternity protection legislation would like to extend maternity leave to 6 months in keeping with the recommendation for 6 months of exclusive breastfeeding. They also propose 2 weeks of paternity leave.

Baby-Friendly Hospital Initiative (BFHI)

Approximately 98 percent of births take place in a health facility with skilled birth attendants, including a midwife, a nurse with or without midwifery training, a medical officer, and/or obstetrician. Most of the deliveries in a district occur in hospitals with specialist care (teaching, general, or base hospitals). Based on hospitals' own assessments, about 84 hospitals (mostly those with specialist care) have been declared baby friendly. This represents about 14 percent of all government institutions where deliveries can take place, which includes the smaller hospitals such as peripheral units and maternity homes. One-half of all births are estimated to occur in these baby-friendly declared facilities. No information is available on private hospitals. As the Breastfeeding Focal Point, the Family Health Bureau plans to revive BFHI in 2009.

Launch of BFHI. In June 1992 the Family Health Bureau and Women's Affairs, in collaboration with UNICEF, launched the Baby-friendly Hospital Initiative. The first hospital to achieve baby-friendly status was De Soya Maternity Hospital, established in 1879. The First Lady and UNICEF Executive Director James Grant participated in the ceremony. BFHI received high-level attention and brought energy and enthusiasm into the breastfeeding movement. At the same time, it became politicized. Politicians often were more interested in appearing at hospitals to award them baby-friendly status than in ensuring that the hospitals merited this recognition. One woman said that she was working at a hospital when it was declared baby friendly, but she had received no training in BFHI nor did she know the Ten Steps to Successful Breastfeeding. Overall, training in the early years of BFHI was inadequate. Step 5 (showing mothers how to breastfeed) was poorly practiced, and Step 10 (mother support groups) did not exist. Home visits by public health midwives were viewed as a substitute for mother support groups.

In 1993 the Family Health Bureau and Women's Affairs, again in collaboration with UNICEF, conducted a study on breastfeeding practices in 128 government hospitals. Only 46 percent of the staff were trained in breastfeeding counseling and lactation management. In the maternity units of smaller hospitals, 60 percent of the ward staff advised mothers to initiate breastfeeding one to three hours after delivery. Exclusive breastfeeding was a term not well understood by many of the maternity ward staff. Recognizing the need for training, the Family Health Bureau translated WHO's BFHI course and reduced it from 18 hours to ½ -1 day. In 1995 this short course was replaced with the 40-hour lactation management course.

In 2000 UNICEF funded master training for an assessment of BFHI, but the assessment never took place. UNICEF's 2000 annual report noted the need to establish a system to monitor baby-friendly status. Presently there is no system for assessment or certification, although plans are under development to set up a system in 2009. Although BFHI did not move forward during the past decade, some elements are in place in addition to innovations to bolster support for breastfeeding women in maternity facilities. These innovations include Mother Baby Centers, Lactation Management Centers, 24-hour lactation management care, weekend classes for pregnant women, and mothers clubs, described below and in Box 1.

Antenatal and postnatal care. Hospital Health Education Units offer classes for pregnant women that include information on breastfeeding. In 2007 an external maternal and neonatal health (MNH) review team found that babies were adequately examined before discharge and that mothers received information and education on breastfeeding. Babies were often observed in the delivery room for two hours and in the postnatal ward for 24 hours before discharge. Most hospitals and MOH clinics did not conduct postnatal clinics.

Mother Baby Centers. Some hospitals realized that their regular breastfeeding services did not fully meet the needs of all women. In 2000 Castle Street Hospital in Colombo set up the country's first Mother Baby Center, which includes a Lactation Management Center and a Mother Baby Unit. UNICEF has provided furniture and equipment to 10-15 hospitals for Mother Baby Centers, and the World Bank has also helped furnish a few Mother Baby Centers. Mothers at the hospital or in the community can drop by the Lactation Management Center for assistance. The Mother Baby Unit is a transition place between the hospital and home for newborns in stable condition that do not require intensive care. The Unit has several adult beds and infant cots that enable mothers to stay with babies with special needs (e.g. premature babies, multiple births, etc.) and establish good feeding practices. Recognizing that Mother Baby Centers promote breastfeeding, address feeding problems, and reduce the cost of intensive care units, the MOH recommends that specialized institutions with maternal and neonatal care services set up such centers. In 2007 the MOH issued a standard set of guidelines for the design, furnishing, and function of the centers. The guidelines suggest that a hospital with 500-1000 monthly deliveries have 10 adult beds and 15 cots in the Mother Baby Unit.

Box 1. A Tale of Two Pioneering Hospitals and an Innovative District Program

Castle Street Hospital, located in Colombo, is the largest hospital in Sri Lanka and the **first to set up a Mother Baby Center**. The 450 bed hospital has 1,800 deliveries per month. The hospital trains staff in lactation management although recent funding constraints reduced the five-day training program to three days. The hospital's Health Education Unit offers two to three 20-minute classes every day for pregnant women. Approximately 25 pregnant women attend a class where they learn about breastfeeding, neonatal care, antenatal emergencies, postpartum care, and nutrition. Those attending receive a leaflet on the benefits of breastmilk and positioning and attachment. On Saturday from 8 a.m. to 1 p.m., approximately 200 expectant parents attend a class at the hospital in preparation for childbirth and breastfeeding. After the baby is born, a midwife visits the ward to check on feeding, offer encouragement, and provide assistance if needed. Approximately 100 of the babies delivered each month are preterm. Some of them, as well as triplets and twins, are placed in the Mother Baby Unit, which has a nurse on duty 24 hours. Before being released from the hospital, mothers are advised to contact the public health midwife in their area if they have questions or breastfeeding problems. PHMs visit mothers at home 2 times within the first 10 days after childbirth. They also can come at any time to the hospital's Lactation



Management Center. There are no mother support groups.



De Soysa Maternity Hospital, also located in Colombo, is the oldest maternity hospital in Sri Lanka and has 1,000 deliveries per month. De Soysa is the country's **first Baby-friendly Hospital and a pioneer in kangaroo mother care**. Pregnant mothers are strongly encouraged to come to two antenatal classes, and fathers are invited to attend. For the past few years, De Soysa has employed nurses and midwives to provide 24-hour lactation management care. These nurses and midwives visit the wards to check on breastfeeding, help with breastmilk expression, and ensure that the mother is confident about breastfeeding before being released. After Dr. Gerlie De Silva, Consultant Pediatrician in charge of the Neonatal Unit, attended a training of trainers in essential newborn care, she introduced kangaroo mother care for preterm babies in the hospital even though some of her colleagues thought that it was too hot in Sri Lanka for kangaroo care. "Kangaroo care is very easy," said Dr. De Silva, based on her experience at De Soysa. "The duty

nurses even make cloth holders for the mothers." Dr. De Silva wants to introduce kangaroo care in the nursing training program.

