



IMCI Technical Advisory Group (TAG) Third Meeting Report

Texas Children's Hospital • Houston, TX, U.S.A.
18 and 19 of May, 2004



**Pan American
Health
Organization**



*Regional Office of the
World Health Organization*



Integrated Management of Childhood Illness (IMCI)
Child and Adolescent Health (CA)
Family and Community Health (FCH)

IMCI Technical Advisory Group (TAG) Third Meeting Report



Texas Children's Hospital, Houston, TX, USA

18-19 of May 2004



**Pan American
Health
Organization**



*Regional Office of the
World Health Organization*

PAHO HQ Library Cataloguing-in-Publication

Pan American Health Organization
IMCI Technical Advisory Group (TAG): Third Meeting report
Washington, D.C: PAHO, © 2004.
(Series FCH/CA/04.06.I)

ISBN 92 75 12544 9

I. Title II. Series

1. CHILD WELFARE
2. COMPREHENSIVE HEALTH CARE
3. CHILD HEALTH SERVICES
4. CHILD CARE
5. STRATEGIC PLANNING
6. HEALTH EDUCATION

NLM WA320

The Pan American Health Organization welcomes requests for permission to reproduce or translate its publications, in part or in full. Applications and inquiries should be addressed to Child and Adolescent Health Unit, Family and Community Health Area, which will be glad to provide the latest information on any changes made to the text, plans for new editions, and reprints and translations already available.

Publications of the Pan American Health Organization enjoy copyright protection in accordance with the provisions of Protocol 2 of the Universal Copyright Convention. All rights reserved.

The designation employed and the presentation of the material in this publication do not imply the expression of any opinion whatsoever on the part of the Secretariat of the Pan American Health Organization concerning the legal status of any country, territory, city, or area or of its authorities, or concerning the delimitation of its frontiers or boundaries.

The mention of specific companies or certain manufacturers' products does not imply that they are endorsed or recommended by the Pan American Health Organization in preference to others of a similar nature that are not mentioned. Errors or omissions excepted, the names of proprietary products are distinguished by initial capital letters.

This document contains a summary of the third Technical Advisory Group (TAG) meeting on Integrated Management of Childhood Illness (IMCI). It also contains the conclusions and recommendations produced by the Group on the current issues that form part of the objectives of the IMCI strategy, as well as the progress made in its implementation in the Region of the Americas.

The third TAG meeting was held at the Texas Children's Hospital in Houston, Texas, U.S.A., on the 18th and 19th of May, 2004. TAG member, Dr. Javier Torres Goitia, of Bolivia, coordinated the meeting.

Contents

1.	Presentation	5
	Words From Mark A. Wallace, President, Chief Executive Officer, Texas Children’s Hospital	7
	Words From Dr. Ralph D. Feigin, M. D., Physician-In-Chief, Texas Children’s Hospital; President and Chief Executive Officer Baylor College of Medicine	9
2.	Introduction	11
3.	Meeting Objectives	13
4.	Current Situation and Perspectives of the Region of the Americas on the Millennium Development Goals Related to Children Mortality	15
5.	Progress in the Peri-Neonatal Component	25
6.	Contribution of the Community Component of the IMCI Strategy to Achieve The Millennium Development Goals: Expansion Perspectives to Include the IMCI Peri-neonatal	31
7.	Social Communication in the IMCI	35
8.	The IMCI Strategy and the Achievement of the Millennium Development Goals in the Region of the Americas	43
9.	Upcoming Challenges to Strengthen and Expand the IMCI Strategy in the Region of the Americas	49
10.	Conclusions and Recommendations	55
11.	Annexes	59
	Meeting Agenda	59
	TAG Members	61
	Texas Children’s Hospital Members	62
	Advisors, PAHO/WHO	62



1. Presentation

The periodic revision of childhood health conditions in the Region of the Americas and the study progress of the design, application and expansion of the interventions to improve them are keys to achieve the Millennium Development Goals (MDGs) related to reducing childhood mortality in all the countries of the continent.

By identifying the areas and population groups that are most vulnerable, continuous study on children's health situation allows countries to direct their efforts and resources more efficiently giving priority to these population groups so they can have access to key interventions for child survival and development, thus contributing to more equity.

During recent years, the Integrated Management of Childhood Illness (IMCI), which includes key interventions for detecting, preventing, and treating illnesses and problems that more frequently affect children's health as well as the main practices to promote health, is a key strategy to provide these population groups with the available knowledge to improve the health of children under five. Its adaptation to the epidemiological and operative conditions of each country, and their different areas, and its later implementation through health services and communities has prospered in most of the countries of the Americas. It has also contributed to provide appropriate answers to the population on how to reduce illnesses and deaths during infancy and improve growth and development during the first years of life.

The Technical Advisory Group (TAG), established by the Pan American Health Organization (PAHO) in 2001, has accompanied this process and has contributed to identify the achievements and challenges so the strategy can provide the best answer to the need of improving childhood health in countries and give special priority to the most vulnerable

population groups. In its periodic meetings, TAG, comprised of a group of experts with distinguished international trajectories in the fields of pediatrics, epidemiology, and public health, has proposed recommendations to direct the activities that strengthen and expand the IMCI as a way for efficiently reaching the most vulnerable groups. These recommendations have served as basis to formulate regional plans and have contributed to give priority to those activities that could provide more benefits, in terms of strengthening and expanding the IMCI strategy at the regional level and in the countries of the continent, particularly in those countries with high childhood mortality rates.

TAG's third meeting has allowed the consolidation of the group's work in supporting the IMCI strategy and identifying new approaches and lines of action that could favor an effective application of the available interventions for child survival and a healthy growth and development during infancy. The TAG has specially reinforced the necessity and importance of accelerating the effective application of the new components that were developed to complement the strategy contents and has emphasized the key role that the effective application of the peri-neonatal component has in reducing childhood mortality, committed by the countries in MDGs by 2015. Likewise, TAG has emphasized the importance of other components such as the early detection of developmental disorders and of early stimulation. Both will complement the efforts directed to child survival by improving infants' health and development.

Important changes have been registered in the epidemiological profile of childhood health during the last decade as well as in the ability of countries' health systems to respond. Likewise, an increasing number of interventions have been available for the prevention and control of illnesses and for

the promotion of childhood health, making the selection work critical to obtain an efficient assignment of resources. In this framework, the periodic revision of the changing scenario on the part of the TAG is key to direct the technical

cooperation that PAHO provides to the countries in order to support the continuous improvement of health conditions and development during childhood.

Words from Mark A. Wallace, President, Chief Executive Officer, Texas Children's Hospital



It is my pleasure to welcome you and it is so very good to see so many familiar faces from the last time you were here and we are very pleased that you have chosen Houston, the Texas Medical Center and specifically Texas Children's Hospital to hold the meeting for the technical advisory group of PAHO again.

Certainly when you look at the goals of your group and the goals of PAHO I think you see a lot of symmetry and a lot of the same goals between your organization and Texas Children's Hospital. As I understand it one of the things that the technical advisory group tries to do is study health care systems at the local level as well as at the national level and to come up with some macro based recommendations in terms of how to improve the health for children in the Americas based on the systems at the local as well as the national level. Certainly that is the goal of Texas Children's Hospital. We have been doing that for a number of years, but particularly in the 1990's when we evolved from being just a large free standing not for profit children's hospital affiliated with Baylor College of Medicine into being a pediatric integrated delivery system. Certainly we think that the system that we have implemented at Texas Children's Hospital through our affiliation and partnership with Baylor College of Medicine has helped tremendously in providing additional access and coverage to the pediatric population that we are dedicated to serving from our position here in this community. The majority of our children do come from Houston and the surrounding counties; however, a great many of our children come from all parts of Texas. Each year we treat children from all 50 states and annually we treat patients from about 40 different foreign countries. Under

the medical leadership of Dr. Stein we implemented the international colloquium several years ago and in fact, this past year we celebrated our thirteenth international colloquium at Texas Children's Hospital and Baylor College of Medicine. Last year we had about 125 physicians, primarily pediatricians and pediatric sub-specialists, participate in that international colloquium and there were representatives from about 14 different foreign countries.

Certainly as we look at the pediatric integrated delivery system and as we look at the mission of Texas Children's Hospital, we don't just define it based on a local market place of Houston or even Texas. We really do try and take a global perspective and so here again I think it is always so fitting that the technical advisory group in PAHO has their meeting here at Texas Children's Hospital. You have seen Texas Children's Hospital grown tremendously in the last several years. Today we have over 700 licensed beds and we operate on a daily basis about 465. We have over 6,000 employees, about 1,400 physicians on our medical staff, and we have nearly 2 million patient encounters annually throughout our integrated delivery system, both in the primary care sector of the market place as well as the tertiary care of the market place. But healthcare for children in the United States and even here in this vast and wonderful Texas Medical Center it is grossly under configured. The problem with healthcare for children in the United States, around the world, and I'm sure in your respective regions and countries, is that children do not receive enough healthcare. They do not receive enough preventive care, primary care, secondary care or tertiary care. Certainly, one of the goals of the board of directors of Texas Children's Hospital, Dr. Feigin and mine is to create additional infrastructure so that we can enhance the access and coverage for children. One aspect of that program at Texas Children's Hospital is what

we call the generation to generation intellectual capital campaign where we are trying to recruit additional pediatric specialists and sub-specialists to come work at Texas Children's Hospital and Baylor College of Medicine so that we can provide better care as well as additional care to the patient population that we serve in Texas, the United States and indeed the world.

We again welcome you, we are delighted that you are here and we are honored by your presence; and if there is any-

thing throughout the course of your stay that we can do to make your conference more pleasurable and more enjoyable would you please let us know. Again, thank you for being here.

Mark A. Wallace
President,
Chief Executive Officer
Texas Children's Hospital

Words from Dr. Ralph D. Feigin, M.D., Chief Pediatrics Department, Baylor College of Medicine; Physician in Chief , Texas Children's Hospital



I would like to take this opportunity to welcome all of you to Texas Children's Hospital, the Texas Medical Center and to Baylor College of Medicine.

Two years ago I had the wonderful opportunity of addressing this group on the opening day of the meeting. At that time, I tried to outline what I thought were some rather interesting facts and figures. We are obviously in a wonderful era of medicine, which frequently is termed the "era of molecular medicine." We can do all kinds of wonderful things in terms of understanding the human genome. We are beginning to understand the function and interaction of each of the genes; we understand a little bit more about structural biology and neural networks and yet worldwide, including in the United States, we still have excessive numbers of children who are dying or who are disabled from treatable disorders or from diseases that could be prevented. In fact, if you look at the most prevalent or most important problems for the next decade on a worldwide basis, including in the United States, it continues to be to save people from malnutrition, to provide people with immunizations, and to reduce neonatal mortality rates. We do not do particularly well in that regard, despite all of the technological advances that we have made in trying to do things that we must do to treat or eliminate diseases, such as AIDS. Dr. Celine Hanson, who is here, has considerable experience with that.

I personally admire what each of you are doing and want you to know that we will do everything that we can to try and help you achieve your extremely admirable objectives.

You are sitting in a conference room in a building called the Children's Nutrition Research Center. As far back as 1964, the United States Congress passed a resolution that would authorize funding programs designed to improve our understanding of the nutrient requirements of pregnant woman, newborn infants, children and adolescents. They did not, in fact, fund this program until 1978. In 1978, a Request for Proposal was distributed by the United States Congress asking children's hospitals and medical school pediatric departments to respond, if they were interested, by submitting a research plan designed to determine normal childhood nutrient requirements and to prevent malnutrition, both locally and on a worldwide basis. This institution responded to that request. A total of 44 different institutions responded, and we were very fortunate to be selected for a site visit by a "blue ribbon" group from the National Institute of Child Health and Human Development led by the then director of that institute, Dr. Norman Kretchmer. They recommended that we be chosen to be the site of the only Children's Nutrition Research Center in the country. Funding began in 1979. It was a modest effort at first; however, by 1985 we had almost \$5 million a year of research money supporting our program, but we had insufficient space to carry out that programmatic initiative. The United States Congress then decided that for the program to fulfill its mission, the program would have to have a permanent home. This facility was funded as a partnership with the United States government, Texas Children's Hospital and Baylor College of Medicine. This building is devoted entirely to nutrition, one of our principal problems worldwide.

We have enormous resources here that can be used to support many of your endeavors. I am very fortunate to have 347 people in our department on our full-time faculty with

expertise in virtually every area. These include individuals such as Dr. Fernando Stein, Dr. Gerardo Cabrera-Meza, Dr. Celine Hanson and many others. I want to assure you that their expertise and help, and that of many others on our faculty, including myself, are readily available to you. In turn, we hope to learn lessons ourselves that can be applied to reduce mortality and morbidity in our country.

In closing, we welcome you and thank you for coming and if there is anything we can do to make your stay more enjoyable, please let me know.”

Ralph D. Feigin, M.D.

Chief Pediatrics Department, Baylor College of Medicine
Physician-in-Chief, Texas Children’s Hospital

2. Introduction

In the last decades of the 20th century, childhood health in the Region of the Americas has gone through important changes. Infant and childhood mortality was drastically reduced throughout the continent. The main causes of infant mortality were modified thus reducing the burden of infectious and respiratory diseases and increasing the relative importance of the peri-neonatal conditions, the first cause of mortality before the child reaches one year of age. During the last two decades, diarrhea and pneumonia ceased being the main causes of infant mortality. This fact increased the life expectancy in the Region of the Americas.

However, these achievements are not equally distributed in the continent or their countries. While many countries reduced their infant mortality to one half during the 90's, other countries registered a tendency to be stable or showed less drop than the one proposed at the World Summit for Children. Likewise, many countries registered an increase in the gap between their areas and population groups, as a result of the different mortality trends during the first years of life.

Countries are faced with the commitment of reducing mortality in children under five by two thirds by the year 2015, compared to values of 1990. But the different registered progresses at the regional level and within the countries make this a big challenge. In addition, the increasing gap between countries and their areas manifests the need to direct the interventions in order to reach the most vulnerable population groups and thus contribute to equity.

The Integrated Management of Childhood Illness (IMCI) is one of the key strategies to guaranteeing that children will benefit from key interventions that have shown its impact in achieving child survival and improving growth and development during the first years of life. Because of this, the Pan American Health Organization/ World Health Organization

(PAHO/WHO) has continuously supported its adaptation and later implementation in the Region of the Americas.

It is still a big challenge for the countries to reach all children and their families and provide them with the IMCI benefits. This challenge requires strengthening and accelerating the expansion process in order to reach the most vulnerable groups. It's in these groups—in which mortality caused by diarrhea, respiratory illnesses and malnutrition continues being the cause of more than 30 percent of children's deaths—where IMCI can play an important role in the prevention, early detection and effective treatment of those illnesses.

However, the IMCI can contribute to an important reduction in mortality in the rest of the countries and their areas. The IMCI, through the inclusion of new components like the one directed to the detection and prevention of illnesses during the perinatal/neonatal period, can contribute not only to reduce deaths that occur before the first month of life, but also to improve health conditions of newborns by providing them with better possibilities to a healthy growth and development during their childhood. These benefits are also reinforced through other additional components such as the one directed to early detection of developmental conditions, and to the promotion of early stimulation during the first years of life.

In this framework, it becomes a priority that the IMCI benefits reach all children in the continent. Further still is having these benefits reach the most vulnerable groups to contribute to equity.

During recent years, the Technical Advisory Group (TAG) of the IMCI, established by the PAHO in 2001, has been supporting this work. TAG has contributed to the identifica-

tion of activities and lines of work that strengthen the strategy and thus help broaden their perspectives and link them to child survival interventions and contribute to a healthy growth and development during childhood. With this, the IMCI strategy gained strength at the regional and country

levels, and increased its potential to improve health conditions during infancy through improving health workers performance and current family practices for caring children at home.

3. Meeting Objectives

- ✦ Analyze the perspectives of the Region of the Americas to achieve the MDGs related to mortality in children under five years; and the contribution of the IMCI strategy and its perinatal/neonatal component.
- ✦ Analyze the progress in the incorporation of the IMCI strategy in the pre /post degree teachings and identify the key factors that may contribute to guarantee that all students and graduates have the knowledge and necessary practices for its effective application.
- ✦ Formulate recommendations and proposals to strengthen the implementation and the expansion process of the IMCI strategy through health services and particularly, through the family and the community.



4. Current health conditions and perspectives on the Millennium Development Goals related to childhood mortality in the Region of the Americas

Dr. Yehuda Benguigui, Unit Chief, Child and Adolescent Health (CA),
Family and Community Health (FCH), PAHO/WHO

CHILDREN'S HEALTH CONDITIONS IN THE REGION OF THE AMERICAS

At the beginning of the third millennium, childhood mortality continues to be one of the main challenges faced by countries to guarantee to their populations adequate health and development conditions. The Pan American Health Organization (PAHO) estimated that in 2002 approximately half a million children died because of illnesses or health conditions during their first five years of life in the Americas. Most of these deaths could have been avoided through the application of preventive measures or early treatments proven effective and low in cost. Indeed, the application of these actions has avoided countless deaths in the countries of the continent but there are still many children who have no access to these benefits and keep suffering from these illnesses and health problems.

This situation manifests the current unequal distribution of knowledge and technology, which indeed benefit children who live in the continent. As a result, there is an unequal distribution of mortality during the first five years of life, as well as different reasons why children under five years of age die in these countries.

The infections and respiratory diseases, perinatal and neonatal conditions, and malnutrition, are still causing two thirds of the deaths in children under five years of age living in the

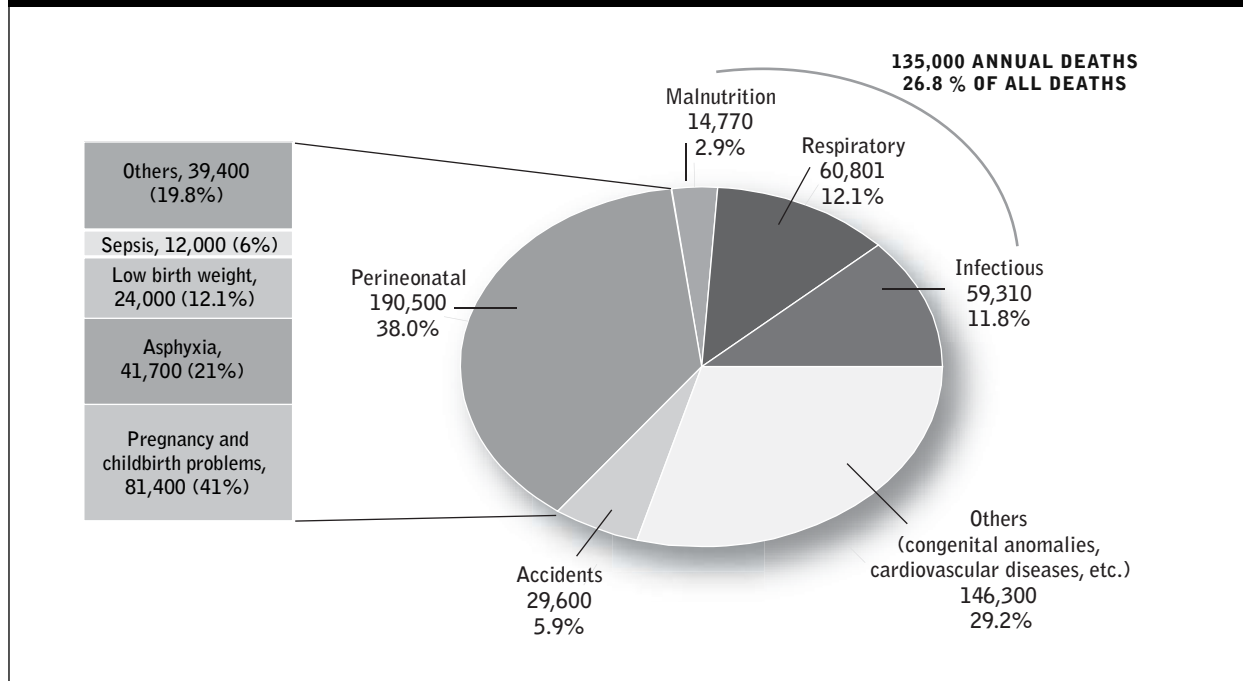
continent (Figure 4.1). This represents a change in what occurred a decade earlier when the infectious and respiratory diseases and malnutrition were the cause of 35 percent, or more, of mortalities during the first years of life. However, these conditions are still causing 100,000 annual deaths in children of the same age group, representing 27 percent of total annual deaths of the group.

Simultaneously, with the drop of mortalities due to infectious and respiratory illnesses and malnutrition, the peri-neonatal conditions emerged as the main cause of mortality representing almost 40 percent of deaths in children under five years, and more than 60 percent of deaths in children under one year old, in the Region of the Americas. Approximately 80,000 of annual deaths, most of which occur during the first week of life, are caused by asphyxia at birth, low weight, and sepsis. Most deaths that occur during the peri-neonatal period are due to complications and health problems that arise during pregnancy, representing 41 percent of deaths.

In this way, the current distribution of causes of mortality in children under five years gives the Region of the Americas an epidemiological profile of transition with most deaths caused by the co-existence of infectious and respiratory illnesses with peri-neonatal conditions.

Just as there are differences on why half a million children under five years who live in the continent die annually, there

FIGURE 4.1. Main causes of mortality in children under five in the Region of the Americas
Estimates 2002



are also differences in the distribution of deaths among countries. While in three countries of the continent (Canada, Cuba and the United States) mortality in children under five years is less than 10 per 1,000 live births, in three others (Haiti, Bolivia and Guyana) the rate is over 70 per 1,000 live births, which means that the risk of dying during the first five years of life is 7 times greater in these countries than in those with low rates.

Countries with higher risks of dying during childhood contribute to 10 percent of annual deaths in the continent, even though they only contribute to 3.5 percent of births. Fifty nine percent of deaths in children under five years occur in countries with a mortality rate between 40 and 49 per 1,000 live births (Figure 4.2). This group of 14 countries, together with those with rates of 50 per 1,000 or more live births contributes to 85 percent of the annual deaths of children under five years in the Region of the Americas.

In addition to the importance that the perinatal and neonatal conditions have in the mortality, these health problems may affect the child's growth and development permanently.

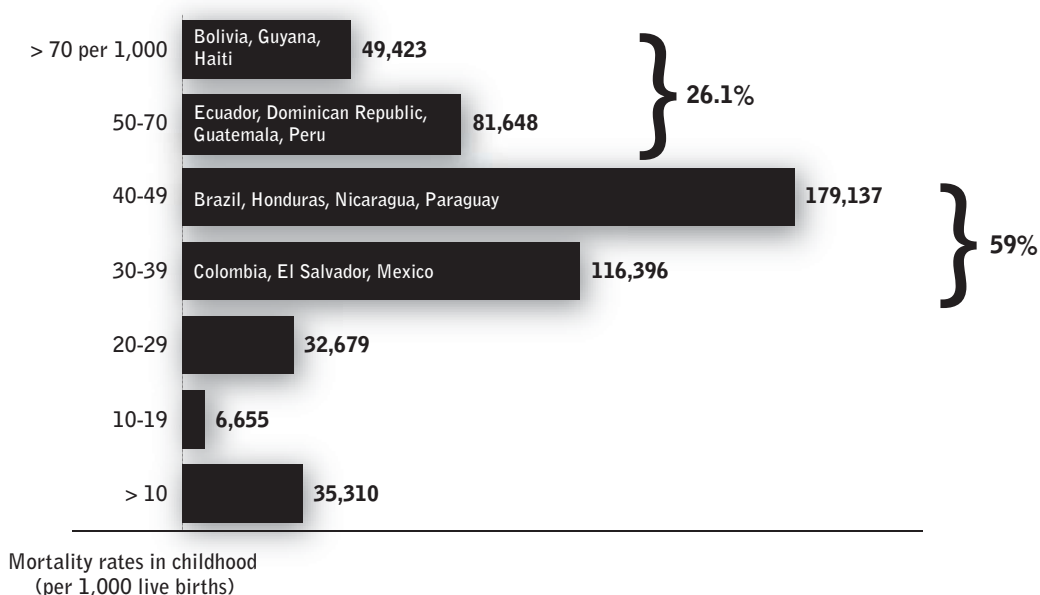
Peri-neonatal conditions like low birth weight, for example, constitute a risk factor to having greater and serious bouts of illnesses during childhood and bring delays in the child's growth and development. Asphyxia at birth can bring serious neurological damage and may impact their growth and development later in life. Likewise, neonatal sepsis may cause serious and irreversible damage that may condition the child's life.

After the neonatal period, children's health is affected by respiratory illnesses and to a lesser extent by diarrheal diseases. Population surveys reveal that almost half of children under five suffer from monthly respiratory and diarrheal diseases, that affect their healthy growth and development. In addition, taking care of these illnesses increases the direct and indirect costs paid by the family and sometimes can cause additional complications as a result of improper or dangerous use of medicines or home treatments.

Malnutrition is one of the consequences of frequent bouts of illnesses during childhood due to the fact that sick children lose their appetite and because some families restrict feeding the child when they are sick, particularly when they

FIGURE 4.2. Mortality in children under five years in the Region of the Americas
2002 Estimates

Distribution of deaths from countries ranked according to its mortality rate in children under five, per 1,000 live births.



suffer from diarrhea. A poor diet or lack of it are also factors that determine high levels of malnutrition during the first years of life. This not only represents a risk factor to having more and serious illnesses, but also delays their cure.

Aside from these illnesses, which are recognized as being the main problems affecting childhood health, there are other chronic; endocrine and neurological illnesses that are acquiring importance as a reason for parents seeking care to health services in the Americas. For example, obstructive respiratory diseases like asthma or bronchial obstructive syndrome currently represent between 5 to 10 percent of ambulatory care and an even larger number of pediatric hospitalizations.

In many countries, growth delays in children is frequently discovered in ambulatory care and is attributed not only to physical damages but also to the lack of early stimulation, thus delaying the age when children acquire motor, speech and conduct skills.

Likewise, non-intentional injuries are the main cause of

death after the first year of life in many countries. In others, it is the number of children who suffer from domestic violence, abandonment or sexual abuse is increasing and is becoming a public health priority to guarantee a healthy infancy and childhood.

The factors that underlie the current health conditions of children living in the Americas are diverse. Their importance varies according to the country and areas inside of them. However, it can be assumed that currently there are thousands of children who die or lack the necessary conditions for proper development and growth because they do not receive a group of key practices, which if applied at home, in the community and through health services, may contribute to preventing and treating diseases as well as promote good health.

Although exclusive breastfeeding is recommended for infants until the age of six months, community surveys performed in five countries of the Americas between 2000 and 2002 revealed that less than 80 percent of infants under two months and less than 60 percent of those under four

months, were exclusively breastfed. In some countries, only 20 percent of those under two months received exclusive breastfeeding. And in four out of the five countries the number of children under four months who received exclusive breastfeeding was lower than 15 percent.

In some countries parents complying with treatments recommendations from health workers was poor when they were evaluated at the end of the recommended period. A study done in Brazil revealed that less than 40 percent of children who had received antibiotics for pneumonia had gone through the appropriate treatment, in terms of dose, number of doses, and duration of treatment. The highest percentage of children, 52.7 percent, received less than the recommended antibiotic dose either because they received a low amount per dose, less doses per day, or had fewer days of treatment.

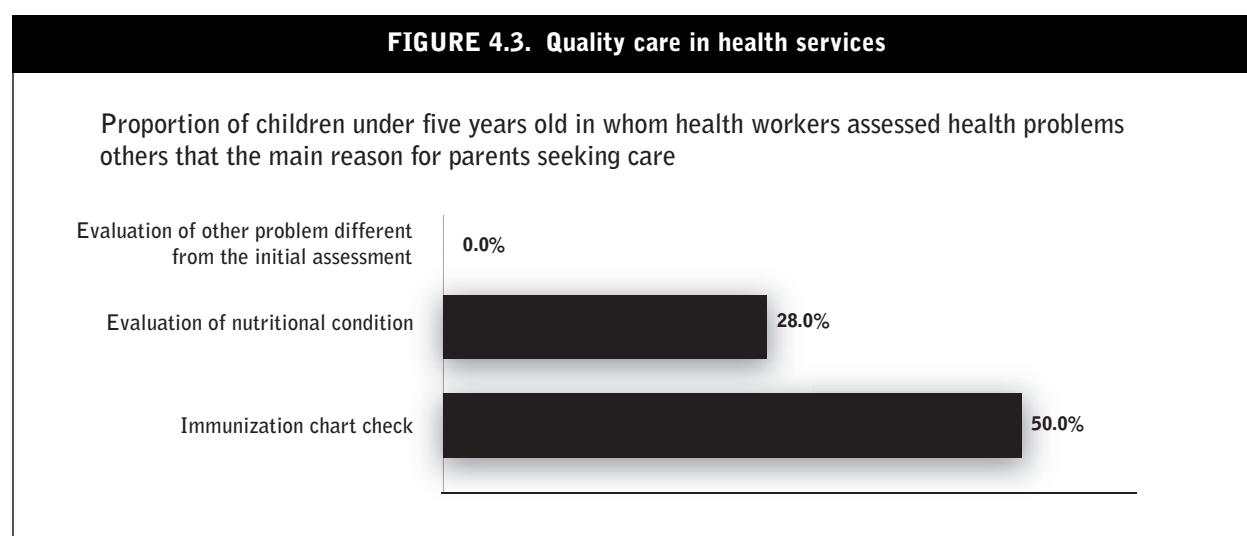
Lost opportunities for detecting and treating other health problems are observed in health services (Figure 4.3). A survey performed in Bolivia revealed that of those children under five years who were seen, none went through personnel evaluation for other possible illnesses; besides the parents' reason for seeking care, only 28 percent of children were assessed for checking their nutritional condition, while 50 percent were checked to see if their immunization chart was up to date.

Deficits in the quality of care are not only observed in primary health care services but also in those hospitals where

children with serious illnesses were referred. The lack of standardized criteria for the evaluation, classification and treatment and follow-up of the diseases that most often affect children under five years determines that many of them are not receiving adequate treatment—thus aggravating and complicating their condition and delaying the recuperation of their illness. Long hospital stays become a complicated issue for children since they are at greater risk of being exposed to hospital infections.

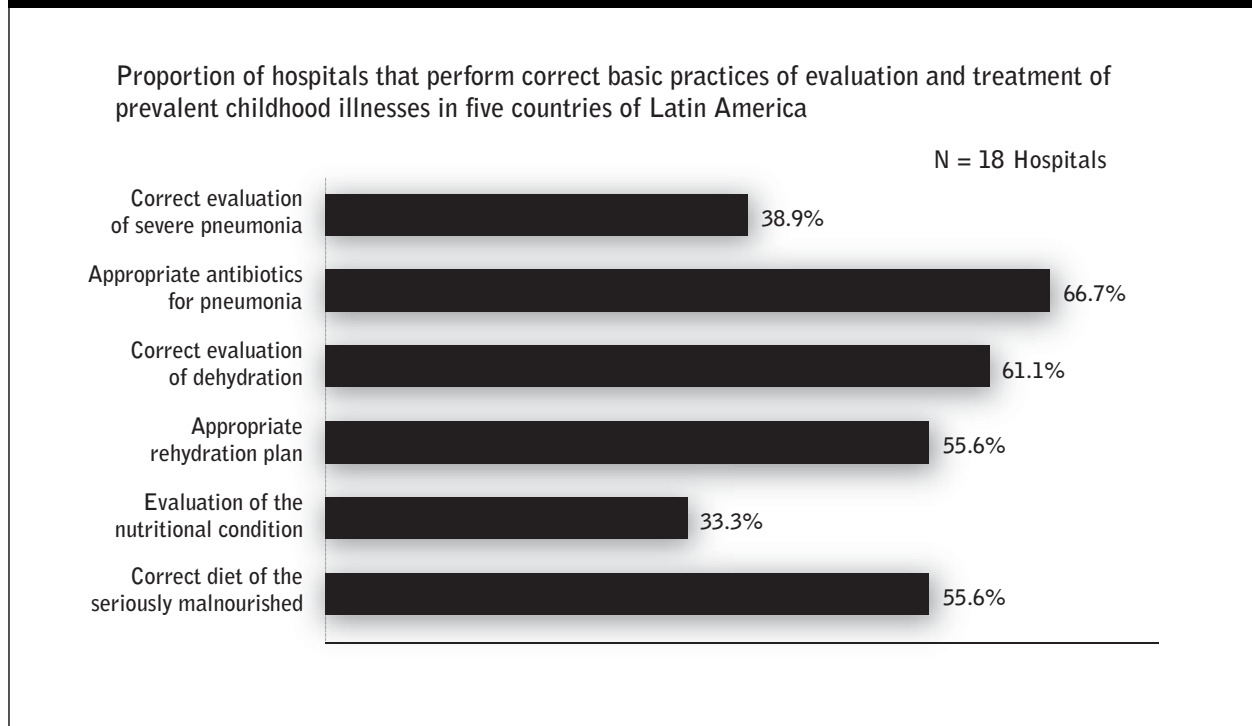
A study of eighteen primary care hospitals in five countries of the Americas revealed that less than two thirds complied with the appropriate criteria for the evaluation of most frequent diseases, selection and use of antibiotics, rehydration in case of diarrhea, nutritional evaluation and correct diet in serious cases of malnutrition (Figure 4.4).

In this way, children's lack of access to care and basic measures to prevent and treat their illnesses and protect their health is not only a given in their homes and communities but also at the primary health care level and in the hospitals. Every day, thousands of opportunities that favor growth and development in children are lost due to a lack of basic care implementation that may contribute to saving a child's life, reduce the number of bouts of illnesses or decrease the seriousness of an illness.



Source: Health Service survey performed by BASICS in the Altiplano Valle Sur, Valles Cruceños and Chiquitania Centro, Bolivia, 1997.

FIGURE 4.4. Quality care in health services



Source: Survey in hospitals in Argentina, Brazil, Ecuador, Peru and Uruguay, 2001-2002.

ACHIEVEMENTS AND OUTSTANDING MATTERS RELATED TO CHILDHOOD HEALTH IN THE REGION OF THE AMERICAS

Although there are half a million children under five years who die annually in the Region of the Americas, the mortality rate in this age group, between 1990 and 2002, decreased to 25 percent. This reduction was mainly due to the fact that there were fewer deaths caused by infectious and respiratory diseases and malnutrition. These diseases, that were first responsible for 40 percent of deaths of children under five years in 1990, were later responsible for 27 percent of deaths in 2002. During the last decades, reduction in mortality for these causes has been an important contribution to increase for life expectancy in the Americas.

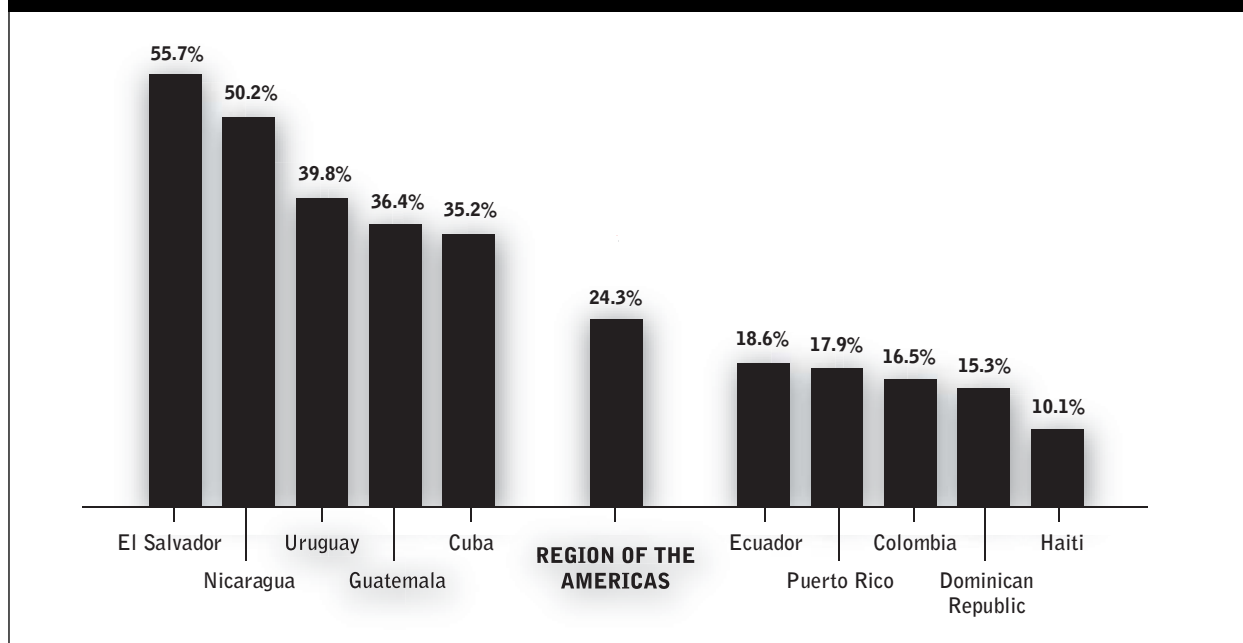
However, not all countries benefited equally from these achievements. Many countries in the Americas were not

able to reduce their mortality in children under five years by one third, as proposed at the World Summit for Children, between 1990 and 2000. While some countries got to exceed this reduction and reached mortality rate drops of 56 percent lower in 2000 than in 1990; in other others, the drop during the last decade was less than 20 percent and only up to 10 percent (Figure 4.5).