Hambantota District in Southern Province initiated a program of **outreach to pregnant women**. Dr. Sriyanthi Rajpaksha, Medical Officer of MCH, is an example of an innovator and problem solver. She observed that mothers lack knowledge on breastfeeding and turn to formula feeding when they have problems. Public health midwives often do not have enough time during clinic visits to counsel mothers on breastfeeding. They also tend to lose some of their skills in lactation management several months after their training. Dr. Rajpaksha's solution? Update the lactation management skills of all PHMs through a 5-day training course and train pregnant women during the last weekend of each quarter. Clinics are suspended on those days. The classes take place from 8 a.m. to 1 p.m. on the same days throughout the entire district. Three PHMs of neighboring divisions collaborate in planning and facilitating the training. They present lectures on 10 topics to the 30-40 pregnant women in attendance.



About 80 percent of pregnant women attend the classes during their second or third trimester. Two mothers with newborns demonstrate positioning, attachment, breastmilk expression, and cup feeding. Members of mothers clubs sing songs they have created on breastfeeding during the training. These clubs are also an example of an innovation. They operate in three districts in the Southern Province. The PHMs organize the clubs to help with health education and assist with weighing on clinic days. The PHMs meet monthly with the members, who are all mothers of at least one child, to plan the

next month's program and review the last month's activities.

The Hambantota program was designed to ensure sustainability by keeping costs down. Costs include training and supplies. PHMs receive materials to assist them in the training, including a doll, the structure of a breast, flash cards, a flip chart, antenatal booklets on breastfeeding, and two sterile cups to demonstrate cup feeding. PHMs do not receive additional salary for the training. Saturday is a normal work day. They can take time off one day during the week to substitute for their work on Sunday.

This program is now routine procedure in the entire Hambantota District. During World Breastfeeding Week in 2008, the district served as a demonstration site of community-based breastfeeding activities. Pleased with the breastfeeding classes, Dr. Rajpaksha has developed one-day trainings on early childhood development and complementary feeding. Mothers of five-month-old infants are invited to attend the complementary feeding class. Dr. Rajpaksha attributes the success of these programs to their low cost, the eagerness of mothers for knowledge on how to care for their children, and the commitment of the public health midwives.

Breastfeeding/IYCF training and education

Training has been at the center of Sri Lanka's efforts to promote and support breastfeeding. Training of all health providers is under the direction of the Ministry of Health except for the training of doctors, which is under the Ministry of Education. The Family Health Bureau trains master trainers and provides technical updates to regional training centers.

In-service training Health providers interviewed as part of the 2007 review of MNH services said that in-service training is needed to motivate staff and update skills. A number of different in-service training opportunities are available.

Professional development. Eight Sri Lankans have attended the one-month course at the Institute of Child Health in London on Breastfeeding: Practice and Policy, including the director of MCH, the former national coordinator of breastfeeding activities, the head of the Child Health Unit, and several pediatricians. UNICEF, the World Bank, and WHO provided funding for this training. Some years scholarships from the Institute of Child Health covered 50 percent of the tuition. Four health professionals also participated in master training in essential newborn care and were introduced to kangaroo care.

Lactation management training. The year 1995 marked a turning point in breastfeeding training. WHO and UNICEF organized the first 40-hour training in lactation management in Sri Lanka using the WHO/UNICEF breastfeeding counseling course. Medical officers of health, public health nursing sisters, pediatricians, hospital staff, and tutors of regional centers participated in the trainings. With UNICEF support, participants

received a book, CD, transparencies, a video, and a certificate. Dr. Jayathilaka estimates that she facilitated around 100 trainings of trainers and that master trainers have trained approximately the entire workforce of 10,000 health care providers.

Growth monitoring and promotion:

The Family Health Bureau conducts regular training of trainers and peripheral training in growth monitoring and promotion for primary health care staff. The training in growth monitoring and promotion for public health midwives includes interpreting growth curves and identifying causes and appropriate interventions for growth faltering.

Table 2 summarizes training activities in lactation management and growth monitoring and promotion from 2001-2005.

Table 2. Training in lactation management and growth monitoring

	2001	2002	2003	2004/2005
Lactation management training for field and institutional staff – 5-day program, 24 participants each	20 programs	8 programs	10 programs	44 programs
Growth monitoring and promotion – TOT – 2 days	1 program	4 programs	8 programs	1 program

BFHI training. As mentioned above, in the mid-1990s lactation management training replaced the BFHI course. In 2008 special training in BFHI resumed with WHO funding the updated BFHI course, which has been translated into Tamil and Sinhalese.

Integrated IYCF counseling training. The MOH recognized that its training program did not adequately address complementary feeding, and sent two individuals from the Family Health Bureau to the November 2006 regional training in the integrated IYCF course. In 2007 the MOH used its own curriculum to conduct two-day trainings in complementary feeding. In August 2008 two external WHO expert trainers facilitated the initial training in Sri Lanka on the five-day integrated IYCF counseling course for 10 master trainers. This was followed by participant training for 24 pediatricians, national-level consultants, and tutors from regional training centers. A second master training was held in September 2008. The integrated course, translated into Sinhalese and Tamil, will in most cases replace the 40-hour lactation management course and be used for field staff. The updated BFHI course will be used for hospital staff.

Pre-service education

Responsibility for pre-service and continuing education lies with the Deputy Director General for Education, Training, and Research. When the curriculum for midwives and nurses was revised in 2000, aspects of the 40-hour lactation management course were inserted in sections of the curriculum. Curriculum is usually updated every five years. The curriculum used in nurses’ training schools is again under review.

Public health midwives receive 18 months of training—12 months of training at nursing schools in midwifery and nursing skills and 6 months in supervised field practice, including home visits. According to the 2007 MNH review, many of the tasks performed by the PHMs are not included in the pre-service training curriculum. The review also noted weak links between classroom and field-based training. Senior PHMs, who serve as field trainers, often have no training in competency-based training methods.

The external review also reported that specialists in obstetrics and gynecology and pediatrics do not receive an orientation to national MCH programs, health trends, or the use of national standards and guidelines during their training. A few years ago the Family Health Bureau organized two courses on lactation management for “budding pediatricians.” The Family Health Bureau reports that pediatricians currently receive a one-day orientation on MCH programs during their training.