As a result of the different drops in mortality rates for children under five years who live in the Americas, the gap among countries increased by 15 percent between 1990 and 2002. On one end, eleven countries where 38 percent of annual births occur contribute to 62 percent of annual deaths of children under five, while eleven others, where 38 percent of births occur contribute only to just 15 percent of deaths in the continent.

The different proportional contributions of the countries in terms of births and deaths show less risk of dying during the first five years of life in some countries while not in others,

FIGURE 4.5. Differences in the average reduction of mortality in children < 5 from 1990 to 2000.
Selected countries



where there are higher mortality rates and child survival continues to be a part of the unfinished agenda.

PERSPECTIVES

Though the Region of the Americas contributes to about 5 percent of annual deaths of children under five years in the entire world, the majority of these deaths could have been prevented or avoided. It is estimated that 75 percent of death in children under five years is caused by conditions associated to the peri-neonatal period and to respiratory, diarrheal diseases and malnutrition that continue causing more than one hundred thousand children deaths per year in the Region of the Americas.

This situation reinforces the importance of focusing, even with more energy, on the cause of child survival, considered to be one of the most important pending matters of the 20th Century and one that should be of high priority for the governments during the upcoming years. This challenge has been incorporated into the MDGs committed to

be achieved by all countries to improve health and world development.

In keeping with these objectives, the countries must, in the coming years, double their efforts so that in 2015 mortality in children under five is two thirds lower than in 1990. The IMCI strategy, which emerged as the main intervention to achieve the World Summit for Children Goals continues to be a key intervention to achieve the MDG's

Despite the fact that the primary contribution of the IMCI will be to reduce mortality in children under five years, its implementation will also support countries in their actions to achieve other MDGs.

IMCI will contribute to achieve the MDG 1, objective number 2, directed to reduce hunger and to improve nutrition in the population, through improving parent's feeding practices and early detection and treatment of low-birth weight and malnutrition.

The new peri-neonatal component of the IMCI, which contemplates actions to strengthen early detection of pregnan-

cy, safe conditions for delivery, and adequate follow-ups during post-partum, will also contribute to achieve MDG 5 and 6, directed to reducing maternal mortality in the countries.

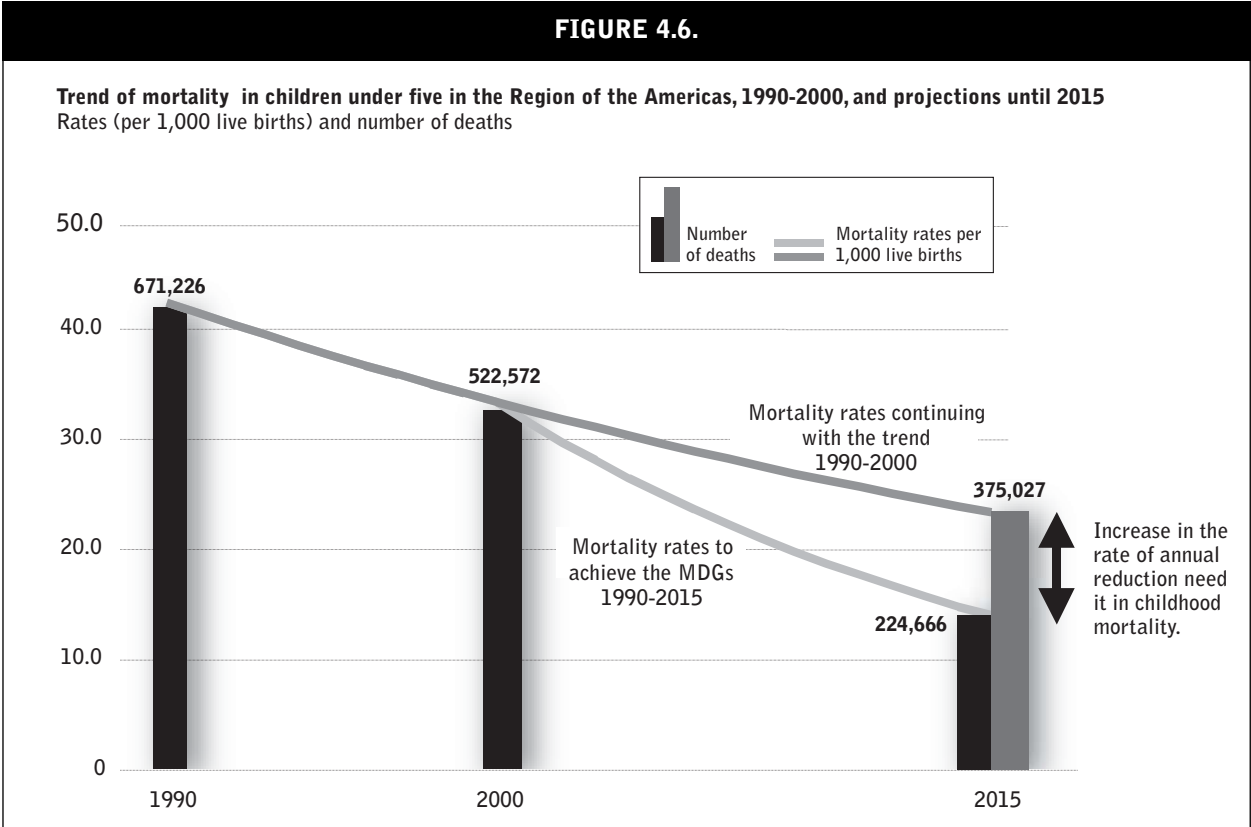
Finally, the peri-neonatal component of the IMCI will also contribute to lowering the vertical transmission of Human Immuno-Deficiency Virus (HIV) infection, which the countries have committed to achieve in the Millennium Development Goal 6, objective number 7 and 8.

However, the achievement of the MDGs related to child mortality will require a considerable effort since some countries in the Americas did not get the expected one third reduction during the 90's. Assessments performed by the PAHO show that a drastic drop in mortality in children under five years is required between 2000 and 2015 for its value in the latter year to be of two thirds lower than the one registered in 1990 (Figure 4.6). If the tendencies of the 90's continue, however, this goal will not be met and there will be 150, 000 more deaths than expected.

To achieve this increase in mortality rate drops while at the same time contribute to narrowing the gap among countries and obtaining more equity in infant health, it is necessary to adopt combined approaches that deal with the main causes of deaths in children under five years and focus the actions towards countries with higher mortality rates and to those with more number of deaths.

In terms of causes of death, it is necessary to provide an answer to the prevention and treatment of respiratory and infectious diseases and to malnutrition, which continue to cause 27 percent of mortality in children under five years. It is also necessary to provide an answer to other problems including the peri-neonatal conditions that are of utmost importance since they cause 40 percent of deaths.

In terms of risks and number of deaths, the actions should be focused by taking into account that countries with mortality rates of between 30 and 49 per 1,000 live births contribute to more than half of the annual deaths in the Region of the Americas (Figure 4.7). This implies that the regional



effort, directed to strengthen the implementation of the IMCI in the five priority countries of PAHO and in the rest of countries with mortality rates of 50 or more per 1,000 live births, should be complemented with actions towards countries with lower mortality but that because of their population size, contribute to an important number of deaths to the region.

The analysis of the conditions inside of these countries will help identify the areas of high risk for childhood survival and will contribute to health equity among infants.

ACTIONS

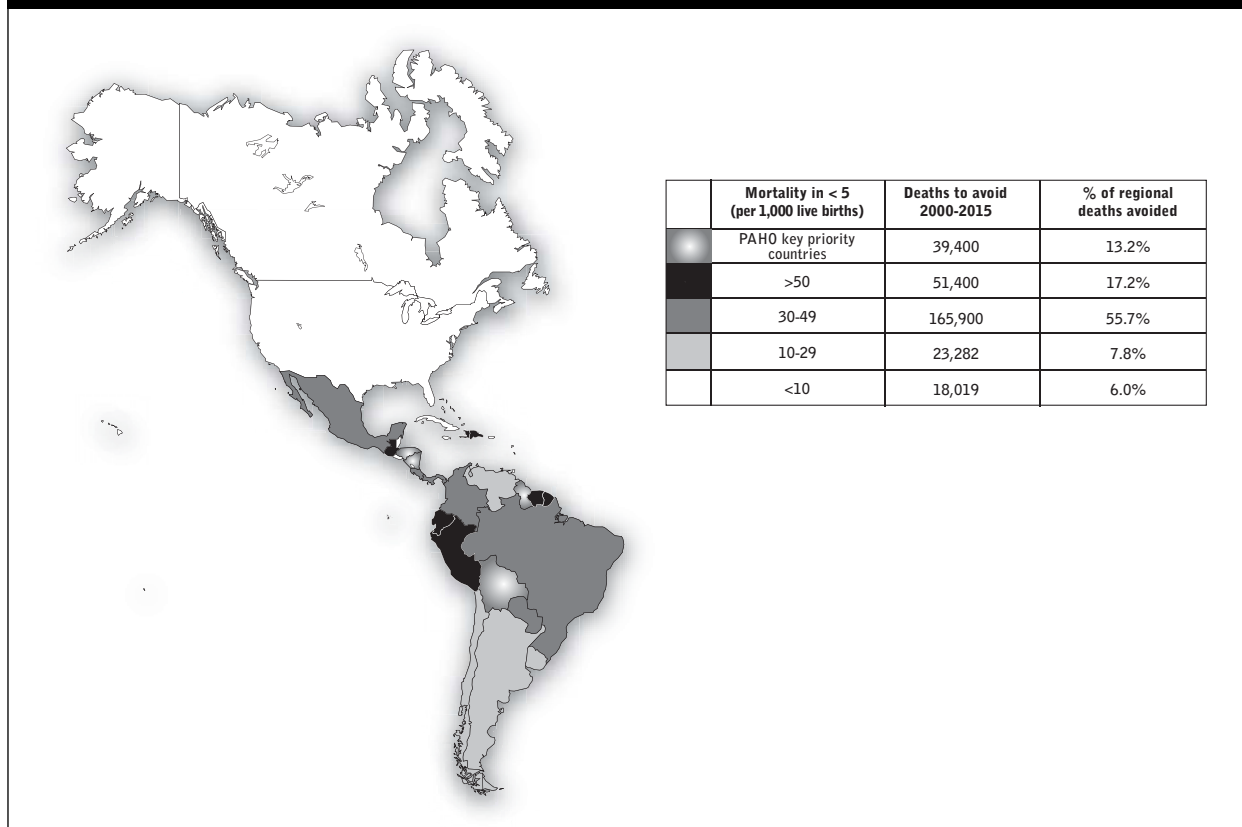
To carry out these interventions simultaneously will require the mobilization of wills and resources beyond the health sector, as part of the social commitment in favor of the MDGs communitied by 2015. The governments, the scien-

tific and academic institutions such as the universities, and population empowered through actions like the community component of the IMCI, which focuses on the family as the basis for promoting health, and social development must all get involved with these efforts.

This inter-sectorial task should contemplate the identification of the most vulnerable groups to be able to direct the actions in search for more equity; this will require strengthening the information systems at the local and national levels in order to allow mapping the risks that are affecting the populations and through them, identify the groups who need the most care.

Based on the epidemiological profile of mortality and morbidity, there should be a faster implementation of the IMCI and its complementary component, including the one directed to the prevention, detection and treatment of peri-neonatal conditions, which cause high numbers of deaths during

FIGURE 4.7. Contribution of the countries to achieving the Millennium Development Goals ranked according to its mortality rate in children under five



the first month of life. Other components will also be key to providing care to those children who survive in order to guarantee them with a healthy growth and development.

To perform this task, and to speed the time of its execution, it is necessary to conduct national and local processes of planning, of follow-up and assessment. These processes will allow a more efficient use of the available, but limited, resources as well as identify problems to quickly proceed to the design and implementation of appropriate solutions.

The processes of planning of expansion and strengthening of the IMCI should contemplate the incorporation of the strategy among universities and all academic institutions that are responsible for the training of health personnel. This can bring about immediate results through graduate students and other students who are working towards their mandatory year in the community, and later guarantee that all future graduates will be trained to apply the IMCI in their care practice.

Through its community component directed to improving the care practices and care of children under five years, the IMCI can also contribute to improve the growth and development of children at home as well as in other health care fields. Included in these are day care centers and nurseries, adopted homes, community and family diners, and other places where children live, play and grow.

To direct this process of strength and expansion of the IMCI, it is essential to adopt the IMCI as one of the key strategies for achieving the MDGs. These MDGs should, at the same time, be adopted as children's health national policy. Consequently, through regional efforts for narrowing

the gap among countries each of them should conduct analysis processes of childhood health inside their countries and identify the areas and population groups with more mortality levels. If activities are directed efficiently, the countries will contribute to greater equity in children's health conditions.

A special emphasis should be given to the spread and application of the IMCI at the family level, not only for its direct benefits regarding children's health but also for the power that this will bring to act like active agents of change in children's health.

The IMCI application on the family will contribute to bring key preventive measures against infectious and respiratory diseases and accidents, and prevent environmental risks to the child's health. The application of the IMCI will also contribute to the promotion of healthy behaviors, adequate care and nutritional practices and to the early stimulation of children at the home.

The use of the IMCI by families will also contribute to prevent domestic violence and child abuse. It will also improve the family and parents' knowledge regarding danger signs to be aware of for urgent looking for help outside the home; it will also strengthen the fulfillment of treatments and controls recommended by health personnel.

To obtain the MDGs, all children should have access to the appropriate basic care. This is especially important for those who live in the areas and groups that are most vulnerable. The IMCI is a key strategy to achieve this and the families are key partners in making the IMCI an essential part of their primary health care.



5. Progresses in the peri-neonatal component

Dr. Rolando Cerezo and Dr. Gerardo Cabrera Meza, FCH/CA Advisors. PAHO/WHO

INTRODUCTION

In an epidemiological transition context, the efforts directed to child survival for achieving the Millennium Development Goals (MDG's) should cover, at the same time, the prevention, and treatment of infectious diseases as well as the peri-natal and neo-natal conditions, which together cause 67 percent of mortality in children under five years in the Americas. In addition, in order for these efforts to contribute to equity, it is necessary to focus on countries and population groups that are harder to reach so as to reduce the current gaps. Finally, to have better survival in children and better conditions in children's health it must be necessary for these efforts to also contemplate the promotion of healthy environments, thus strengthening the focus on the family and the community.

The Integrated Management of Childhood Illness (IMCI) that was approached in the last decade mainly because of the reduction of mortality by infectious and respiratory diseases and malnutrition, is considered an adequate strategy to contribute to child survival in the current epidemiological transition context. By incorporating additional components such as the neonatal and by reinforcing its application to reach the most vulnerable groups, the expansion and strengthening of the IMCI will contribute to the sustainable progress towards the achievement of MDGs in the countries of the Region of the Americas with equity.

The trend observed in mortality in children under five years and in infant mortality during the 90's manifests that by following that annual rate of reduction, the goals proposed in

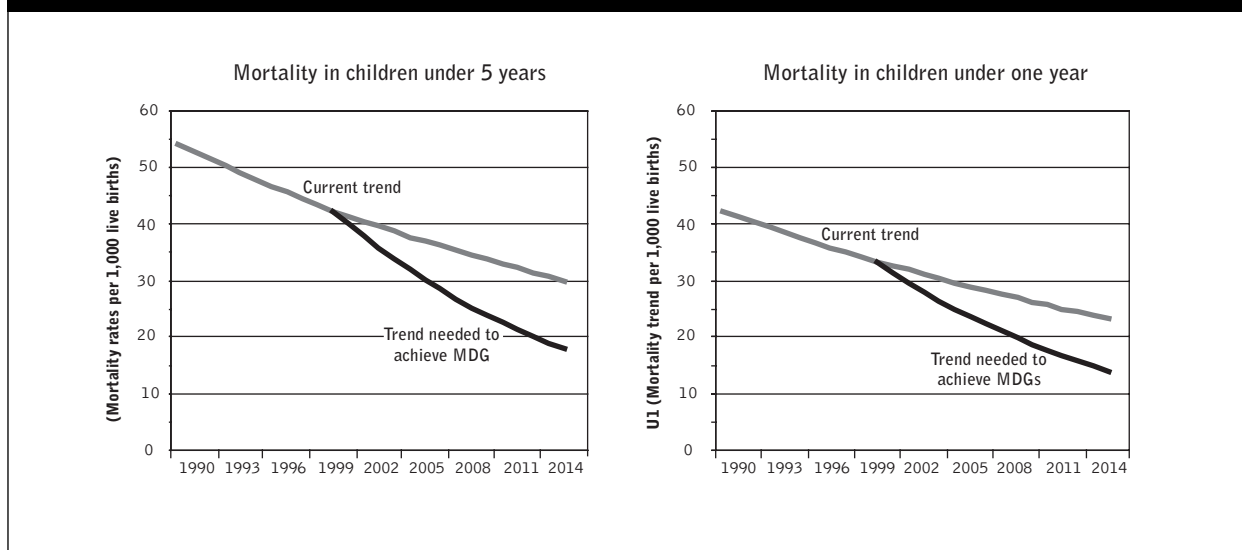
the MDGs will not be achieved by 2015 (Figure 5.1). The difference between the projected trend if the current annual rate of reduction continues compared to the one necessary to achieve the MDGs is greater for mortality in children under one year, which reinforces the importance to strengthen the interventions directed to prevent deaths during this period.

With the drop in mortality due to diarrheal diseases and to acute respiratory infections that were registered in most of the countries, the perinatal conditions increased their importance as the cause of mortality in childhood and came to be the main cause of mortality in this age group in the Region of the Americas. In this way, the interventions directed to prevent deaths from these conditions are key to accelerating the drop in mortality in children under one.

In this context, it becomes a priority to have interventions for prevention of risks in the peri-natal and neonatal period as a component of the IMCI, particularly when taking into account the contribution it may bring to child survival in all countries of the continent.

The inclusion process of the peri-neonatal component is complementary to the one already developed by the countries during the last years of the 90's for the adaptation and implementation of the IMCI strategy. In the first place, it will require that the Health Ministries of each country consider the perinatal and neo-natal mortality as an issue. Also, and as part of an answer to this problem, they must analyze the contribution that the peri-neonatal component of the

FIGURE 5.1. Childhood Mortality: Trends 1990-2015: Latin America and the Caribbean



IMCI can bring, by taking into account how it gets integrated with the rest of the interventions on for child survival and for healthy growth and development during childhood, and to the ones directed to improve women's health, including reproductive and prenatal health, and proper care during pregnancy, labor and puerperium.

On the other hand, the peri-neonatal component of the IMCI has been thought out in a generic way with the participation of experts and specialists of numerous countries of the Region of the Americas and of other regions, thus it is recommended to adapt its contents according to the epidemiological and operative reality of each country. Just like the implementation process of the IMCI strategy, an adaptation to the generic proposal of the peri-neonatal component is key to guaranteeing that their technical contents are the most appropriate for the epidemiological profile and the operative conditions of the countries.

Once the adapted version of the peri-neonatal component is available, it can be presented to professionals, institutions and organizations. Later, they will have a key role in its application, making it possible to reach a national consensus on the importance of this health problem and on the role that the proposed strategy has to its control. This national presentation of the peri-neonatal component of the IMCI will also contribute to form a broad support

group for the process of implementation which will include not only specialists of different fields responsible for prenatal and perinatal care, but also all those in charge of the management of programs and activities such as training of health workers, gathering and analyzing information, research, education, and social communication.

The formation of this broad group of professionals will make it easier to implement the peri-neonatal component by generating conditions of basic support to the initial activities of this component. For this, countries could take advantage of the experience in the initial introduction of the strategy, which took into account the implementation of the strategy in small areas. The same criteria, which contemplated both epidemiological considerations related to the high mortality and morbidity rates and the operative considerations that guaranteed availability of supplies and basic structures to put the strategy into effect as the ones used at the start of the implementation process of the IMCI can be used to choose these areas.

With regards to the peri-neonatal component, it is expected that the initial areas of implementation can combine both criteria by choosing those places that show a high peri-neonatal mortality rate and have the necessary resources to applying the component, including human resources, physical infrastructure, essential supplies, and

reference and contra-reference systems between primary care levels and one or more referral hospitals.

PROGRESSES IN THE INITIAL IMPLEMENTATION OF THE NEONATAL COMPONENT: WORKSHOPS AND CLINICAL TRAINING COURSES

The first meeting on the perinatal and neonatal component of the IMCI was held in Rio de Janeiro in September 2000 with the participation of 26 perineonatologist and neonatologist professionals. After this, the first generic version of the peri-neonatal component of the IMCI was developed. Several field-test and further reviews were conducted with the first version during 2001 and 2002. This process of revision and application of the component has, in reality, allowed adjusting its content to include interventions such as prevention, early detection and effective treatment of the conditions that most frequently affect health during pregnancy, labor, childbirth, and the first weeks of life.

Along with the revision and validation process of the generic version, the countries were starting to go forwards in the adaptation of the peri-neonatal component to the epidemiological and operative reality of each of them. This process allowed to speed up the process and to have the final generic version enhanced by experiences and field tests from several countries. It also allowed the countries to move faster in the adaptation and implementation without prior use of the regional generic version.

In addition, due to the high participation of professionals and specialists from the countries, the design and test of the peri-neonatal component was, at the same time, useful in shaping and strengthening a critical and broad group who participated in country as well as in regional activities to support other countries in carrying out the local adaptation and later implementation.

As a result of these activities, training workshops of the peri-neonatal component were held in ten countries (Dominican Republic, Paraguay, Bolivia, Peru, Ecuador, Nicaragua, Colombia, Panama, El Salvador, and Honduras)

until March of 2004. Clinical training courses for health department personnel in seven countries (Argentina-Santa Fe-, Dominican Republic, Peru, Bolivia, Ecuador, Paraguay and Guatemala) also took place. These activities were complemented with workshops that presented the neonatal component during Pediatric and Perinatal Medicine Conferences, which took place in many countries of the region. This helped spread and emphasize the importance that perinatal conditions have in mortality so countries can meet their goals by 2015.

A workshop was held in 2004 as part of the International Colloquium that takes place at the Texas Children's Hospital of the United States. Around 140 professionals of different countries in Latin America attended the workshop. Its goal was to spread the importance that perinatal conditions have in mortality as well as to present the peri-neonatal component of the IMCI as an appropriate answer for its control.

COOPERATION STRATEGIES

The broad mobilization of professionals and institutions involved in the interventions of peri-neonatal health that took place during the design, revision and field test process of the peri-neonatal component of the IMCI allowed to identify numerous initiatives both at the national and regional levels. In this way, the international cooperation was strengthened not only in relation to the technical and professional support regarding the content of the peri-neonatal component, but in the progress of identifying group work areas for accelerating the implementation of the specific interventions and integrating them as part of the IMCI.

Partnerships that contemplate the coordination of projects and initiatives intended for improving prenatal and perinatal care were made with the Association of Latin American Pediatric Association (ALAPE), the Church of Jesus Christ of Latter-day Saints (Latter Day Saint Charities), the American Academy of Pediatrics (AAP) and the Sugar, Temperature, Airway, Blood Pressure, Lab work,

and Emotional Support (S.T.A.B.L.E.).

As part of these partnerships, a series of courses have been held in neonatal resuscitation and IMCI neonatal in Guatemala, Ecuador, Honduras, Dominican Republic and El Salvador; additional courses have been scheduled in Nicaragua, Panama and Paraguay during 2004.

The effort performed in the Region of the Americas also reached to other regions in part as a result of the coordination that took place during the design, revision and field test process of the peri-neonatal component. Many representative of countries participated in this coordination. Thus, cooperation to the MDGs is currently being provided to incorporate the neo-natal component in the regional programs.

GENERIC MATERIALS

Currently, a generic material validated by most of the countries in the Region of the Americas is available; a progress of great importance. This material includes an IMCI manual for students that describe the strategy contents for the care of children starting from their birth up to five years old, thus covering the neo-natal period as well as the care of children over one month. The manual will be published by the PALTEX Series (The Expanded Textbook and Instructional Materials Program) of the PAHO and will be distributed among all countries of the Region of the Americas. The inclusion of this manual in the PALTEX Series will allow that in addition to being available in all countries at a subsidized cost it will also be accessible to medical students and to health services personnel.

Aside from the manual, a complete chapter of newborn care was incorporated into the handbook on the management of children with severe diseases or mal nutrition, which is being intended for hospital referral. This handbook, was adapted to the Region of the Americas from its original version from the WHO. It has been important in providing the countries with standardized and evidence based guidelines, to improve the quality of care in non-specialized hospitals

where children who are seriously ill are referred.

The use of this handbook in hospitals will reinforce quality care that is currently being provided by non-specialized hospitals during labor, childbirth, and reanimation of the newborn. The PALTEX Series will also publish this handbook for serious childhood illnesses.

The process of adaptation and incorporation of this material in the countries has been started by the Ministries of Health of Colombia, Guatemala, Honduras, and is about to start in the Dominican Republic.

Together with these materials intended for the use of health care services and personnel, an IMCI material of community neonatal was also developed and was presented at the first Regional Workshop for Latin America and the Caribbean "Strategies for Improving the newborn care in the community," that was held in Tegucigalpa, Honduras, on April 2004. As part of the elaboration process of this material, two field tests were planned for the Dominican Republic and Peru.

PERSPECTIVES

The IMCI strategy and its peri-neonatal component should be adequately and continuously tied to the strategy of Essential Obstetric Care, thus forming an integrated, easy, fast, continuous and operative process. The algorithms that are included in the application of these strategies direct health personnel to detect risk factors for mother and newborn health and facilitate the immediate and adequate decision to taking in mind the epidemiological conditions of each place and the operative conditions of work.

The application of these strategies and their expansion to reach population groups that are most vulnerable will allow the countries to provide the appropriate quality care that will contribute to reduce mortality and morbidity both in the mother and the child, as well as provide better health conditions for the mothers, children and their families, thus contributing to a healthy growth and development during childhood.

The incorporation of the IMCI strategy, including its peri-neonatal component, inside health schools' curricula will, in addition, reinforce the focus to the integrated care of the child through which in turn will benefit the population and improve the quality care that the personnel of health services provides. To do this, the schools will incorporate not only the contents of technical teachings of the IMCI and its peri-neonatal component, but also its practical application in the care and incorporation of its contents, to perform perinatology investigations and operative research in perinatology and neonatology that can contribute to a better understanding of the problem, and manifest the impact of the application of the strategies in reducing maternal morbidity and mortality in mother and child.

Thus, the introduction of the IMCI with its perinatal and neonatal component is an opportunity for the countries to update their guidelines and national policies regarding the integrated health care of mother and child and to have an effective integrated strategy to reduce mortality in children and achieve the MDGs. This process will contribute to strengthen the capacity and improve the work of health personnel in the perinatal and neonatal care and help make these benefits accessible to the most vulnerable groups not only through health services but also by involving the families and the community to continuously improve mother and infant.



6. Contribution of the community component of the IMCI strategy to achieve the Millennium Development Goals: Expansion Perspectives to include the IMCI peri-neonatal

Mr. Christopher Drasbek, Regional Advisor IMCI, FCH/CA, PAHO/WHO

INTRODUCTION



The contribution of the community component of the IMCI strategy is key to promoting healthy practices and preventing illnesses in children under five who live in most vulnerable families and with difficult access to the health services. To reduce in two thirds the mortality in children under five years during 1990-2015 depends in part on being able to strengthen the ties among the family, community and health services. Unfortunately, there are still a great percentage of these children who die before arriving to health care centers.

The community component of the IMCI strategy is based on skills and networks, generating a sense of belonging and local authorship both by identifying each family and community's health needs and identifying the strategies to resolve. The community component of the IMCI adopts and integrated approach whereby different groups contribute by using their many skills and resources. This also allows establishing pacts and new networks, which shared challenges that are key to a successful result. Strength of local skills is the basis for effective and sustainable interventions directed at reducing mortality in children and promoting family health in communities with limited resources and left out.

Within the community component of the IMCI strategy, the family health approach is essential. It is in this environment where children grow and are nourished with their culture, laws, and values. The behaviors and decisions of the parents directly affect the children's health. As children grow they continue adopting healthy or risky behaviors, influenced by the models and interactions that they receive from their families and close circles. Health risk exposure (e.g. environmental, infectious illnesses, of conduct) affects all members in the family. Instead, social support groups protect them. Evidence shows that families and communities that are provided with health information and health development skills demand better quality care services.

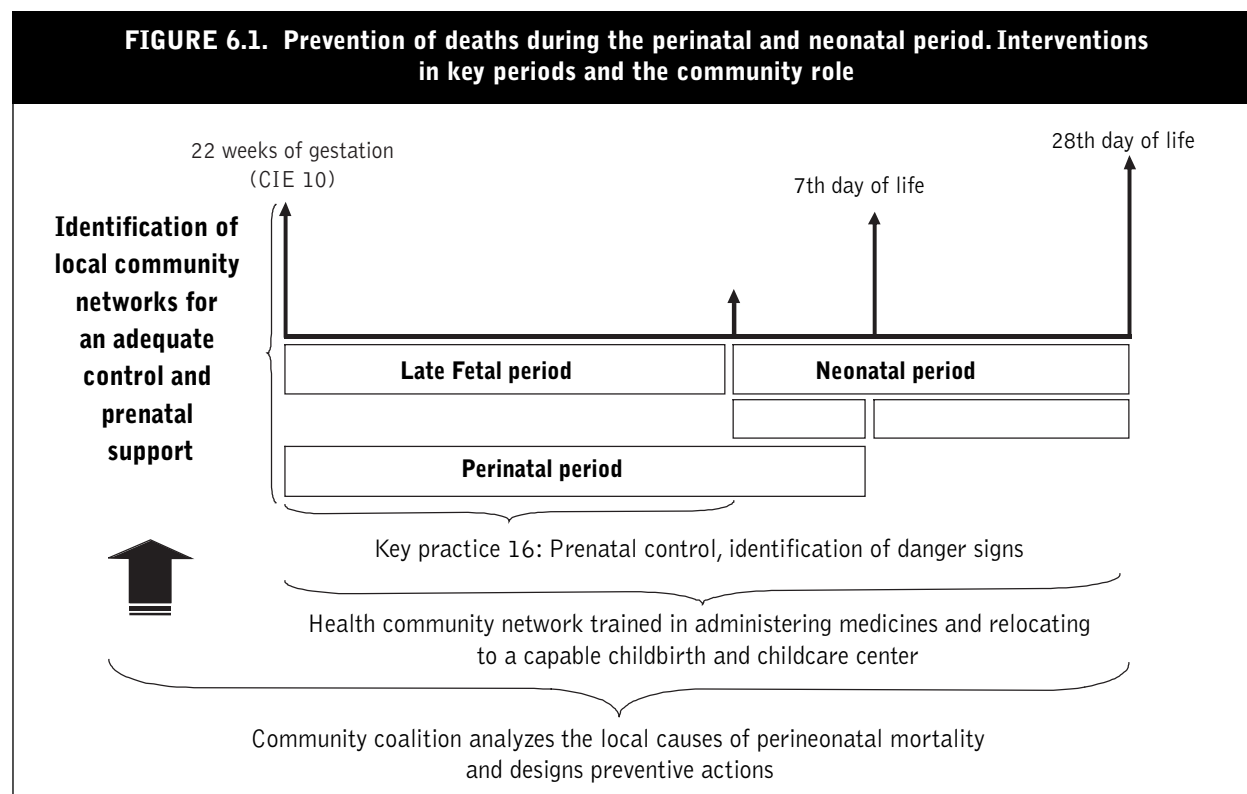
INTRODUCTION OF THE IMCI COMPONENT AT THE COMMUNITY LEVEL

Peri-neonatal mortality is one of the main reasons for childhood mortality in many communities that are isolated and have difficult access to the health services. The community component of the IMCI strategy is introducing its peri-neonatal component in the framework of a strategy based on community participation. The challenge is to promote the formation of community coalitions among the different social agents including health sector members, local government, Red Cross volunteer networks, Catholic health networks, groups of mothers and pregnant women, and other key people in the community. Such coalition will evaluate

the main local causes for peri-neonatal mortality specific to their communities, design preventive measures and identify the community agents and the local health networks (e.g. midwives of the community) and will be trained to provide an adequate prenatal control, care for the newborn at risk, and perform routine health assessments during the child's first month of life.

The coalition will also establish efficient mechanisms to identify pregnant women who are at risk in each community and who have no quick access to health services, in order to train them to recognize danger signs and have access to a trained community member who has the ability to provide immediate care and who can refer them to a health care center. The coalition will identify the resources and the necessary medicines that the community must have in case there is an imminent delivery (e.g. antenatal steroids for women at risk of premature birth) for their relocation, and for the care of the newborn at risk. The success of the objectives of such coalitions will depend on the establishment of a good monitoring and evaluation system.

Figure 6.1 illustrates the different interventions that are possible during the peri-neonatal period and the role of the community regarding these interventions. The identification of local community networks for an adequate control and prenatal support will be a key, particularly in pregnancies of high risk such as pregnancies during adolescence, in women who are malnourished, obese, have diabetes or other chronic illnesses, consume alcohol and/or tobacco and in unwanted pregnancies. The community health worker, trained in prenatal control, can provide folic acid and iron supplements which are very important during pregnancy, and help promote quitting smoking and/or drinking and observe the development of such pregnancies. During the late fetal period, after 22 weeks of gestation, the community agent will have a key role in reinforcing, to pregnant women and their spouses, how to recognize danger signs and/or imminent delivery—as part of the Key Family Practice number 16. The possibility of training community health workers (e.g. midwives) will also be explored so they can provide prenatal steroids to those women who have premature labor symptoms before the 34 weeks and later relocate them to a specialized health center.



The percentage of household delivery is still too high in many communities. One of the objectives of the IMCI community projects—through the promotion of Key Family Practice 16 related to the control and prenatal care—is to increase the percentage of childbirths in institutions, an objective already being reached in several projects (e.g. Huancane and Chao District, Peru). However, it is important to have a community health workers network skilled in newborn care during the first month of life in case the child is relocated to his/her home immediately after being born, especially when there is a background of low weight births, premature births, or risk of newborn infections.

POSSIBILITY OF EXPANSION OF THE PERI-NEONATAL COMPONENT AT THE COMMUNITY LEVEL

The Regional Community IMCI project—with the funding of the American Red Cross and the United Nations Foundation (UNF), together with the Health Ministries has expanded the community component of IMCI with the Health Ministries in 32 communities of ten countries increasing coordination of activities at the national level. Guidelines were designed to involve different community agents in each country and community. Seventeen of these local projects have a strong neonatal component. The Action for Family Health project, funded by the Catholic Medical Mission Board (CMMB) in coordination with the Ministries of Health, comprises five countries, three of which are PAHO's priority countries (Haiti, Nicaragua and

Honduras) with the possibility of expanding to Bolivia in the near future. This project looks to increase the capacity of the Catholic health network to broaden the three components of the IMCI strategy, including the neonatal period, the prevention of mother-to-child transmission (PMTCT) of HIV/AIDS infections, and the supply of essential medicines to the IMCI and PMTCT. All these projects are done in coordination of the Ministries of Health of each country to search for a multiplying effect either with the vast Catholic Church health network or through the Red Cross volunteer network, to support the efforts of primary health and family health in the countries of the region.

The next steps in the expansion of the peri-neonatal component are:

- 1) Introduce the methodology of making the family and the community participate in other high risk areas of other PAHO countries through inter-sectoral actions of primary health care, including the peri-neonatal component in an equity context.
- 2) Secure a coordinated and participatory planning and implementation for the peri-neonatal component in the countries, with other agencies, NGOs and within PAHO, to strengthen the local capacity and maximize resources.
- 3) Strengthen the documented evidence and the interchange of experiences for the mobilization of additional funds. We consider that this community collaboration will strengthen the activities to achieve the Millennium Development Goals related to the reduction of childhood mortality and maternal mortality.