Communication

UNICEF's anthropological study on the determinants of child undernutrition included a question on sources of information on IYCF. The responses indicate the importance of using multiple channels of communication. Mothers mentioned public health workers, health professionals, private physicians, NGOs, media (radio, TV, and newspaper), antenatal booklets on breastfeeding, and family members, particularly elderly women. Recognizing the influential role of grandmothers on infant feeding decisions, various attempts have been made to engage them including mother support groups in some districts, health education classes during the antenatal period, and home visits.

The various channels of communication that have been used for IYCF promotion are described below. Research studies in Sri Lanka have helped identify issues to address in communications on IYCF. Discussion is underway for WHO to fund a research study in 2010-2011 to identify the causes of IYCF problems.

Print materials. With Sri Lanka's high literacy rate, print materials have been central to the promotion of breastfeeding. The *Child Health Development Record* is regarded as the primary health education tool in Sri Lanka. This booklet is used to record growth and immunizations and to convey key messages according to the child's age. The Family Health Bureau issues the booklet in collaboration with UNICEF and WHO.

For some time the *Fact Book on Nutrition* served as a reference for public health midwives. Some field staff still use it although it needs updating. The booklet covers diet during pregnancy and lactation; breastfeeding and complementary feeding; community growth monitoring and promotion; water, sanitation, and hygiene; household food security; family planning; and education and school-based activities. One of the persons interviewed said, "Low birth weight is still high as is stunting and underweight. Something isn't working. The *Child Health Development Record* and the *Fact Book on Nutrition* are not enough."

One of the most widely used materials on breastfeeding is the *set of five antenatal booklets* on the following themes: tips for successful breastfeeding, breastfeeding problems and solutions, breastmilk expression, breastfeeding following Caesarian section, and breastfeeding for working mothers. These booklets, available in English, Tamil, and Sinhalese, are written for pregnant women. Each public health midwife received 25 copies. The PHMs give the booklets to pregnant women and ask them to return the booklets when they finish reading them. One person said, "If you give the booklets and take them back, people think they are of value." The PHMs use a *set of 12 flashcards* to educate and counsel mothers on breastfeeding. Many of the cards focus on positioning and attachment.

Other materials include leaflets for mothers ("Give them mother nature's best" and "How to feed your baby"), and laminated posters produced by the Family Health Bureau and UNICEF for hospitals and clinics. The posters feature the Ten Steps to Successful Breastfeeding, attachment, and the importance of breastmilk. A World Bank-funded poster promotes exclusive breastfeeding and breastmilk as a child's right. Cloth posters produced in 2007 for World Breastfeeding Week promote the first hour after birth ("the golden hour") and exclusive breastfeeding for 6 months. With the exception of the *Child Health Development Record* and materials produced since 2006, materials that are still in use recommend 4-6 months of exclusive breastfeeding.

When the Early Childhood Development (ECD) program was introduced in Sri Lanka, print materials concentrated on psychosocial elements and early childhood learning. In 2001 the Ministry of Women's Affairs produced a new set of materials for parents and care givers that reflected the new emphasis on the 0-3 year old age group and included health and nutrition messages along with psychosocial messages. Breastfeeding features prominently in the first booklet, which covers the first year of life. Another ECD series produced in 2004 on preparation for childbirth and care during the first two years includes messages about



breastfeeding and complementary feeding as part of a mother's story of raising her child. One of the themes parents responded favorably to was the relationship between breastfeeding and intelligence.

Newspaper and mass media. Newspaper articles on breastfeeding written by the Family Health Bureau periodically appear in newspapers. Radio has frequently been used for media campaigns, but now people tune in to television more often than to radio. One way to disseminate messages is through morning TV health education programs. The media has a high respect for UNICEF and seeks its views in matters relating to children. Breastfeeding promotion was included in a social marketing campaign under the Early Childhood Development program. According to a UNICEF officer, the ECD campaign was considered one of the most successful in Sri Lanka.

Events. The annual World Breastfeeding Week often begins with an advocacy and educational conference on the year's theme, a media seminar, and distribution of materials produced by the Health Education Bureau. In 2000 Sarvodaya organized seminars for 600 participants during World Breastfeeding Week. The National Nutrition Month also offers the opportunity to promote breastfeeding. The main objective of the month is to get political commitment and to rally all health staff to promote a particular theme. In 2007 the Ministry of Healthcare and Nutrition issued a circular on National Nutrition Month, advising health workers to make breastfeeding, complementary feeding, and growth monitoring and promotion topics to discuss with mothers at all child welfare clinics, field weighing posts, and home visits. The circular also recommended distributing the five antenatal booklets on breastfeeding, establishing at least one mothers' group per weighing post, and strengthening existing groups.

Community-based promotion and support

Most people live within 5 kilometers of a health facility. The main link between the health system and the community is the public health midwife. The 2007 MNH review found that PHMs identified 98 percent of pregnant women in the community. They provide antenatal care at home and in the clinic. Postnatal care includes two home visits in the first 10 days after a normal delivery, another visit around 28-30 days postpartum, and a visit at the end of 6 weeks. PHMs find out about a birth from a form issued by the hospital, direct information from relatives, and the PHM's own records of the expected date of delivery. However, an estimated 20 percent of mothers may be "missed," perhaps because the mothers deliver in one area and then go to their parents' home in another area. In some cases, a PHM's excessive workload may make it difficult to perform all postnatal visits.

Another contact point with mothers is during growth monitoring and promotion. The guidelines on infant and young child feeding and the protocol for managing nutritional problems of children under five in the community advise monthly weighing of children under two years of age and once every three months for children two to five years of age. Primary health care workers such as PHMs are advised to weigh children who display any nutritional or health problem each month, regardless of their age, and to weigh any child brought to a clinic. For infants under six months, weighing is recommended in a clinic and thereafter at field weighing posts. Healthcare providers will be receiving counselling cards to aid in growth monitoring. Although growth monitoring lacks supporters in some public health circles, those interviewed in Sri Lanka consider it a successful and critical intervention when coupled with strategies to promote better feeding.

In the late 1980s and early 1990s volunteers, young unmarried women often worked alongside the PHMs. Today young women are more likely to pursue educational opportunities or employment in garment factories. The Participatory Nutrition Improvement Program, a community-based nutrition program described below, attempted to mobilize community members and form groups to support nutrition activities. As mentioned earlier, Sarvodaya is an advocate of mothers and parents support groups.