7. Social Communication in the IMCI

Scaling up of IMCI in the Americas: The role of communication

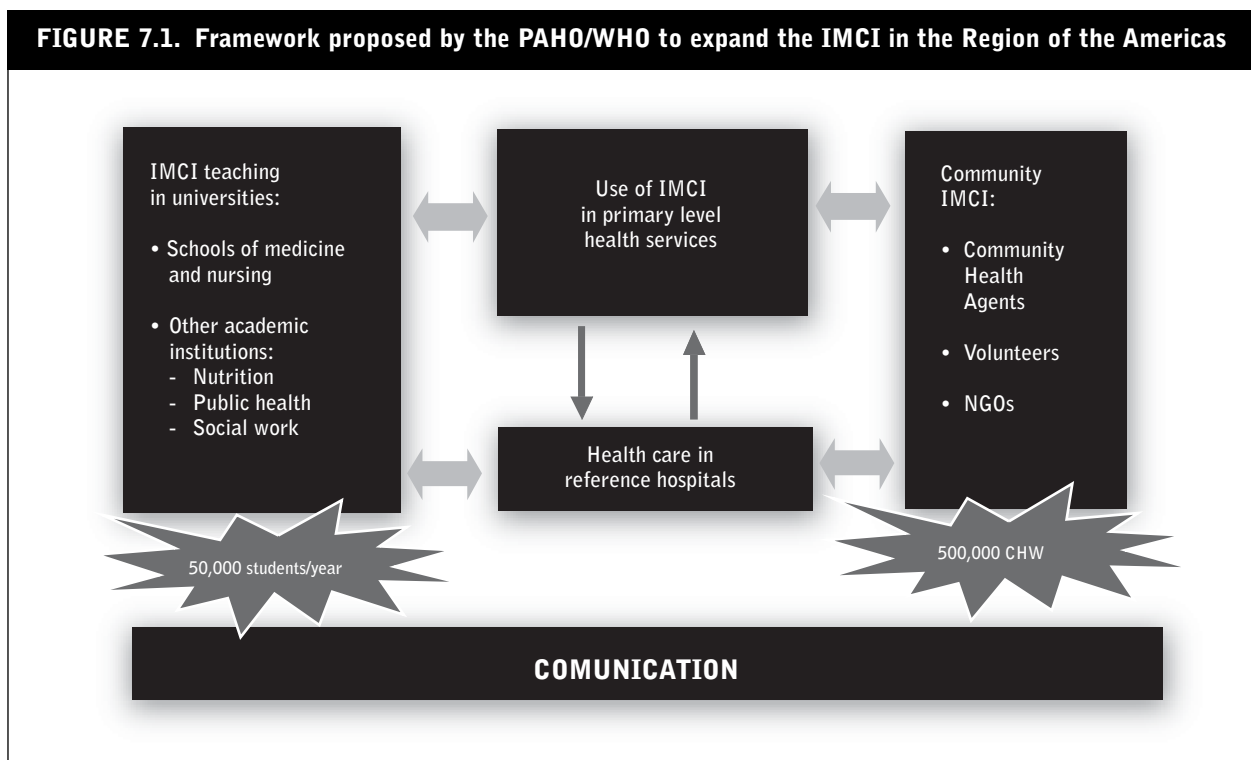
Rafael Obregón, Ph.D. Communications Advisor. Child and Adolescent Health (CA),
Family and Community Health (FCH). PAHO/WHO

Expansion of the Integrated Management of Childhood Illness (IMCI) in the countries of the Americas heavily depends upon a continuous interaction of activities aimed at strengthening, scaling-up, and sustaining IMCI through the provision of better health care service, and activities designed to empower communities and families aimed at improving child health in and out of their homes. Figure 7.1 presents PAHO's framework for expansion of IMCI including the various areas, organizations, and individuals working on child health to ensure scaling up of the IMCI strategy.

It includes the work to be done with schools of medicine and other health-related schools as well as with the half a million health volunteers and community agents that contribute in various ways to respond to the health needs of the region.

Within this framework, communication is a crosscutting element that plays a critical role in strengthening all aspects of the strategy. For practical reasons, the three components of the strategy—health systems; health workers; communi-

FIGURE 7.1. Framework proposed by the PAHO/WHO to expand the IMCI in the Region of the Americas



ty—are often grouped into two categories: clinical (health systems and health workers) and community.

The role of communication in the IMCI strategy has been organized around these two broad priority areas. First, improvement of the quality of communication processes between health providers and users of health services and the broader community. Second, facilitation of a process of individual and collective ownership of key family practices and messages by families and communities that may lead to adoption of healthy behaviors. Table 7.1 shows each component of the strategy and the corresponding specific focus of communication to ensure greater effectiveness of the strategy.

Behavior change communication includes the use of interpersonal and community-based communication activities, as well as the use of various communication materials that range from counseling cards to educational guides to educational games. At the health service level, key communication activities include counseling of mothers before, during, and after their

visits to clinics or health centers; and exposure of mothers and caretakers to key messages while they wait in health centers through videos, audio tapes, talks, and informal discussions. Similarly, at the community level, health community agents and volunteers conduct home visits and carry out counseling and education sessions with mothers and caretakers in an effort to ensure adequate care of children at home. These volunteers and agents are typically members of the community who are often recognized as community and opinion leaders and can communicate easily with mothers. Print materials such as guides and brochures highlighting danger signs, immunization schedules, adequate breastfeeding, etc., seek to reinforce key practices and messages and are handed out to mothers and caretakers of children.

Conceptual and methodological approaches to communications in IMCI have changed over time. Communication in IMCI originally tended to focus on changing people’s behaviors through improvements in knowledge, attitudes and practices of mothers and caretakers, relying heavily on improving

TABLE 7.1. IMCI Components and Communications Focus

IMCI Component	COMMUNICATION FOCUS
Performance of health workers to provide better care to children under five years of age and their mothers, caretakers, and families	<ul style="list-style-type: none"> • Competencies of health workers for effective interpersonal communication and counseling • Process to improve the quality of communication between health personnel and users of health services • Mobilization of families and communities for improved quality of health services with a focus on IMCI
Organization and functioning of health services to provide adequate and quality care	<ul style="list-style-type: none"> • Advocacy to give greater visibility to IMCI-related issues and ensure resources at the country level for implementation of the strategy • Communication and social marketing strategies for greater use and demand of health services • Communication strategies that link up actions at the health and community levels
Promotion of key family practices for child health	<ul style="list-style-type: none"> • Behavior change communication strategies to contribute to the creation of enabling environments and to the adoption of healthy behaviors • Communication and advocacy strategies to promote changes in the social, economic and environmental contexts to facilitate the adoption of healthy behaviors.

the communication skills of health providers, an effort that has required considerable in-service training. However, communications in IMCI is increasingly moving toward greater participatory approaches focusing on mobilization of social networks and actors and toward the use of natural communication spaces by involving local actors such as teachers, community leaders, women's groups, community health agents, and other community volunteers¹. This shift seeks to take advantage of the various opportunities that bring mothers and caretakers into contact with these local actors; to use these opportunities to promote key family practices and messages to improve children's health; and to facilitate greater participation of communities and families in responding to community's needs on child health².

Accordingly, implementation of IMCI at the community level starts with a participatory diagnostic process in which local actors and networks work together toward the identification of priority issues using the key family practices as a basic framework that leads to community consensus. This exercise is followed by the preparation of a plan of action that draws upon the mapping of community resources available and those additional resources that may be needed both at community and health facility levels. This plan of action includes various areas such as advocacy and communication components, with detailed activities, indicators, and community members responsible for the execution of such activities, creating a greater sense of ownership and facilitating sustainability of interventions.

CONTRIBUTIONS OF COMMUNICATION TO IMPACT OF IMCI

While the impact of IMCI is often assessed in its broader context, some past and recent studies conducted in Latin

American and the Caribbean illustrate how communication has contributed to progress made in child health through IMCI. These include studies conducted by PAHO and some of its partner organizations such as UNICEF, BASICS II, and other international and national NGOs (Project HOPE, CARITAS, PROCOSI-Bolivia) that have participated in the implementation of IMCI across the region. In the lines that follow two examples are brought into the discussion with a focus on their communication component and the type of results achieved.

A study conducted by Project HOPE in the Dominican Republic between 1998 and 1999 in marginal areas of the country's capital, Santo Domingo, as part of the implementation of IMCI, showed consistent improvements in knowledge and practices amongst mothers and caretakers of children³. Some of the key results included increased recognition of at least two danger signs (48 to 78%), knowledge of key practices for care at home (i.e., provision of oral rehydration therapy (78 to 92%), maintain feeding during episodes of diarrhea (66 to 91%), adequate administration of fluids to control dehydration (33 a 77%)), and increased practice of exclusive breastfeeding before and after implementation of the strategy.

An intervention led by Adecap, a local NGO, and the Ministry of Health of Peru, with support from the Pan American Health Organization, in Huancavelica, Peru, included work with indigenous, Quechua-speaking communities. Evaluation results showed sizable improvements among mothers and caretakers who were able to recognize the most important danger signs that would mean immediate risk for children and that would require immediate care from a health worker⁴. Table 7.2 shows results about recognition of danger signs before and after implementation of IMCI. While more common danger signs such as vomiting, fever and diarrhea were relatively known before

-
- 1 See Nkum, J., 2002, "Communication approach for community IMCI", for a more detailed discussion of communication approaches to child health in the context of IMCI, UNICEF: Eastern and Southern Africa Regional Office.
 - 2 For a detailed discussion of behavior change communications and the promotion of the key family practices see Winch, P., LeBan, K., Kusha, B., et al. 2001. *Reaching Communities for Child Health and Nutrition: A Framework for Household and Community IMCI, 2001*. Basics II/CORE Group/USAID: Washington, DC.
 - 3 Narvaez, T. 2000. "Programa de Atención Primaria en Salud", Noticias sobre AIEPI, n.4, December 2000, p.7-9.
 - 4 Adecap/Ministerio de Salud Perú, Organización Panamericana de la Salud 2004, *Informe Final, Campaña: Juntos podemos salvar a los niños*, Adecap: Huancavelica.
-
-

hand, other signs such as fast breathing, difficulty to breathe, and convulsions were hardly known by mothers and caretakers. These results also were consistent across recognition of danger signs related to pregnancy and postpartum. While recognition of danger signs does not guarantee that mothers will seek immediate help of a health worker due to various factors that may include traveling long distances, lack of transportation, and lack of economic resources, among others, it does guarantee a greater level of awareness about danger signs and of the need to take immediate action, which constitutes the first step in saving the life of a child.

While the experiences summarized above relied primarily on interpersonal communication activities held in health services, other experiences have been characterized by a more comprehensive communication strategy that includes an integrated package of communication interventions (i.e., mass media through the use of radio dramas, radio jingles, and print materials such as reminder materials,

interpersonal communication through counseling activities, group activities and the participation of church leaders, and community activities such as the distribution of radios so mothers could listen at the workplace). This process includes a series of methodological steps that integrate formative research, strategy design, pretesting of materials, implementation, and monitoring and evaluation of activities, steps that are generally acknowledged as essential in health communication planning.

An important lesson learned from these experiences is the importance of promoting consistent messages through each of the various communication channels used. In the context of child health it is relatively common to find that different organizations deliver messages that may differ on certain aspects creating confusion among the audience. While this may not have consequences in other settings, in the context of child health confusing messages may have unexpected, negative consequences for the health of children and the well being of families. Other important les-

TABLE 7.2 Knowledge of general danger signs in children under five, indigenous communities, Districts of Colcabamba, Tayacaja - Huancavelica, May 2003

Danger signs	Pre IMCI N = 84		Post IMCI N = 92	
	N°	%	N°	%
Cannot drink/be breastfed	37	44,0	90	97,8
Fever/vomit/diarrhea	65	77,4	89	96,7
Fast breathing	6	7,1	72	78,3
Difficulty to breath	8	9,5	33	35,9
Bloody stools	9	10,7	80	87,0
Lethargic	12	14,3	64	69,6
Moves less than normal	2	2,4	51	55,4
Convulsions	0	0,0	52	56,5
Other	20	23,8	65	70,7
Do not know/ Do not recognize	3	3,6	0	0,0

sions included the need to bring together various organizations to work toward the same goals, thus maximizing existing resources and strategies.

CURRENT ACTIVITIES

Several communication activities and interventions are being carried to strengthen the communication aspects of IMCI. Without attempting to detail each and every activity, below is a summary of some of the key activities that are underway at the regional level organized into three broad areas: advocacy; technical support; and strategic alliances.

Advocacy

Efforts have been undertaken to establish key partnerships in the region that will provide greater visibility to IMCI-related issues. For instance, PAHO is supporting the Latin America and Caribbean regional network initiated by the News Agency for the Rights of Children and Adolescent (ANDI). Drawing on its successful experience in Brazil of over more than 10 years, which has contributed to greater and better quality of media coverage on child and adolescent health issues, ANDI has started a regional network that seeks to replicate this experience in 8 countries. PAHO's involvement in this network seeks to monitor coverage of child health issues and generate national dialogue to place child health issues at the forefront of the public agenda.

Also in the context of advocacy efforts through the media, a reference tool for journalists interested in child health issues is being developed. The focus of this tool is on maternal and neonatal health and it seeks to bring to the agenda maternal and neonatal health issues, which for the most part are absent from the media discourse. Similarly, in cooperation with PAHO's HIV/AIDS Unit and the Communication Initiative Project, support is provided to Redsalud, a virtual network of over 300 journalists and communication professionals interested in health issues across the region. The purpose is to create an ongoing dialogue among these professionals to encourage open discussion of health journalism and better coverage of health issues, including child health issues.

In addition, efforts are being made to provide local actors and networks with the necessary tools to advocate for child health issues in the context of IMCI. A communication and advocacy tool has been developed and tested with the participation of health communication experts, community members, and other health professionals. This tool provides practical steps that local and community leaders, project coordinators and those responsible for implementation of IMCI may follow to rally various organizations behind implementation of the strategy.

Technical support to countries and local organizations

While communication has been present at all stages of the implementation of the strategy, regional meetings and discussions indicated the need to produce a tool that would provide countries with specific steps to plan, design, implement, monitor, and evaluate communication activities in IMCI. This tool has been produced with participation of countries, NGOs, and local communities with a focus on improvement of interpersonal communication processes in health facilities and the integrated promotion of key family practices at family and community levels. This tool is supported by two key materials. First, the manual "Talking with mothers", which has been revised to have a greater intercultural communication approach and to focus in pre-consultation, consultation, post-consultation, and community interpersonal communication settings. Second, the guide on key and supporting messages for healthy growth and development of children. This guide has disaggregated the key family practices in simple, clear messages that focus on micro behaviors, hence making it easier for local actors to promote these health behaviors.

In June 2004, five countries from the region -Nicaragua, Bolivia, Colombia, and Peru- participated in a regional meeting to start a regional radio network for child health. Drawing upon the experience of the program "Por la Salud de los niños" (For the Health of Children), a media component of the IMCI strategy in the State of Antioquia, Colombia, a partnership is being promoted to encourage these countries to adapt and replicate this experience. Each country has developed a plan of action to bring this network to reality and

expand the promotion of key family practices and other IMCI messages in a larger scale.

As part of the partnership with the American Red Cross and the International Federation of Red Cross Societies (IFRC), several activities have been developed to strengthen the communications for behavior change capacity of the National Red Cross Societies and to facilitate greater involvement of communications teams of national chapters of the Red Cross in the project. A workshop on communication for behavior change was held in June 2004 in Guatemala with participation of Red Cross communicators from the region. The National Red Cross Society in Bolivia has taken the lead in this process and it has worked in the promotion of key messages in the context of IMCI in the country.

The creation of national communication plans on child health is another key element in the area of technical support. Lessons learned in various regional workshops demonstrate that to achieve greater impact different communications interventions undertaken by various organizations must be coordinated to ensure commonality of messages, greater coverage, greater reinforcement of messages and eventually changes in behaviors. This process must be led by the ministries of health to ensure coordination with other IMCI activities at national and local levels and maximize the use of available resources and avoid duplication of efforts. An example of this type of initiative is the national health communication plan in Nicaragua, which includes child health as one of seven strategic areas. This experience should offer important lessons and stimulate similar undertakings in other countries.

Strategic alliances

As indicated above, working with partners is an essential element of the implementation of IMCI. In the area of communication important partnerships have been established, including those mentioned above—National Red Cross Societies, International Federation of Red Cross Societies,

ANDI, the Communication Initiative—, as well as other organizations such as the environmental Health Project, the Voice of America, and the Latin American federation of Schools of Communication. However, these partnerships must be expanded and strengthened, particularly as it relates to greater mobilization of financial resources to sustain the regional and country efforts needed to improve communications in IMCI and to contribute to the reduction of child mortality and to improvements in child health.

These examples illustrate some of the important contributions that communication makes to achieve the expected results in the implementation of IMCI. However, health professionals and communicators must pay special attention to various challenges in the process of making IMCI a more effective strategy. While challenges are found across each of the three components of IMCI, the next section focuses on a set of key communication-related challenges.

COMMUNICATION CHALLENGES FOR IMCI AND CHILD HEALTH

Challenges identified in this section are based not only on the previous discussion but also on lessons learned that have been identified throughout the implementation of the strategy. Most of these lessons learned and challenges were identified at regional workshops conducted in Quito, Ecuador⁵, Lima, Peru⁶, and Tegucigalpa, Honduras, between 2002 and 2003⁷. Also, it is important to take into account that while these challenges focus on communication, they are closely interconnected with some of the larger challenges that underline the implementation of IMCI.

Communication strategies for integrated promotion of key family practices

At a technical meeting convened to discuss further implementation of IMCI, Winch and others⁸ indicated that the

5 International Workshop “Experiences in Communication and Child Health: Lessons learned, challenges and new directions”, Pan American Health Organization, Quito, Ecuador, June 2002.
6 Regional Workshop “A Communication Strategy for IMCI”, Pan American Health Organization, Lima, Peru, October 2002.
7 Regional Workshop “Community Approaches to Newborn Care”, Tegucigalpa, Honduras, BASICS II, April 2003.
8 Winch, P., LeBan, K., Kusha, B., et al. 2001. Reaching Communities for Child Health and Nutrition: A Framework for Household and Community IMCI, 2001. Basics II/CORE Group/USAID: Washington, DC.

integrated promotion of the key family practices pose a challenge for implementers of IMCI:

“BCC has been most successful with the programs promoting single behavioral objectives (e.g., Oral Rehydration Therapy, ORT use) or clusters of closely-related behavioral objectives (e.g. family planning), and their effectiveness has been demonstrated. The major challenge for BCC in IMCI is how to promote several very different sets of behavioral objectives in one integrated package while maintaining the effectiveness of communication programs that promote single objectives” (p.47).

Thus, the integrated promotion of the key family practices remains as a critical challenge for health communicators working in IMCI, whose development will have important implications for public health communication. The notion of promoting several practices that involve several behaviors as part of the same communication strategy is almost counter to what traditional behavior change communication teaches practitioners of this field -that is to focus on specific behaviors-. However, this turn comes as an opportunity to public health practitioners to push the boundaries of health communication by searching for new, innovative approaches. PAHO is currently implementing 30 small community IMCI projects in 10 countries across the region⁹, which should provide important lessons for the future of the strategy and the practice of health communication. Also, the emergence of neonatal mortality as a priority brings into the equation another set of danger signs as well as key practices for prevention of neonatal mortality and promotion of neonatal health.