3.6 Integration strategies and cross-cutting issues

In Sri Lanka breastfeeding promotion has been incorporated into the programs described below rather than as a stand alone, vertical breastfeeding program.

Multi-sectoral, community nutrition programs. In the mid 1990s, the government adopted a multi-sectoral approach to address the multiple causes of undernutrition – the Participatory Nutrition Improvement Program (PNIP). UNICEF promoted this approach, which incorporated health, education, agriculture, and social services and involved community mobilization. Prior to the PNIP, the primary strategy to reduce child undernutrition was to deliver services when the mother visited the clinic or the public health midwife visited the home. PNIP attempted to extend the reach of services by using trained “external facilitators” recruited by the Ministry of Plan Implementation to form community groups, offer school seminars, conduct food demonstrations, assist with growth monitoring, and promote home gardens. Growth monitoring and promotion at field weighing posts was a major feature of the program. PNIP also included a national nutrition information, education, and communication (IEC) strategy using print and electronic media. In 2000 gender, early childhood stimulation, and alcoholism were added to the PNIP model. In the view of one UNICEF officer, “PNIP failed to effectively utilize existing institutions at the grassroots level. It brought in paid external facilitators who were not part of the existing structure. This did not last long. PNIP failed to get strong support from the Ministry of Health.”

Early childhood care and development. In the late 1990s, UNICEF’s focus shifted to early childhood development (ECD). UNICEF piloted ECD in 12 MOH divisions in 8 districts. Within two years, the government adopted the ECD approach. ECD initially concentrated on pre-school education for children 3-5 years old but then shifted to a home-based program with greater attention to the 0-3 age group. Mothers and health providers responded favorably to the psychosocial dimension, which was previously missing in health education, but some felt that this aspect tended to dominate programming at the expense of other aspects of child growth and development. The integrated early childhood care and development program combined health, nutrition, water supply, and psychosocial development with implementation through the Ministry of Health. Public health midwives, rather than external facilitators, promoted an integrated care package. Under ECD, crèches in the estate sector were promoted to support breastfeeding women in the workplace.

Integrated nutrition package. The current UNICEF program incorporates elements of both PNIP and ECD but is framed more in terms of health and an integrated nutrition package that specifically addresses nutritional needs during pre-pregnancy and pregnancy, optimal IYCF practices, and enhanced micronutrient intake to combat anemia and low birthweight. One person said, “UNICEF’s five-year programming cycle results in new programs. The government had invested in ECD while UNICEF had “moved on” to another programming approach.”

Schools. For many years, information on exclusive breastfeeding, colostrum, and complementary feeding has been integrated into the school curriculum for grades 6-9.

Reproductive health. Suppressed fertility is listed among the benefits of breastfeeding, but the Lactational Amenorrhea Method (LAM) is not one of the family planning methods offered through government services. Sri Lanka does not regard LAM as a modern method of family planning. Women are encouraged to use modern methods of contraception as early as possible after birth.

IYCF in emergency contexts. In the past five years, Sri Lanka has experienced cyclones, flooding, landslides, droughts, and a tsunami, each with its own social, economic, and health impact. The December 26, 2004 tsunami resulted in the



deaths of 35,000 people -- one-third of them children -- and the displacement of hundreds of thousands of people.⁵

After the tsunami, the mass media broadcast appeals for infant formula and bottles. Media messages suggested that infant formula saves lives; infant formula donations are needed; and breastfeeding is fragile and unreliable. Articles in the press reported that women were no longer able to breastfeed because they were traumatized by the tsunami. Newspapers published emotional appeals such as the one in the *McGill Tribune* for “critically urgent supplies such as infant formula and feeding bottles.” Donors and individuals responded to these various appeals. Initially, formula and feeding bottles were distributed without controls to protect breastfeeding, particularly in the eastern border areas.

Breastfeeding advocates urged the MOH to advocate with the media for responsible reporting and to restrict formula distribution to those in need. No national guidelines on infant feeding in emergencies had been prepared at the time of the tsunami. Eighteen days after the tsunami, the Family Health Bureau issued a provisional *Guideline for feeding infants and young children (1-5 years) including orphans and those not living with mothers (tsunami affected areas)*. The Family Health Bureau prepared the document in consultation with UNICEF, the College of Pediatricians, Medical Research Institute, Health Education Bureau, and Nutrition Coordination Division of the Ministry of Health. WHO’s guidelines on infant feeding in emergencies served as a reference point. The introduction to the Sri Lanka guidelines states: “It is well known that various private companies, NGOs and well wishers have indiscriminately distributed milk powder and bottles contrary to the guidelines which has seriously threatened the nutritional status of the infants and young children in Sri Lanka.” The guidelines discuss the importance of breastfeeding in emergencies, frequencies and types of feeds at different ages, and the role of the health worker. The medical officers of health in the districts were responsible for ensuring that these guidelines were communicated and enacted.

UNICEF’s role after the tsunami was a joint mass media campaign with the MOH to prevent formula milk donations and distribution, production of IEC materials, development and distribution of the national guidelines, vitamin A supplementation, and establishment of selective feeding programmed in consultation with the World Food Program. One of the lessons learned by UNICEF was that lack of guidelines and coordination after the tsunami provided an “opportunity for formula producers to disturb the system.”

The guidelines developed after the tsunami were reviewed by the Family Health Bureau in 2008, with suggestions for a few modifications, such as prohibition of direct distribution of products to mothers. In March 2008 two people from the Government and two from UNICEF/Sri Lanka participated in a regional strategy workshop in Indonesia on infant and young child feeding in emergencies (ENN, 2008). An exercise during the workshop involved an assessment by country teams of the current situation in their countries. The Sri Lanka team identified the following issues as the main concerns: high rates of bottle/formula feeding in non-emergency times, inadequate policy implementation, few government or NGO staff trained or knowledgeable about infant feeding in emergencies, unsolicited donations of formula/milk powder, and unsuitable foods for complementary feeding during emergency foods distribution.