Communication as an element of integration of IMCI's components

Another important challenge faced by health communicators working in IMCI is the need to achieve a more effective articulation of its three components. In this respect, communication must play a vital and more visible role in acting as an integrating element. While some organizations

have implemented specific components of IMCI (i.e., NGOs often decide to implement only the community component of IMCI if difficulties within or with the health system component prevent the full implementation of the strategy). While this is an understandable position, efforts must be made to ensure the articulation of all IMCI components. Communication may play an important role in creating the necessary conditions and commitment on behalf of authorities. Thus, communication must be thought of and integrated into the implementation of IMCI from the very beginning.

Repositioning the strategy among policy and decision makers

At a regional workshop held in Quito, Ecuador, 2003, with the participation of nearly 25 health and communication professionals working in IMCI in different countries of the region, it was concluded that, given the high level of rotation at ministry and operational levels in the health sector, the strategy could benefit from being repositioned among those policy and decision makers responsible for implementation of IMCI, particularly in regards to allocation of resources and political commitment to move forward with the strategy. It was suggested that IMCI needs to provide decision makers with the necessary evidence that illustrates how the implementation of IMCI will give them benefits at the economic, social and political levels, thus creating a more favorable environment for its implementation. The clear implication of this recommendation is that even if certain proven strategies encompass a series of technical strengths, communication and advocacy efforts targeting key decision and policy makers still are needed to ensure effective implementation of the strategy.

A Rights-based communication approach

Along with the focus on decision makers, it was strongly recommended that efforts be made at promoting a rights approach as part of the implementation of IMCI. This rights-approach must have a stronger focus on the rights

⁹ Pan American Health Organization, 2001, *Proyecto Regional AIEPI Comunitario: Taller de Trabajo Técnico*, Pan American Health Organization: Washington, DC.

of mothers and caretakers of children to demand integrated care, a process in which communications must play a key role in making this possible. Until now, efforts have been made at persuading health professionals about the importance of using this integrated approach. However, promoting the notion of integrated care among mothers and caretakers of children will ensure that no longer will the application of the principles of IMCI be an option but rather a demand of users that will ensure widespread application of the key aspects of IMCI.

Focus on intercultural communication

Under the notion of equity that underlines PAHO's implementation of IMCI many interventions take place in poor communities, often of indigenous background. Thus, it is strongly recommended that communication strategies take firm steps toward increased efforts aimed at introducing a stronger intercultural communication approach that will help health workers respond more effectively to the needs of mothers, caretakers, and families of children to facilitate a communication process that is centered on greater understanding of cultural differences.

From individual change to family and community change

The design, implementation and evaluation of communication strategies for the promotion of key practices in the context of IMCI must have as a departing point the fact that behavior change does not depend solely on interventions that target individuals. It is critical to recognize the role played by contextual issues and those aspects that affect possibilities of changing behavior, leading to the development of strategies that will work at different levels: individual, family, community, institutional, and policy, and considering the use of systematic and articulated actions that include advocacy, social mobilization, participatory communication, interpersonal and mass communication, amongst others.

Evaluation issues

Evaluation remains as an important challenge. Evidence of what contributions communication makes to the adoption of healthy practices by communities, families and individuals needs to be shown in a rigorous way in order to strengthen the role of communication in the implementation of the IMCI strategy and in public health communication as a whole. The increasing trend toward new participatory approaches demands a broader focus in this sense and evaluators will need to look at processes of empowerment, participation, leadership and social norms, and not only at classic indicators traditionally used in BCC such as knowledge, attitudes, and practices. This will require greater integration of qualitative and quantitative indicators with communities playing an active role to truly understand processes of empowerment and change in community and family settings. Also, what types of changes take place in the social structures of communities need to be considered, recognized, and analyzed beyond the exclusive focus on the indicators related to epidemiological aspects.

Adaptability of the strategy

Finally, it is of utmost important for IMCI to remain as a strategy flexible enough to accommodate new technical elements and to get adjusted to the new challenges imposed by social and economic changes at the international level, which will certainly have an impact on the prioritization of health issues and current trends in the responses provided to social problems. For instance, the need to work in neonatal health brings with it specific challenges such as making the health of the newborn a lot more visible¹⁰. IMCI has shown that, if implemented with a minimum of needed resources and with strong political support, it may be an effective strategy.

10 BASICS II, 2004, *Final Report of the Regional Workshop, Community strategies to newborn care*, BASICS II, Arlington, VA.

8. The IMCI strategy and the achievement of the Millennium Development Goals in the Region of the Americas

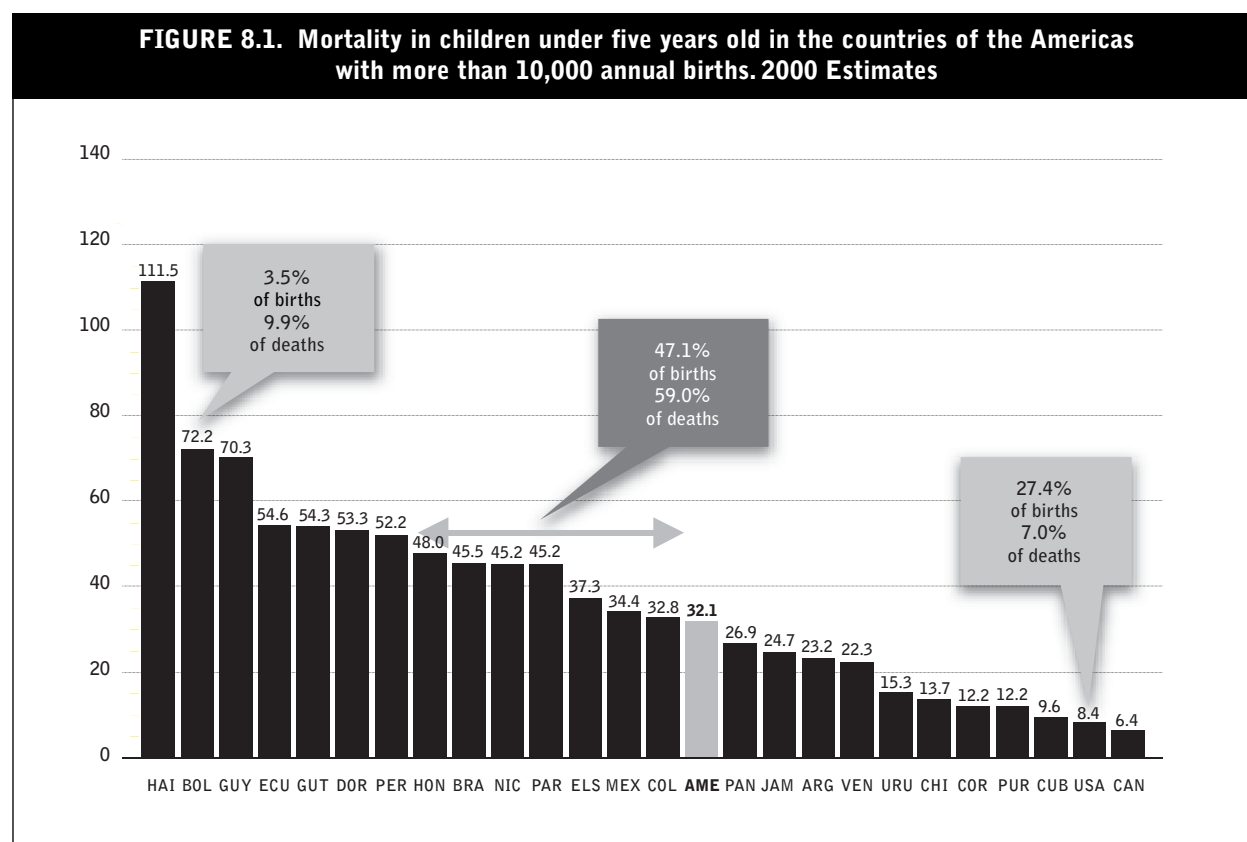
Dr. Juan Carlos Bossio, FCH/CA Advisor, PAHO/WHO

INTRODUCTION: MAGNITUDE OF MORTALITY IN CHILDREN UNDER FIVE YEARS OLD IN THE REGION OF THE AMERICAS

According to the latest estimates available in 2002 about half a million children die annually before reaching the age of five. This represents a mortality rate of 32.1 per 1,000 live births. The main cause of mortality are the complications

of the perinatal period, leaving the respiratory and infectious diseases to occupy second and third place, with a mortality rate of three times as lower. As a group, these three causes represent about two thirds of mortality in children under five years old in the countries of the Americas.

As a regional average, the mortality rate in the continent hides the pronounced differences among the countries (figure 8.1).



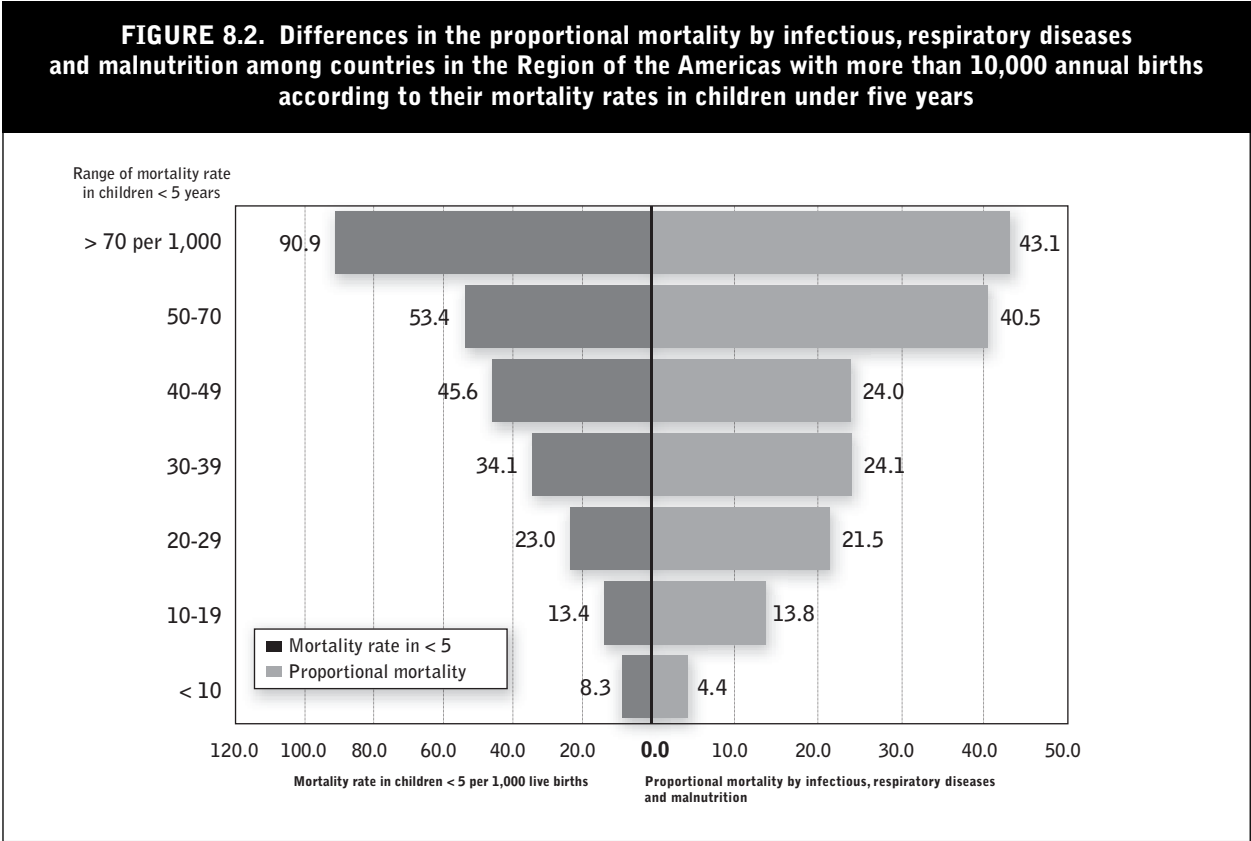
Source: Child and Adolescent Health Unit (FCH/CA), based on data of Health Analysis and Information Systems (AIS). Pan American Health Organization/ World Health Organization

By 2000, the relative risk of dying before reaching five years of age in the country with the highest rate of mortality compared to the one with lowest mortality rate was of 17.4. The three countries with greater mortality in the continent, those which contribute to only 3.5% of the annual births, contributed with greater number of deaths than the three countries with lower mortality, which contributed to about nine times more to births.

The countries in which children have more risk of dying during the first five years of life, however, are not those that contribute to a greater number of deaths in this age group. The three countries with mortality rate in children under five greater than 70 per 1,000 contributed with 10 percent of the deaths in the continent, while a group of seven countries with rates lower than 50 per 1,000 and greater than 30 per 1,000, contributed to about 60 percent of the total mortality of children under five years living in the continent.

This different distribution of mortality in the Region is also observed when analyzing the cause of death during the first five years of life (Figure 8.2). In countries where the mortality rate in children under five years is greater than 70 per 1,000 live births, 40 percent of the mortality is still due to infectious and respiratory diseases and to malnutrition, a situation which is also observed in countries with rates between 50 and 70 per 1,000 live births. Instead, in countries with rates of 30 and 50 per 1,000 live births, these diseases constitute only one of four deaths in those under five.

This last group of countries concentrates 60 percent of the mortality in children under five years in the continent and three fourths of these deaths are not caused by infectious, or respiratory diseases or malnutrition. Therefore it is important to approaching other type of illnesses, particularly those including the ones originating in the peri-neonatal period, which are the first cause of mortality in children under one year.



Source: Child and Adolescent Health Unit (FCH/CA) based on data sent by the countries and estimates from Health Analysis and Information Systems (AIS). Pan American Health Organization/ World Health Organization.

MORTALITY TRENDS IN CHILDREN UNDER FIVE YEARS OLD IN THE REGION OF THE AMERICAS

At the beginning of the 21st century, mortality in children improved in relation to the numbers registered in the previous decade. Children born in 2000 have one third less risk of dying than those who were born in 1990. This reduction was also observed with the risk of dying during the first five years of life, although this was of 21 percent.

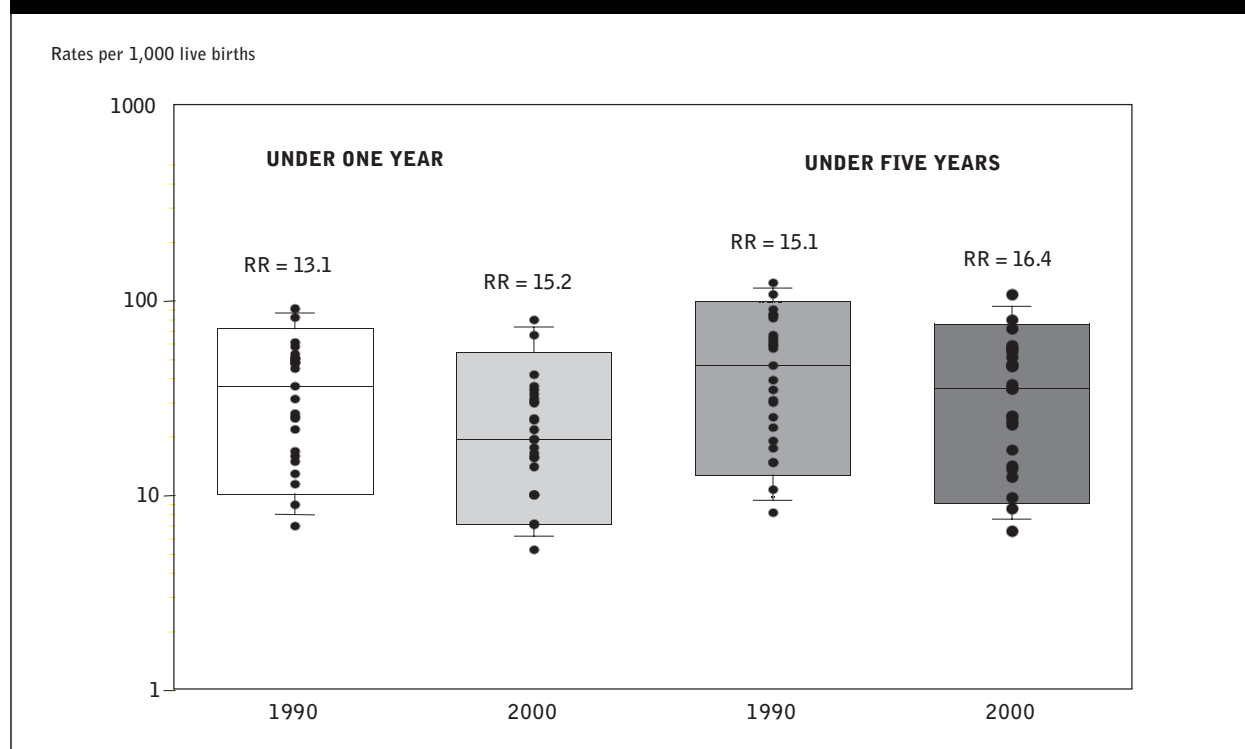
However, in the same way that the regional mortality average hides the different realities of the countries, decline tendencies in regional mortality do not show the different trend observed in each country. During the decade of the 90's, the relative risk of dying during the first year of life, comparing countries with higher and lower degree of children mortality, increased from 13.1 to 15.2 (Figure 8.3).

Although to a lesser degree, the relative risk of dying during the first five years of life also increased among countries from 15.1 to 16.4 in the same period.

The reduction in the number of deaths by infectious diseases especially diarrheal and respiratory diseases, contributed to improving regional mortality during the first five years of life. During the last decades of the 20th century, the reduction in mortality caused by these diseases increased the average life expectancy among the population of the continent.

However, despite the fact that mortality due to diarrheal and respiratory diseases was reduced in all countries, these continue to represent an important proportion of deaths during childhood. The analysis of the proportional mortality by intestinal infections and by respiratory diseases shows a pronounced increase in the gap among countries, especially during the last half of the 20th century. During this period, the proportional mortality ratio for diarrheal diseases

FIGURE 8.3. Evolution of the gap among countries in relation with their infant mortality and their mortality in children under five. Countries in the Region of the Americas with more than 10,000 annual births. 1990-2000 Estimates



increased from 17.2 to 328, and for respiratory diseases increased from 8.8 to 21.4.