Infant feeding in the context of HIV. In 2007 the HIV prevalence rate was reported to be less than 0.1 percent. In 2002 UNICEF supported a series of consultative meetings, including a workshop with the College of Obstetricians and Gynecologists to develop guidelines on the prevention of mother-to-child transmission (PMTCT) of HIV. The Ministry of Health produced a draft document. In 2005 UNICEF provided support to the MOH to formulate a policy on infant feeding in the context of PMTCT. The Government will provide HIV-positive pregnant women with a “PMTCT package” that includes anti-retrovirals, safe delivery, and safe

⁵ After the tsunami 739 camps were established for the displaced population. A January 2005 study carried out in 40 camps among pregnant and lactating women found that most of the mothers continued breastfeeding without problems of reduced breastmilk production. Some mothers who had fed their children infant formula before the tsunami reported difficulty obtaining the formula. Hygienic preparation of the formula in the camp conditions was a problem. Camp managers reported that children had to eat from a common pot, but since the food was spicy, they were often fed only breastmilk and biscuits (Jayatissa et al., 2006).

feeding interventions, including free infant formula for those choosing this feeding option. Health providers will be trained on infant feeding options of HIV-positive women through the PMTCT module in the integrated IYCF course. The updated BFHI course also discusses PMTCT and infant feeding issues.

3.7 Human rights-based approach to programming (HRBAP) and gender mainstreaming

The present UNICEF Deputy Representative reviewed UNICEF's entire program portfolio from the perspective of HRBAP and gender mainstreaming⁶. The Common Country Assessment published in 2006 adopted a rights-based approach to development. The Early Childhood Development approach emphasized the involvement of families in decision-making on issues affecting their children. One UNICEF officer said that it was difficult to convince national counterparts of the HRBAP approach. Some Sri Lankan counterparts also felt that gender issues were not a concern in Sri Lanka because in their opinion women play an active role in society. The United Nations Development Assistance Program (2007), however, recognizes barriers women in Sri Lanka face in accessing resources stemming from cultural attitudes towards women's role and views women as a primary audience of different UN programs. Unless the consultant did not have access to relevant documents or talk to people knowledgeable on the topic, it would appear that gender mainstreaming as it relates to IYCF has not been given much attention in Sri Lanka.

3.8 UNICEF's role and resources

UNICEF has been the primary actor in IYCF among the development partners in Sri Lanka. In the early 1990s breastfeeding was a major component of UNICEF's child survival efforts. James Grant, a strong advocate for breastfeeding, was an inspiration to Sri Lankan health professionals and UNICEF staff. Breastfeeding received less attention when UNICEF's nutrition programming in Sri Lanka shifted to the Participatory Nutrition Improvement Program and then to Early Childhood Development. More program components meant more messages. A UNICEF officer estimated that at one time the annual budget for Early Childhood Development was around \$1 million, with breastfeeding representing approximately 1 percent of the budget. Even if the numbers are not accurate, the perception was that breastfeeding played a minor role within ECD. UNICEF did include two IYCF objectives in its country program for 2002-2006: 1) increase exclusive breastfeeding to 80 percent and 2) increase the proportion of children receiving complementary foods five times per day to at least 80 percent.

From 2001-2007, UNICEF priorities for IYCF programming were initially the promotion of exclusive breastfeeding for up to four months and then to six months, human resource development in IYCF, especially breastfeeding, establishment of lactation management centers in all major hospitals and some small hospitals, printing of breastfeeding materials along with social marketing, and an anthropological study of IYCF practices. According to the current UNICEF Sri Lanka website, "UNICEF heavily invests in island wide promotion, protection, and support to breastfeeding, coupled with support to the Baby-friendly Hospital Initiative and development of National Policy on the Code of Marketing of Breastmilk Substitutes." (As noted by UNICEF New York, complementary feeding five times per day exceeds international guidelines.)

When asked about UNICEF's contribution to IYCF, a government official said that UNICEF has been "immensely supportive" and pointed to nutrition activities in high-risk districts and among the most vulnerable, the Sprinkles⁷ initiative to fortify complementary foods in two pilot districts, and funding for training in lactation management, printing of IEC materials, and equipment for mother baby units and

⁶ One document that was reviewed indicated that a case study was prepared on HRBAP in response to the humanitarian situation in Sri Lanka in 2004 and would be available in early 2006. The report was not located.

⁷ In 2009 Sprinkles is being distributed in five districts with high prevalence of anemia among children under five to all children 6-24 months old. When infants are six months old, parents receive 15 sachets of Sprinkles per month for use every other day for a period of four months.

lactation centers. UNICEF also funded radio campaigns; workshops for pediatricians, obstetricians, and nurses; and the participation of at least two people in the one-month breastfeeding course at the Institute of Child Health in London. Materials were developed jointly, with input from a government-appointed technical committee and pretesting by the Health Education Bureau. UNICEF also worked closely with expert committees in the development of guidelines and policies.

Financial records and annual reports provide some information on IYCF activities supported by UNICEF in Sri Lanka. Annual work plans would have been another source of information but were not made available. Table 1 is *suggestive* of the types of activities that UNICEF supported. The financial information was too incomplete to include. When key informants were asked if overall funding in Sri Lanka was adequate for IYCF, a couple said “yes” but said the challenge is the effective and timely use of the funds.

Table 3. Examples of the Types of IYCF Activities Funded by UNICEF

Year	Type of Activity
2007	<ul style="list-style-type: none"> • Updating knowledge and skills of hospital staff in Galle to promote IYCF • Training of trainers (TOT) on exclusive breastfeeding for 20 supervising officers in Ampara • Two TOTs to introduce new concepts on complementary feeding practices • Training of primary health care staff in Batti on IYCF and growth monitoring and promotion • World Breastfeeding Week activities: national seminar and paper supplements in daily newspaper • Training of 200 PHMs, 50 medical officers, and 100 nurses on lactation management and IYCF in Jaffna • Training of health staff on IYCF in Anuradhapura and Mannar
2006	<ul style="list-style-type: none"> • Training of 100-300 health workers per “UNICEF district” on IYCF • Support for participation of 2 government officials at a multi-country workshop on BFHI • Complementary feeding training
2005	<ul style="list-style-type: none"> • Training of 78 master trainers from 15 tertiary care hospitals and over 2,000 peripheral service providers on lactation management • IYCF survey • Training on IYCF in Badulla and TOT on complementary feeding in Monaragala and N’elyia • Equipment for lactation centers in 6 maternity hospitals
2004	<ul style="list-style-type: none"> • Funds to Sarvodaya for World Breastfeeding Week
2003	<ul style="list-style-type: none"> • Support for 2 government officials to attend IYCF meeting in India
2002	<ul style="list-style-type: none"> • Funds to Sarvodaya for World Breastfeeding Week
2001	<ul style="list-style-type: none"> • Funds to Sarvodaya for World Breastfeeding Week
2000	<ul style="list-style-type: none"> • Training of 600 nurses in lactation management • Printing of 10,000 flash cards and 20,000 booklets on breastfeeding
1999	<ul style="list-style-type: none"> • Training of 500 health staff on nutrition and lactation management through funding from WHO, the World Bank, and UNICEF
	Funding of Dr. Jayathilaka’s doctoral research on the impact of five breastfeeding interventions

In 2002 public expenditure on health was 1.6 percent of the gross national product and 4.3 percent of national expenditure (WHO, 2006). Of the 2002 health budget, only 8.6 percent was spent on community health services. NGO activities, commercial insurance, and employer spending represent a small share of overall health expenditures.

4. Discussion

4.1 Factors contributing to results

Although evidence is missing that links the impressive improvements in IYCF practices to specific interventions, those interviewed suggested the following contributing factors:

- Well-developed health system with good health infrastructure

- Almost universal delivery of newborns in health facilities, making it easier to reach women and provide support during the critical first hours
- Multiple contacts of public health midwives with pregnant women and postpartum women in their homes and in clinics
- Breastfeeding promotion incorporated into a variety of different programs rather than being a stand alone, vertical breastfeeding program.
- Extensive lactation management training for nearly all health workers in the field and hospitals, which made it possible to provide skilled assistance to mothers
- Efforts to regulate aggressive marketing of breastmilk substitutes
- Supportive policies to ensure maternity leave in government services
- Dedicated professionals in key positions in government, academia, health facilities, donor agencies, and professional organizations who were breastfeeding champions and mentors
- High-level political commitment at various points in time
- Multiple communication channels that could reach people because of media access and high rates of female literacy
- One month dedicated to nutrition messages
- Growth monitoring and promotion when coupled with counseling
- PNIP volunteers in some districts and the estate sector who were effective in promoting breastfeeding and mothers groups in a few areas
- A culture that is very supportive of breastfeeding
- Health-seeking behaviors of parents and receptiveness to changes that will improve their children's health
- Ease of reaching women in a small country (except in areas of armed conflict)

4.3 Lessons learned

Some of the most significant lessons learned in breastfeeding promotion in Sri Lanka are discussed below.

Advocacy. Breastfeeding promotion, protection, and support requires extensive advocacy at all levels. Breastfeeding proponents in medical schools, the Family Health Bureau, and UNICEF were instrumental in focusing attention on feeding practices and leading efforts for Code adoption, maternity legislation, and BFHI. The participation of Sri Lankans in international deliberations on breastfeeding combined with their own local experience and observations prompted them to promote and protect breastfeeding. These individuals encouraged each other and inspired others. Professors in medical schools influenced students who later assumed influential positions in government service. The numerous visits by James Grant to Sri Lanka motivated local breastfeeding champions and reminded them that they were part of a global effort to save the lives of children. Grant challenged high-level officials to invest in their children. Former UNICEF officer Dr. Wijemanne said that she used data and statistics to approach officials along with information that she got during her numerous field visits and her own observations. She said that “letters and meetings aren’t enough.” She built on personal relationships, including with a Minister, and interacted with medical officers.

Human resource development. UNICEF supported many individuals who became breastfeeding champions through training opportunities and participation in international breastfeeding forums. This investment paid off. These individuals continue to hold influential positions and advocate for breastfeeding. The large-scale training of health professionals in lactation management also paid off. Sri Lankans have high regard for these professionals and respect their advice.

BFHI. The rush to certify hospitals for political reasons, weak training, and lack of institutionalization and a system for assessment and monitoring undermined BFHI. Coverage remained low. As stated by one individual, “The BFHI plaque can get tarnished and dull. It needs to be polished. The same can be said about BFHI.” However, extensive training of health professionals in lactation management and innovations to

boost breastfeeding practices in maternities such as Mother Baby Centers have contributed to a high rate of early initiation and represent one of the factors in the sharp increases in exclusive breastfeeding.

Behavior change communication. As noted earlier, mothers access information on IYCF from multiple sources, underscoring the importance of using multiple channels of communication.

Integrated approaches. Mainstreaming IYCF into programs such as early childhood development can add new energy to a familiar topic and engage new stakeholders. Health providers are reported to have welcomed integrated messages for specific age groups. Care must be taken, however, to ensure that breastfeeding does not get lost amidst multiple topics and enthusiasm for new topics and initiatives. Integration works best if it begins during the planning stage with clear definition of the roles and responsibilities of implementing partners and during the development of communication materials and training manuals. It is also important to approach IYCF in a comprehensive manner and include and align complementary feeding initiatives with breastfeeding promotion, protection and support.

Sustainability. Breastfeeding promotion is not a “project” with a beginning and end point. The Family Health Bureau has ongoing responsibility to protect, promote, and support breastfeeding. This helps ensure sustainability of results as does the large cadre of public health midwives and health professionals who have received training in lactation management. Sustainability will require an organizational structure with supportive staff, dedicated resources, collaboration with professional organizations, ongoing training and updating of health personnel, strong monitoring of the Code, good pre-service training, and integration of the BFHI steps into an accreditation system.

4.3 Remaining challenges

Much has been accomplished, but experience shows that gains can be quickly lost when breastfeeding drops from the agenda and new advocates are not recruited. Achievements, gaps, and challenges were identified during an external review of maternal and neonatal health services commissioned by the Ministry of Health to formulate recommendations for a strategic plan for 2008-2012 and beyond. The review, conducted in September/October 2007 by a team of national and international experts, consisted of an in-depth desk review, stakeholder analysis and workshop, key informant interviews, focus group discussions, and field visits. The World Health Organization coordinated the review with assistance from UNICEF and UNFPA. Key findings of particular relevance to IYCF include the following:

- *Inadequate staffing of the Family Health Bureau* to undertake planning, budgeting, monitoring, evaluation, policy analysis, and operational research
- *Service area and population too large for Public Health Midwives to cover*
- *Weaknesses in supervision* (infrequent, absent, or of minimal value because the supervisory visit does not focus on problem-solving and education)
- *Low level of behavior change communication skills* among service providers with top-down delivery of generalized messages to mothers
- *Ad hoc, uncoordinated in-service training*, often driven by donor-funded programs without monitoring and evaluation of the quality of training at the district level
- *Fragmentation of nutrition* among directorates

As IBFAN’s representative in Sri Lanka, Sarvodaya collaborated with the Family Health Bureau in 2005 to identify achievements and gaps in implementation of the Global Strategy for IYCF in Sri Lanka through a questionnaire distributed to key informants based on the WHO/LINKAGES IYCF assessment tool. The overall score derived from this exercise was a “B,” placing Sri Lanka highest among eight South Asian countries (IBFAN, 2007). Among five IYCF practices, bottle feeding among infants less than six months old was of greatest concern. Among the 10 indicators for policies and programs, Sri Lanka received high marks for community outreach, information support, and in-service and pre-service training. The weakest areas

identified in this “report card” were the Baby-friendly Hospital Initiative, maternity protection, infant feeding and HIV, and monitoring and evaluation.