This reveals that the benefits of oral rehydration therapy, to prevent deaths due to diarrhea, and the benefits of the antimicrobial treatment to prevent deaths due to pneumonia, very much accessible in the countries of the Region, are not yet reaching large population groups in other countries of the Americas.

PERSPECTIVES ON THE MILLENNIUM DEVELOPMENT GOALS

With the current levels of mortality in children under five in the Region of the Americas, the achievement of the Millennium Development Goals, which proposed a reduction of two thirds from 1990 to 2015 will require a considerable increase in the rate of reduction during the next years (Figure 4.6, page 21). The proportional reduction, which was of 28 percent during the decades of the 90's, should be of 57 percent between 1990 and 2015, which represents an average annual drop close to 4 percent compared to the annual drop of about 3 percent that was registered during the 90's.

This increase can be achieved by focusing the actions at the areas with higher mortality rates in children under five years, especially to prevent and control the responsible causes for most of the group's death. This approach will not only contribute to achieving the MDGs of reducing mortality in children under five years old, but also will allow reducing the gap among countries and its areas promoting equal access and use of available strategies to improve health conditions in childhood throughout the continent.

The key to carrying this through could be the Region's experience since many countries and their areas achieved important milestones in the reduction of mortality in children under five years old during the last decade of the 20th century. El Salvador and Nicaragua, for example, reduced their mortality in children under five years old to half during the 90's, despite having started with mortality rates sim-

ilar to the ones registered by Guyana and Haiti—countries which showed changes in mortality rates of 12 percent or less during the same decade (Figure 8.4).

This same analysis can be done to the interior of the countries in order to identify the jurisdictions or areas that register greater impact on the reduction of mortality in children under five years, in order to adapt these successful experiences and apply them in areas that still maintain high mortality rates.

In any case, it is essential to adapt the interventions to the mortality profile and give more importance to the infectious and respiratory diseases and malnutrition in those areas with high mortality rates in children under five years old; and give growing importance to the peri-neonatal problems, especially in the areas with low mortality. This adaptation is key to achieving a greater impact on the reduction of mortality and in fulfilling the commitment adopted in the Millennium Development Goals for 2015.

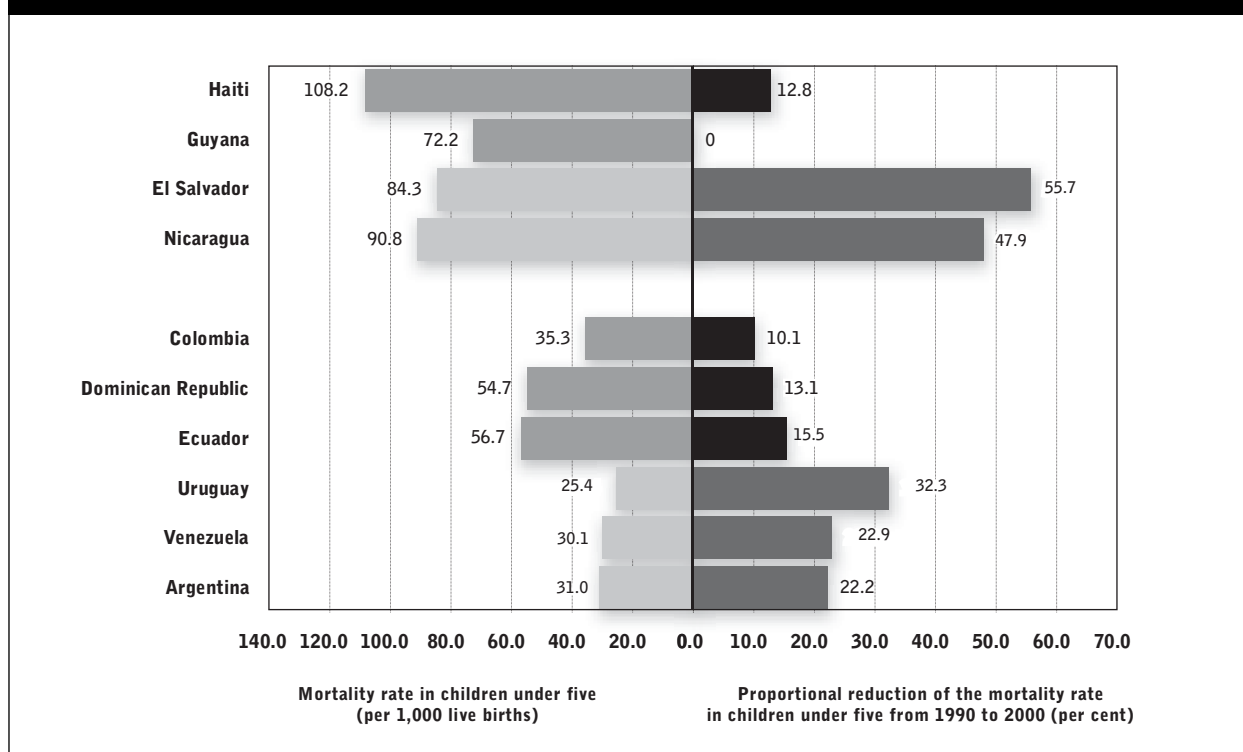
Preliminary estimates for the Region of the Americas show that a reduction of 50 percent in mortality caused by conditions associated with the peri-neonatal period could bring a drop of up to 20 percent in mortality in children under five, while a drop of 50 percent in mortality caused by infectious and respiratory diseases will only achieve an impact of around 6 percent.

However, the potential impact on the reduction of mortality for these two last causes and for malnutrition is different. In countries with mortality rates in children under five of over 70 per 1,000 live births, a drop of 50 percent could reduce the group's mortality to up to 20 percent.

Even in those countries with rates of between 40 and 50 per 1,000 live births reducing by half the mortality caused by infectious and respiratory diseases and malnutrition, could reduce the group's mortality to up to 12 percent,

In this context, the achievement of the reduction of mortality in children under five years old proposed by the MDGs will require covering the control of infectious and respiratory diseases, malnutrition and the peri-neonatal

FIGURE 8.4. Comparison in the decline achieved during the decade 1990-2000 for countries with similar mortality rates in children under five. Countries in the Region of the Americas with more than 10,000 annual births.



Source: Child and Adolescent Health Unit (FCH/CA) based on data sent by the countries and estimates from Health Analysis and Information Systems (AIS). Pan American Health Organization/ World Health Organization.

conditions simultaneously. Likewise, it will require focusing the actions not only on those areas with the highest mortality rates but also on those which concentrate the greater numbers of deaths, to contribute to achieving the objective at the regional level and to reduce the gap among countries and their areas.

The IMCI expansion, which showed effective to the control of infectious and respiratory diseases in children under five,

constitutes a key strategy to accelerate the rate of mortality decline of the group. By supplementing it with its perinatal component, the IMCI will contribute to the prevention and control of diseases and problems that arise during pregnancy and the first weeks of life and which constitute an increasing proportion of deaths in children under one year old in the Region of the Americas.



9. Upcoming challenges to strengthen and expand the IMCI strategy in the Region of the Americas

Dr. Yehuda Benguigui, Unit Chief, Child and Adolescent Health,
Family and Community Health (FCH), PAHO/WHO

CURRENT SITUATION OF THE IMCI IN THE REGION OF THE AMERICAS

The IMCI has been adapted and adopted as key strategy for childhood care in seventeen countries of the Americas until 2003. In all these countries, training courses for health personnel were extended to promote its application in the care of children under five years. The adaptation process of the strategy contributed not only to adapt it to the epidemiological and operative realities of each country, but also to enrich it with national and local experiences. It also formed a group of health professionals who participated and who in many cases continue participating in the implementation and follow-up process of the strategy.

In this process, the participation of universities and scientific societies was the key in facilitating the acceptance of the IMCI. It also served to promote national and international consensus regarding the importance of its use as a key strategy to improving health conditions in childhood and to contribute to child survival.

As the numbers and coverage of health personnel and services that were able to apply the IMCI increased, the countries started having activities directed to the application of the community component of the strategy—directed to improving childcare practices especially at home. Until 2003, fifteen countries had made progress in the adaptation and application of the community component of the IMCI in many of their areas with the active participation of non-governmental organizations, city councils, institutional leaders and key people, and the community.

The progress achieved with the community component in these countries allowed to design, elaborate and check the participative methodologies of local planning, implementation and follow-up, and evaluation, which are currently spread throughout the local projects of the IMCI community component. These projects have contributed to expanding the Key Family Practices for a healthy growth and development.

Together with this strengthening and expansion process of the IMCI in health services and in the community, a group of professional and country experts gathered at the regional level to revise and adapt the strategy, as well as to identify the complementary components that would help enrich it. The development, field test and adaptation of these new components contributed to strengthen the integrated approach of the IMCI, reaffirming it as a care axis for children under five in health services, the family, and the community.

Among the complementary components, the design and field test of the perinatal component was considered the keys—if we take into account that these problems cause 61 percent of deaths in children under one year of age and 40 percent in those under five years in the Region—and constituted the main cause of mortality in children. Ten countries in the Region have already adapted the perineonatal component of the IMCI strategy and in many others the implementation at health services has already began.

Other components were also developed to strengthen the role of the IMCI strategy in the prevention and treatment of diseases and health problems that affect a healthy growth

and development of children during their first years of life. Among these components we can find the diagnosis and treatment of asthma and of the bronco-obstructive syndrome, prevention and detection of child abuse and sexual abuse during childhood, detection of development delays and early stimulation of development, early detection and treatment of diabetes and obesity, detection and treatment of epilepsy, prevention of oral health problems and detection and early treatment of cavities, and prevention and detection of environmental health risks for children.

The degree of development of each of these components is different. Professionals from different countries in the Region are participating in their design. Field tests for some of these components are taking place, or are to take place, during 2004. Most of them could be ready in a generic or preliminary version by the end of this year so countries can adapt them.

This advances have been made inside the regional planning framework for implementing and expanding the IMCI strategy, which was presented to the Governing Bodies of the PAHO for its revision and approval. Currently, there are two documents that were approved by the Directing Council and a document approved by the 26th Pan American Sanitary Conference, which included the Region's achievements regarding childhood health, the challenges and proposed plans.

As part of the analysis and approval process of these documents, two resolutions were approved in order to adopt the IMCI as a key strategy to continue working for child survival, with the additional benefit of providing better conditions to those who survive. In this way the importance of the strategy has stand out as an integrating axis of the different interventions for child survival, prevention of diseases, and promotion of children's healthy growth and development.

Currently, there are a great number of technical documents and printed materials available on the four official languages of the Organization to aid in the implementation process of the strategy in the countries of the Americas. The countries have adapted these materials both at the national

and local levels. In addition, some materials used for social communication and training community health workers were translated to different dialects so they could be accessible to the indigenous population.

The entire process has made many health services in most of the Americas, in particular those that provide care to the most vulnerable population groups, capable of applying the IMCI strategy when caring for children. Likewise, the expansion of the community component of the IMCI has in recent years contributed to strengthening the application of the strategy through personnel in health institutions, to expanding population access through the community health workers, and to spreading key practices to families for a healthy growth and development of the child.

KEY AREAS FOR STRENGTHENING AND EXPANSION

Advances made to this moment, although important, are not enough to face the commitment of reducing by two thirds the mortality in children under five years of age by the year 2015—with respect to the 1990 rate values. For this reason, it is necessary to revise the actions that can take place in order to give an answer to the problems—still being faced by the countries—of providing IMCI benefits to the entire child population.

At the governmental level, the MDGs, which include the reduction of mortality in children under five, must be adopted as a public policy of the highest rank and then be used as managerial guidelines, particularly in the area of health. In order for countries to reduce their mortality rates in children under five by 2015—two thirds lower than in 1990—it is necessary they review the progress made towards achieving this goal and then determine how they can increase their efforts in the upcoming years.

Additionally, the adoption of the MDGs as a public policy can direct the different governmental areas to know which activities to perform in order to identify the population groups or the jurisdictions that are behind in their goals.

This will allow to elaborate special plans to reinforce actions in those areas or population groups and identify successful experiences in other areas or in other population groups, which then can be used as basis to be adapted and put into effect. Currently, there are successful examples at the national and regional levels that can be used as a model. The people who participated in these experiences can also help by supporting areas or groups that have not yet achieved a rate of mortality decline according to the goals.

Adopted as a public policy, the MDGs will also be useful for the coordination with other non-governmental and private institutions, as well as with the general public, then making those goals a public commitment to improve health and development in the new millennium.

In this context, the adoption of the IMCI can be reinforced as a key strategy that integrates the different child survival interventions available becoming as the most important tool for achieving the MDGs in relation to mortality in children under five. As part of the strategic planning, the countries can also complement the IMCI with other actions that favor child survival like immunization campaigns that periodically contribute to maintaining high immunization coverage, the promotion of breastfeeding in maternity hospitals, or plans and programs for micronutrient supplementation, among others.

At the level of Ministries of Health, there are three areas that are considered keys to the expansion of the IMCI and to the fulfillment of the MDGs: the epidemiological surveillance, the elaboration and stratification of goals, and the dissemination and promotion of policies, plans and education.

Despite the progress, there is still no reliable or qualitative information and adequate coverage in support of the planning and most efficient follow-up and evaluation. The numbers of death in children are not always available and the coverage and quality of the information are variable. Even when available, the possibility of breaking up mortality by causes or by areas or population group is limited. This makes it difficult to identify the magnitude of the different diseases and problems that are causing mortality in

children under five years old as well as the geographical areas or human groups that are being affected by them.

An improvement in the information system will allow, in the first place, the stratification of mortality for identifying the areas and population groups in which the risk of dying during the first years of life is higher than the national average. After that, priority can be assigned to the strengthening and expansion of the IMCI in these areas in order to contribute improving equity in children's health conditions. Secondly, improving coverage and quality of data will allow the identification of the main causes of death in children under five years old. This will be the basis to adapt the contents of the IMCI to the epidemiological profile of each place, thus making the work of personnel, health services, and community health workers more efficient. At the same time it will allow to direct the social information, education, and communication towards the key contents that contribute to the prevention of diseases and conditions that affect the health of children under five at each place.

The best information system will also contribute to set the goals to be achieved in each geographic area inside the countries, and manifest the commitment made by the governments not only to achieve the MDGs but also to contribute to achieve them with equity. To obtain this, we must break goals into geographic jurisdictions advancing as much as possible to establishing local goals. This will allow to strengthen the commitment and to orient the efforts according to the magnitude of the reduction in mortality desired. It will also direct the investment of resources and the support towards the areas that would have the greater challenges during the next years.

The establishment of local goals will also give more visibility to the global commitment adopted by the countries by establishing what is the contribution made by each of the jurisdictions and localities so that the country as a whole can progress towards attaining their commitment in 2015. Additionally, the stratification of goals will be useful as basis for the follow-up and periodic evaluation of the advances. This will contribute to the faster identification of delays in partial goals and to the expeditious startup of mechanisms

that allow the rectification of the course and advance towards guaranteeing the achievement of the MDGs.

Dissemination of this information and promotion of the MDGs are key activities not only to make the commitment and challenges faced public, but also to contribute to having the population own the goals as a guide to personal and collective actions and to the control of the government's work, especially the one related to health. Besides these contents, the dissemination and promotion of the Key Family Practices for healthy grown and development is essential in order to transfer the knowledge and allow the families and the community to improve the care of their children in the bosom of the family.

Even when the community component and local implementation plans are progressing in this task, a sustained commitment from the Ministries of Health for the dissemination of key practices for children's care will have an important repercussion in their health.

At the health services level, the effective application of the IMCI is critical so children may receive their benefits. The evaluations performed through the follow-up after training, the periodic supervision of the health systems, and of the special evaluations, have revealed that even when personnel were trained they did not always apply the strategy in a correct way. This undermines the effectiveness of the implementation of the strategy, which is reflected in missed opportunities for the detection and early treatment of problems, which constitutes one of the most important achievements of the IMCI.

Taking into account the high investment made by the countries to train health personnel, it is essential to implement follow-up and systematic supervision mechanisms that support trained personnel in identifying problems and putting the most adequate solutions into practice. Health services will have an important role in this process—through the adjustment of work organization and coordination among all levels—and will be able to provide local alternatives to guaranteeing the effective application of the IMCI in children's care.

The epidemiological and operational research at local level together with the design and implementation of the actions based on results (investigation-actions) have shown to be very effective to improving the understanding of health problems in children, to identifying problems in care, and to improving the application of the IMCI. Currently, most of the countries in the Americas are holding these investigations and are contributing with epidemiological and operative results that improve the understanding of health conditions in childhood, the characteristics of children's care at health services and at home, and the impact of different interventions to reducing mortality and morbidity, and improving growth and development.

It is necessary to continue promoting these investigations. In this process, the role of the universities, the scientific societies, and the investigation institutions has been fundamental. Furthermore, in the design process and in the placing of these investigations into practice, the coordination with health services has strengthened and health worker performance has improved and the use of local methodologies has expanded. This has made the work of primary health care services and hospitals more efficient.

The use and application of the epidemiological and operational research related to the IMCI has also contributed to the formation of a network of health professionals and of researchers who provide their support to the implementation of the IMCI strategy, both in health services and in the community. Through this application of the protocols they also contribute to increasing the population's access to the IMCI and improving the families' understanding about the best care practices during childhood.

Also, community actions have also contributed to this through the community component of the IMCI. Through this component there has been an increase in training of community health workers and other volunteer personnel. As a result, the access to the strategy has increased for the general population, and in particular for those vulnerable groups living far from health facilities and being at higher risk of death.

Coordination among community health workers, the community and health services was also strengthened by the elaboration of local participatory plans related to the community IMCI. This constitutes a follow-up and an evaluation mechanism of the IMCI application in its three components for improving health worker's performance, functioning of health services, and knowledge and practices of the community for better care children at home.

The universities and other academic institutions have played a key role in all this process and are called to continue being important to support, strengthen and expand the application of the IMCI. Initially, the universities were an active part of the national adaptation process of the IMCI, with the participation of professors in pediatrics, infectology and clinic and other areas of medical science. As a secondary benefit of this process, many universities incorporated the IMCI in their teachings in the first years of the regional implementation of the strategy, thus accelerating the training of students and health personnel.

However, the survey performed by the PAHO and the Latin American Association of Pediatrics (ALAPE) revealed that there is still too much to do in order for the IMCI to become a central core of teaching, and to be used by students for taking care of children at first level health facilities during their practices as part of teaching of pediatrics.