5. Recommendations

The following recommendations emerge from the document review and key informant interviews.

Planning and coordination. Responsibility for IYCF is diffused in Sri Lanka. The Government needs to clarify responsibilities and roles. The Global Strategy for IYCF recommends a national coordinating body with a multi-disciplinary team of experts. One of the first tasks of this body or the mechanism most suitable for the Sri Lankan context should be to develop a detailed plan of action that lays out how IYCF promotion and support will support the achievement of broader development objectives related to reduction of undernutrition and neonatal and infant mortality. The plan should outline ways to reach low performing districts and vulnerable populations. Opportunities exist for incorporating breastfeeding into neonatal and reproductive health programs and for integrating IYCF in the integrated management of childhood illness. Timelines, roles and responsibilities, and a budget should be included in the action plan. IYCF policies, strategies and guidelines need to be incorporated into the final National Nutrition Policy.

Code implementation and monitoring. Recommended actions include reactivation of the committee to monitor the Code, accountability of this committee to the national coordinating body, enforcement strategies, inclusion of a session on Code implementation and monitoring in training sessions, and awareness-raising at provincial and district levels of the Code.

Maternity protection. Efforts should be made to ratify ILO’s Maternity Protection Convention No. 183, assess whether women are informed of their benefits, ensure supportive conditions upon return to work, and educate employers—both public and private sector—of their responsibilities and the benefits of mother-friendly workplaces for employee, child, and employer.

Human resource development. Sri Lanka has demonstrated the effectiveness of public health midwives in improving breastfeeding practices, yet this important cadre of health care providers is often overstretched. Including recruitment and training of additional public health midwives in the MOH’s human resource development plan is a recommended first step. Another recommendation is periodic technical updates for hospital staff, specialists, and private sector providers, as well as regular supervision and mentoring. Public health midwives receive periodic updates but this does not happen for medical and institutional staff. When new guidelines are issued by the Family Health Bureau, orientations should be held for all hospital staff. Circulars sent by the Family Health Bureau are widely disseminated to preventive staff but not to hospital staff. Job aides should be reviewed to determine if there are any gaps to address, such as checklists on breastfeeding and complementary feeding counseling for public health midwives and protocols for managing children with growth faltering. More attention needs to be given to provision of ongoing counseling and problem solving on infant and young child feeding in the health system beyond the delivery and post-partum contacts – e.g. through the immunization, growth monitoring and IMCI contacts.

BFHI. The government and donors are promoting mother baby centers in hospitals to enhance BFHI. A study on the impact of these centers would help inform programming. The 2007 external review of maternal and neonatal health (MNH) services recommended independent monitoring of BFHI and development of an assessment system. Given almost universal delivery in health facilities, revitalization of BFHI through requiring all staff working in maternity facilities to be trained on lactation management/breastfeeding counseling, along with incorporation of BFHI criteria in standard operating procedures and accreditation/monitoring systems for all maternity facilities (public and private), can help build sustainability and ensure expansion and better institutionalization of the BFHI. More attention should be given to ensure that the private sector establishes baby- and mother-friendly services. Approximately 10 percent of deliveries take place in private hospitals. More than half of outpatient services are provided by the private sector.

Behavior change communication. An evidence-based, action-oriented IYCF communication strategy that uses multiple channels should be developed. Existing materials should be reviewed to determine whether they

address the barriers to good feeding practices that were identified in recent qualitative surveys in different geographical areas. Context-specific messages based on formative research are needed on complementary feeding. Qualitative methods such as trials of improved practices can help identify “do-able actions” and appropriate messages. IYCF should be a major component of communication strategies to reduce neonatal mortality and undernutrition, promote early childhood care and development, and prevent and treat childhood illness. Materials should be updated to eliminate confusion on the recommended length of exclusive breastfeeding and timing of the introduction of complementary foods. In IYCF training programs, BCC should feature prominently in the training.

Community-based activities. Community members are often viewed as recipients of services rather than resources. Dialogue is needed between government, NGOs, and community members on the role and contribution of the community and volunteers and the nature of their participation. Rather than dismissing NGOs because of inexperience, efforts should be made to strengthen them, build social support networks for breastfeeding women, and identify incentives and a support structure to sustain the involvement of paid community cadres, mother support groups, and volunteers. Paid peer counselors who are part of existing structures could be explored as a strategy to support overworked public health midwives.

Advocacy. Advocacy is needed at many levels, including among provincial directors of health services and their teams, so that they will give IYCF higher profile and additional resources. Advocacy is also needed among pediatricians who still resist six months of exclusive breastfeeding and among private practitioners who are targets of the infant formula industry.

Monitoring and evaluation. In designing surveys, care needs to be taken to ensure that the questions and indicators are comparable with other surveys. IYCF data should be collected and reviewed regularly, shared with stakeholders, and used to inform program activities. New IYCF global indicators can provide a good baseline for analysis of trends in various aspects of infant and young child feeding at country level.

Role of UNICEF. UNICEF can contribute to catalyzing action to implement of these recommendations by:

- Providing technical leadership
- Facilitating the formation of a national coordinating structure and the development of a detailed plan of action
- Using its expertise in communications and social marketing to develop a strategic, evidence-based communications plan for IYCF
- Advocating for recruitment of more public health midwives and for paid lay counselors
- Funding activities in support of six months of exclusive breastfeeding such as updating materials and advocacy events to address the concerns of those who are resistant to the new recommendation
- Leveraging at-scale action at community level by mapping existing networks and advocating for inclusion of IYCF in plans and budgets of stakeholders
- Engaging new partners in IYCF such as the Perinatal Society and cultivating and building the capacity of a new generation of breastfeeding champions
- Encouraging the revitalization and institutionalization of BFHI, with strengthened training, assessment, and accreditation strategies as part of standard operating procedures for all hospitals, public and private
- “Twinning” hospitals so that one hospital that has successfully implemented BFHI helps another hospital establish good procedures
- Advocating for a comprehensive approach that addresses the causes of stunting including poor maternal nutrition and inadequate complementary foods and feeding practices

Annexes:

1. Materials reviewed
2. Key informants

Annex 1. Documents reviewed

Demographic and Health Surveys:

Sri Lanka Demographic and Health Survey 1987. Department of Census and Statistics. Ministry of Plan Implementation, Colombo, Sri Lanka and Institute for Resource Development/Westinghouse Columbia, Maryland, USA. May 1988.

Sri Lanka Demographic and Health Survey 2000. Department of Census and Statistics in collaboration with the Ministry of Health, Nutrition, and Welfare.

Sri Lanka Demographic and Health Survey 2006/7: Preliminary Report (draft). Department of Census and Statistics in collaboration with the Ministry of Healthcare and Nutrition. May 2008.

Documents of United Nations Agencies in Sri Lanka:

Rodrigo SW. Case Study: Integrated Early Childhood Care and Development Programme in Sri Lanka. Report prepared for UNICEF Sri Lanka. Colombo, Sri Lanka: UNICEF, March 2004.

UNICEF. Government of Sri Lanka, UNICEF Country Programme, 2002-2006.

Rodrigo SW. Integrated Early Childhood Care and Development Programme in Sri Lanka. Report prepared for UNICEF Sri Lanka. March 2004.

United Nations Development Assistance Framework (UNDAF) Sri Lanka 2008-2012. Colombo, September 2007.

World Health Organization. WHO Country Cooperation Strategy 2006-2011: Democratic Socialist Republic of Sri Lanka. Colombo, Sri Lanka: WHO, September 2006.

Documents of the Democratic Socialist Republic of Sri Lanka:

Ministry of Social Welfare. National Policy on Early Childhood Care and Development. August 2003.

Ministry of Healthcare & Nutrition. Report of the External Review of Maternal and Newborn Health Sri Lanka. Colombo, Sri Lanka: World Health Organization, December 2007.

Family Health Bureau and UNICEF. Study on Breastfeeding Practices in Hospitals Sri Lanka. Colombo, Sri Lanka: Ministry of Health and Women's Affairs, 1993.

Family Health Bureau. Guideline for Feeding Infants and Young Children (1-5 Years) including Orphans and Those Not Living with Mothers (Tsunami Affected areas). January 2005.

Family Health Bureau. Guideline for Feeding Infants and Young Children (1-5 Years) including Orphans and Those Not Living with Mothers during an Emergency. Draft 2008.

Family Health Bureau. Circular Letter and Guidelines on Infant and Young Child Feeding. Colombo, Sri Lanka: Ministry of Healthcare & Nutrition, October 2007.

Ministry of Healthcare & Nutrition. Circular Letter and Protocol on Managing Nutritional Problems among Under Five Children in the Community. Colombo, Sri Lanka: Ministry of Healthcare & Nutrition, January 2008.

Nutrition Coordination Division. Ministry of Healthcare, Nutrition and Uva Wellassa Development. Sri Lanka Code for the Promotion, Protection and Support of Breast Feeding and Marketing of Designated Products (Amended Code – 2002).

Family Health Bureau, Perinatal Society of Sri Lanka. Building and Other Guidelines for Neonatal Intensive Care Units, Special Care Baby Units, Mother Baby Centres. Colombo, Sri Lanka: Ministry of Healthcare and Nutrition, 2007.

Other Resources:

Agampodi SB, Agampodi TC, Kankanamge U, Piyaseeli D. Breastfeeding practices in a public health field practice area in Sri Lanka: a survival analysis. *International Breastfeeding Journal* 2007, 2:13.
www.internationalbreastfeedingjournal.com/content/2/1/13.

Emergency Nutrition Network. Infant and Young Child Feeding in Emergencies: Making it Happen. Proceedings of a regional strategy workshop. Bali, Indonesia, 10-13 March 2008.

Jayatissa R., Bekele A, Piyasena CL, Mahamithawa S. Assessment of nutritional status of children under five years of age, pregnant women, and lactating women living in relief camps after the tsunami in Sri Lanka. *Food and Nutrition Bulletin* 2006; 27(2):144-152.

Marchione TJ, Helsing E, eds. Rethinking infant nutrition policies under changing socio-economic conditions. *Acta Paediatrica Scandinavica* 1984; supplement 314.

Presentations:

Bhutta AZ. An anthropological study on the determinants of child under-nutrition “Sri Lanka”: Preliminary findings. Nd.

Kesavan R. Breastfeeding promotion in Sri Lanka. 2007.

Rajpaksha S. Breastfeeding programme for mothers. nd

Infant and young child feeding in emergencies in the media.
www.unicef.org/eapro/Regional_profile_of_donations.pdf

Annex 2. Key informants

Ministry of Healthcare and Nutrition

Dr. Dhammica Rowel
Consultant Community Physician
Program Officer Newborn Health
Family Health Bureau

Dr. Sudarshini Fernandopulle
Consultant Community Physician
Program Officer Child Health
Family Health Bureau

Dr. Nellie Rajaratne
Medical Officer
Family Health Bureau

Hiranya Jayawickrama (comments on draft)
Acting Consultant Community Physician
Family Health Bureau

Government Health Facilities

Dr. Wimal Karandagoda
Director
Castle Street Hospital for Women

Dr. Shakila Nanayakkon
Consultant Pediatrician
In charge of the Neonatal Unit
Castle Street Hospital for Women

Dr. Sriyani Liyanage
Medical Officer
Health Education Unit
Castle Street Hospital for Women

Dr. Girlie De Silva
Consultant Pediatrician
In charge of the Neonatal Unit
De Zoysa Maternity Hospital

Dr. Sriyanthhi Rajpaksha
Medical Officer, MCH
Hambantota

UNICEF

Dr. Desiree M. Jongsma
Deputy Representative

Dr. S.M. Hossain
Chief, Health and Nutrition

Dr. Renuka Jayatissa
Nutrition Specialist

S. M. Ariyaratne
Chief, UNICEF Field Office/Galle

Dr. Sapumal Danapala (by phone)
Former Program Officer, UNICEF 2002-2007

Dr. Hiranthi Wijemanne (by phone)
Public Health Specialist, UNICEF 1977-2003

Aberra Bekele (by email)
Chief of Health and Nutrition, 2001-2007

World Health Organization

Dr. Anoma Jayathilaka
National Professional Officer
Former Programme Officer Maternal and Newborn Health
Family Health Bureau

Other

Professor Priyani Soysa
Emeritus Professor of Pediatrics
University of Colombo