By taking advantage of all the successful experiences that can be identified in many countries of the Region, it becomes necessary to reinforce the coordination with the universities so that the IMCI can be considered as a practical integrated content that facilitates primary health personnel in the task of providing efficient and quality care to children. This can be done in final courses that students take while studying medicine and other health professions, as well as in courses taken after graduation.

It is of particular importance to incorporate the IMCI among the courses taken prior to their graduation, especially for those students who are to complete their mandatory rural or social training in medicine—a modality that is currently being applied by many medicine and nursing schools in coun-

tries of the Americas and one which provides the student with the chance to practice medicine prior to obtaining their diploma. These students work in primary health services or in hospitals of low complexity that provide services to vulnerable populations inside the city and in the rural areas. It is in these areas that the IMCI covers most children diseases and health problems that make the family seek for medical attention. Therefore, IMCI provides them with an efficient and integrated quality care. In addition, it promotes the information, education and communication in relation to key contents to improve the family practices in terms of child home care, including promoting healthy behavior within the family.

To promote and support this process it is also necessary that the teaching of the IMCI become part of the new methodologies and technologies that are being used for training students at the undergraduate and graduate levels, such as long-distance learning, Internet- based education, and telemedicine, among others.

The universities also have a key role in the application of the IMCI in its own primary and hospital health services. University Hospitals and Health Centers provide not only care to the population but also become the reference places for establishing quality standards. Besides students, professionals of other services frequently visit, hospitals and university health centers in order to update their knowledge and skills on how to manage children's diseases and health problems.

The effective incorporation of the IMCI as the basic standard of primary health care at universities health services will contribute to emphasize this strategy as a recommendation to providing an adequate quality of care. In the same way, the inclusion of the IMCI in the research lines of the universities will contribute greatly to strengthening its application by health personnel when they put it into practice. It will also increase the current understanding regarding the diseases and problems currently affecting children's health and will increase the available information about the impact and results of the application of the strategy regarding mortality and morbidity during the first five years of life.

Another important contribution to increase the population's access to the strategy and support the achievement of the MDGs through the IMCI application in the most vulnerable groups is the one being provided by the non-governmental organizations (NGOs). In most countries, the NGOs have strengthened their IMCI application and have sped up the effective implementation of the community component through projects that provide care and services to the most vulnerable groups.

However, the process has not always developed with the active participation of the entire community and in coordination with health services. This has resulted in deficiencies in sustainability of projects once they have ended.

The IMCI community projects that PAHO carries out in the countries through the participatory community processes have contributed to overcome those difficulties and have become excellent examples of efficient use of the resources at all levels. They have also been the basis for a more active participation of the community in the follow-up of the implementation activities of the strategy and in the evaluation of the investment results that take place.

By using these successful experiences the NGOs's commitment can be strengthened as part of the process to increasing the population's access to the IMCI, with special emphasis to the most vulnerable groups. This commitment must include the incorporations of specific impact and inclusion indicators of the stratification goals of reducing mortality in children under five years old adopted by the governments in order to achieve the MDGs.

Finally, one of the key areas to achieving the expansion and strengthening of the IMCI is the active inclusion and par-

ticipation of the families as axis of the application process of the IMCI. According to numerous community studies, the families play a key role to determine the health conditions of children living in the continent. It is in the family where the child's risks are determined even before being born; it is the family who must take the critical decision of benefits the mother and child health with a healthy pregnancy, labor, childbirth and life.

In this way, the family is the primary and main environment to achieving that key practices be adopted to improve the care of mother and child, to promote a healthy growth and development, to recognize early danger signs for seeking care through the appropriate providers and to carry out the indicated treatment.

Through these knowledge and practices, the families will be empowered and able to resolve health problems and build a healthy family environment that will contribute not only to a better growth and development during childhood, but also to improving the conditions of health of all its members. This empowerment will also contribute to reinforce the change capabilities of the families and later of the community, while in the process of constructing healthier populations.

If we take into account that the children's situation in the Region of the Americas is still being affected by diseases and problems for which we have knowledge and technologies for prevention and control, the main challenge for the 21st century should be centered to make them at reach and applied by all the populations. The active participation of families in this process will then be the key to having all children in the continent enjoy a healthy growth and development.

10. Conclusions and Recommendations

IMCI Technical Advisory Group (TAG) Third Regional Meeting, 18 and 19 of May, 2004 Houston, Texas, United States of America

CONCLUSIONS

Adopted by the countries in 2000, the Millennium Development Goals (MDGs) aim to reduce the mortality rate in children under five years old by two thirds compared to the one in 1990, by the year 2015. The MDGs reaffirm the need to continue directing the efforts in favor of child survival in all countries of the Region.

The countries have made important progress in relation to childhood mortality during the last decades; there was a drop in mortality in children under five that has contributed to increase life expectancy in the Region of The Americas.

The reduction in mortality caused by diarrheal and respiratory diseases represented the most important contribution to increasing the life expectancy; this progress consolidated the achievements that were already being obtained by the reduction of incidence of mortality of preventable diseases through immunization.

However, the progress made is insufficient and is not equally distributed among countries of the Region of the Americas.

Approximately half a million children die annually in the continent. Diarrheal and respiratory diseases are still responsible for at least one out of four of these deaths. Peri-neonatal problems emerged as the main cause of child mortality and are currently responsible for more than 60 percent of deaths before the first year of life, and for around 40 percent of deaths in children under five.

The progress observed during the last decades is not equally distributed in the continent. If we are to compare mortality rates we can observe that the gap among countries of the Region has increased. The rate of reduction for the overall

mortality in children under five as well as for mortality caused by infectious or respiratory diseases, was different in each country. In some countries these causes are still responsible for 40 and 50 percent of deaths in children under five.

If we take this into account, we can say that the countries' commitment to achieving the MDGs in relation to mortality in children under five represents a great challenge. This challenge is even greater in those countries or areas where there has been less progress. It is also greater in those where mortality in 2000 went over the set goal—of one third less than 1990—that was established at the World Summit for Children.

It's in this context that TAG considers that the Integrated Management of Childhood Illness, IMCI, continues to be a key strategy to keep reducing mortality in children under five. It is also a key for improving the quality care of children through health services, the home and the community.

The strengthening and expansion of the IMCI—especially if the efforts are directed to reaching the most vulnerable groups—will constitute a valuable contribution to child survival and to equity, thus reducing the gap among countries and their areas.

However, TAG considers that the change in the epidemiological profile of the Region, characterized by perinatal conditions as being the main cause of infant and child mortality, requires the implementation of the IMCI perinatal component.

If we take into account that 40 percent of deaths are caused by perinatal problems we can thus say that it is only through this way that countries will be able to reduce mortality in children under five and achieve their commitment by 2015.

Considering the progresses achieved up to this moment regarding the implementation of the IMCI strategy in health services, the family and the community, and taking into account the new available components for the prevention and treatment of other diseases and problems affecting children's health, especially those associated to the perinatal period, TAG has recommended the following:

RECOMMENDATIONS

1. TAG members support with enthusiasm Resolution CD 44-R12 related to family and health because they consider that the most important decisions regarding quality of life and the child's health are taken in the bosom of the family.

They consider that the community component of the IMCI is a fundamental tool of support to reinforce the families' ability to favor children's upbringing.

2. TAG has reviewed the CD 44/12 document (The contribution of the Integrated Management of Childhood Illness, IMCI, towards achieving the Millennium Development Goals) approved by the Directing Council. TAG fully adheres to the proposals contained thereof to achieve the objectives and goals committed by the countries of the Region in the Americas in the Millennium Development Goals (MDGs), particularly the one related to the two third reduction in mortality in children under five—compared to 1990 values—by 2015.

To make progress in the specific activities, TAG considers it necessary to make use of a work plan that contemplates five-year periods, break final goals into sub-goals for each period, and includes monitoring and evaluation indicators of each of these periods.

3. To support the commitment of reducing by two thirds the mortality in children under five by 2015 with regards to the values of 1990—adopted by the highest government levels in the MDGs framework—TAG recommends that all efforts be made so that the governments

incorporate these objectives and goals as public policy and make them act like health management directives.

4. It is necessary to perform an analysis of the situation of the countries of the Region of the Americas with regards to the baseline of the objective and goal of reducing mortality in children under five that are covered in the MDGs.

TAG considers that this analysis should include stratification within the countries for which we are proposing that the Technical Unit in coordination with all units and pertinent areas support the methodology for this assessment. In this way the countries can get to know the situation and focus their actions with special emphasis to the most vulnerable groups.

5. Changes in the mortality profile as a result of the reduction in deaths for infectious and respiratory diseases and malnutrition has increased the relative importance of the perinatal problems. In this context, to achieve the goal of reducing children mortality set in the MDGs requires the incorporation of actions directed to the prevention and control of the perinatal problems.

TAG considers that the perinatal component of the IMCI is appropriate to be adapted in the countries in the Region of the Americas and should be included immediately by all of the countries, among the primary health care basic actions within the IMCI framework.

6. The objectives and goals committed by the countries to be achieved by 2015 will require, in the next years, an increase in the amount of available resources to develop, implement and expand the strategy as a way to reach the most vulnerable groups.

TAG is informed about the reduction of available resources and since it does not wish to affect the committed goals considers necessary to mobilize current resources and add the necessary ones to guarantee coverage and quality care to the most vulnerable groups. It is then recommended:

-
-
- 6.1. That a strategic plan be established directed to the search and mobilization of resources from international organizations, bilateral cooperation agencies, non-governmental organizations, and private initiative, etc.
 - 6.2. To support the countries' Ministries of Health so that governments can incorporate key resources inside their national budgets (including human resources, vaccines and essential medicines) for the implementation and expansion of the strategy and in order to guarantee its access to the most vulnerable populations.
 7. The expansion of the IMCI strategy and the incorporation of new components according to the epidemiological profile and the operative conditions of each place require, the commitment of governments as well as of the academic institutions and health networks, and the active participation of the family, the community and its organizations.
 8. TAG recommends to keep supporting the investigations that validate the results and impact of the application of the IMCI strategy and its new components.
 9. The TAG has been actively participating in the programmed activities and has contributed to the strengthening of the IMCI strategy. Its is now recommended:
 - 9.1. A greater participation of the members in advisory activities in technical aspects and projects, in strategy operationalization (personnel training and follow-up of the process, etc.), in advocacy, and in mobilization of resources.
 - 9.2. That the Technical Unit increase its communication flow with members of the TAG through information, and participation in events, etc.
 10. TAG supports and stimulates the application of available technologies in training and communication, in the indicated proportions, depending on the audience and the value systems wished to be applied.
 11. TAG recognizes the progresses and results to incorporate the strategy in pediatric texts that are used in the Region of the Americas; and recommends to continue with these efforts in order to have them included in all scientific publications of pediatrics, infectology, family medicine and public health, in accordance with the recommendations of the second meeting.
 12. To continue with these efforts to incorporate the IMCI strategy in medical schools curricula, hospitals with pediatric training programs and schools of public health in the United States and Spain, including the training of students and pediatric and family medicine residents that rotate in international pediatrics in underdeveloped countries; and coordinate activities with pertinent academic associations.
-
-

11. Annexes

Integrated management of Childhood Illness (IMCI)
Third Regional Meeting of the Technical Advisory Group (TAG)
Houston, Texas, 18 and 19 May, 2004

Meeting Agenda

FIRST DAY: TUESDAY 18TH OF MAY, 2004

- 8:00 – 8:40 Welcome Breakfast
- 8:40 – 8:55 Registration
- 8:55 – 9:25 Welcoming words from Dr. Fernando Stein, TCH/BCMM presenting:
 ✦ *Dr. Ralph D. Feigin, Baylor College of Medicine.*
 ✦ *Mr. Mark Wallace, Texas Children’s Hospital.*
- 9:25 – 10:00 Inauguration of the technical session:
 ✦ *Words from Dr. Fernando Stein, Baylor College of Medicine, Texas’s Children Hospital.*
 ✦ *Words from Dr. Yehuda Benguigui, Unit Chief, Child and Adolescent Health (CA), Family and Community Health (FCH), PAHO/WHO.*
- Participants’ presentation.
Description of the meeting mechanics.
Designating the coordinator and the narrator of the meeting.
Approval of the Agenda.
- 10:00 – 10:15 Presentation: Recommendations of TAG II, followed by a brief discussion
 Dr. Fernando Stein, TCH/BCM.
- 10:15 – 11:00 Presentation: “Current health conditions and perspectives of the Region of the Americas on the Millennium Development Goals related to childhood mortality.” *Dr. Yehuda Benguigui, Unit Chief, Child and Adolescent Health (CA), Family and Community Health (FCH), PAHO/WHO.*
- 11:00 – 11:30 Coffee-break
- 11:30 – 13:00 Group work: Analysis of the regional proposal to progress in the achievement of reducing mortality by two thirds in children under five by 2015, compared to the values of 1990.
- 13:00 – 14:30 Lunch
- 14:30 – 15:15 Presentation: Progresses and perspectives in the peri-neonatal component of the IMCI.
 Dr. Gerardo Cabrera-Meza and Dr. Rolando Cerezo, FCH/CA, PAHO/WHO.
-
-

15:15 – 15:45	Presentation: The IMCI strategy and the achievement of the Millennium Development Goals in the Region of the Americas <i>Dr. Juan Carlos Bossio, FCH/CA Advisor, PAHO/WHO.</i>
15:45 – 16:15	Coffee-break
16:15 – 18:45	Group work: Discussions and recommendations to accelerate the implementation and expansion of the IMCI peri-neonatal.
18:45 – 19:30	Coffee-break
19:30 – 21:00	Dinner- Texas Children’s International®

SECOND DAY: WEDNESDAY 19TH OF MAY, 2004

8:00 – 8:30	Breakfast
8:30 – 9:15	Presentation: “Contribution of the community component of the IMCI strategy to achieving the Millennium Development Goals: perspectives and expansion to include the IMCI peri-neonatal.” <i>Mr. Christopher Drasbek, Regional Advisor IMCI, FCH/CA, PAHO/WHO</i>
9:15 – 9:45	Document reading “Family and Health.” Approved in the 44th Directive Council of the PAHO
9:45 – 10:00	Coffee-break
10:00 – 11:00	Group work: Strengthening of the community IMCI to achieving the most vulnerable populations.
11:00 – 11:20	Presentation: The Communication Component of the IMCI strategy: Progress and Perspectives. <i>Dr. Rafael Obregón, FCH/CA, PAHO/WHO</i>
11:20 – 11:45	Presentation: Incorporation of the IMCI in the teaching of pre/post degree: current situation and perspectives. <i>Dr. Rafael Obregón, FCH/CA, PAHO/WHO</i>
11:45– 12:15	Presentation: Upcoming challenges for the strengthening and expansion of the IMCI in the Region of the Americas. <i>Dr. Yehuda Benguigui, FCH/CA, PAHO/WHO</i>
12:30 – 14:00	Lunch. Group work
14:00 – 15:00	Working group: elaboration of the final recommendations and conclusions.
15:00 – 15:30	Reading of final document and approval of the conclusions and recommendations.
16:00	Closing of the meeting ✦ <i>Dr. Fernando Stein, BCM, TCH</i> ✦ <i>Dr. Yehuda Benguigui, FCH/CA, PAHO/WHO</i>

TAG Members



Dr. Stephen Berman
Past President
American Academy of Pediatrics
Children's Hospital
Denver, Colorado, U.S.A.

Dr. Alberto Bissot
President, Pediatrics Latinamerican Association (ALAPE)
Panama
Director of the Hospital del Niño de Panama.

Dr. David E. Bratt (*)
University of West Indies
Eric Williams Medical Sciences Complex
Port of Spain, Trinidad & Tobago

Dra. Anamária Cavalcante e Silva
Superintendente da Escola de Saúde Pública de Ceará
Meireles - Fortaleza, CE, Brazil

Dr. Deise Granado-Villar MD, MPH, FAAP
Director, Division of Preventive Medicine,
Health Promotion, and Community Health
Miami Children's Hospital
Miami, FL, U.S.A.

(*) could not attend

Dr. Edgar Mohs
Costarican Ambassador in Switzerland

Dra. Elsa Moreno
Director of the Public Health Masters
Universidad Nacional de Tucumán
Tucumán, Argentina

Dr. Antonio Sáez Crespo
President of the Ibero-American Association of School
Health
Madrid, España

Dr. Fernando Stein
Associate Professor of Pediatrics
Baylor College of Medicine
Medical Director
Texas Children's International
Houston, TX, U. S. A.

Dr. Javier Torres Goitia
Director Mastery
National Reproductive Project of Health
La Paz, Bolivia

**TEXAS CHILDREN'S HOSPITAL
MEMBERS**

Mark A. Wallace
President
Chief Executive Officer
Texas Children's Hospital
Houston, Texas, U.S.A.

Dr. Ralph D. Feigin
Chief Pediatrics Department
Baylor College of Medicine
Physician-in Chief
Texas Children's Hospital
Houston, Texas, U.S.A.

Dr. Gerardo Cabrera-Meza
Associate Professor of Pediatrics
Baylor College of Medicine
Medical Director - International Neonatology
Texas Children's Hospital
Houston, Texas, U.S.A.

C. Victor Manes, MBA
Director of International Operations
Texas Children's Hospital
Houston, Texas, U.S.A.

Edgar Antistenes Vesga
International Attaché
Texas Children's Hospital
Houston, Texas, U.S.A.

ADVISORS, PAHO/WHO

Dr. Yehuda Benguigui
Unit Chief
Child and Adolescent Health (CA)
Family and Community Health (FCH)
Pan American Health Organization/World Health
Organization
Washington, D. C., U.S.A.

Mr. Christopher Drasbek
Regional IMCI Advisor
Child and Adolescent Unit (CA)
Family and Community Health (FCH)
Pan American Health Organization/World Health
Organization
Washington, D. C., U.S.A.

Dr. Rafael Obregón
Social Communication and Health Advisor, IMCI
Child and Adolescent Health (CA)
Family and Community Health (FCH)
Pan American Health Organization/World Health
Organization
Washington, D. C., U.S.A.

Dr. Rolando Cerezo
IMCI Advisor
Child and Adolescent Health (CA)
Family and Community Health (FCH)
Pan American Health Organization/World Health
Organization
Washington, D. C., U.S.A.

Dr. Juan Carlos Bossio
IMCI Advisor
Child and Adolescent Health (CA)
Family and Community Health (FCH)
Pan American Health Organization/World Health
Organization
Washington, D. C., U.S.A.



Pan American Health Organization



Regional Office of the
World Health Organization

525 23rd Street, N.W., Washington, D.C. 20037-2895, U.S.A.

Tel: (202) 974-3798 • Fax: (202) 974-3724

www.paho.org