Each year, millions of women, newborns, and children die from preventable causes. While the interventions that could save their lives are widely known, they are often not available to those most in need.

A look at the statistics worldwide shows that each year:

- More than 60 million women deliver at home without skilled care.\(^1\)
- About 530,000 women die from pregnancy-related complications, with some 68,000 of those deaths resulting from unsafe abortion.\(^2\)
- About 4 million babies die within the first month of life (the newborn period), and more than 3 million die as stillbirths.\(^3\)
- Over 10 million children under the age of 5 die.\(^4\)
- Moreover, nearly all (99 percent) maternal, newborn, and child deaths occur in low- and middle-income countries.

A *continuum of care* could meet these challenges and improve the health and survival of women, newborns, and children worldwide. There are two dimensions of the continuum of care – the maternal, newborn, child health (MNCH) continuum of care and the household to hospital continuum of care (HHCC). The goal of the HHCC approach is to ensure availability and access to quality maternal and newborn care that is provided in a seamless continuum that spans the home, community, health center, and hospital.\(^5\) This brief focuses on the former: the MNCH continuum of care.

The concept of an MNCH continuum of care is based on the assumption that the health and well-being of women, newborns, and children are closely linked and should be managed in a unified way. This model calls for availability and access to essential health and reproductive services (a) for women from adolescence through pregnancy, delivery, and beyond; and (b) for newborns into childhood, young adulthood, and beyond; because a healthy start can lead to a healthier and more productive life.

The new global Partnership for Maternal, Newborn, and Child Health (PMNCH) has adopted the continuum of care as one of its guiding principles to bring needed interventions to mothers, newborns, and children to improve their health and survival.

**Many Solutions Exist**

While many proven, cost-effective ways to save the lives of mothers, newborns, and children exist, they are not always available to those who need them most. Historically overlooked by both safe motherhood and child survival policies and programs, newborns continue to lack access to cost-effective lifesaving interventions.

The Bellagio Study Group on Child Survival estimates that universal coverage (99 percent) of 16 proven newborn health interventions could avert up to 72 percent of all newborn deaths.\(^6\) These include interventions such as tetanus toxoid immunization, skilled attendance at birth,
access to emergency obstetric care, immediate and exclusive breastfeeding, drying and keeping the newborn warm, and if needed, resuscitation, care of low birth weight infants, and treatment of infection. The series estimates that 63 percent of child mortality would be prevented with 99 percent coverage of effective and available interventions.\(^7\) In addition to newborn interventions, safe water and good sanitation; immunizations; management of diarrhea, pneumonia, and malaria; appropriate feeding practices; and access to care could significantly reduce child mortality.

The World Bank has estimated that 74 percent of maternal deaths could be averted if all women had access to interventions that address complications of pregnancy and childbirth, especially emergency obstetric care.\(^8\) The package of interventions that would prevent these deaths includes good nutrition; access to family planning; care during pregnancy, delivery, and the postpartum period; and referral services for complications.

### The Inextricable Link between Mothers, Newborns, and Children Requires an Integrated Approach

In developing countries, a mother’s death in childbirth means that her newborn will almost certainly die and that her older children are more likely to suffer from disease. Moreover, when mothers are malnourished, ill, or receive inadequate care, their newborns face a higher risk of disease and premature death.\(^9\) Almost one-quarter of newborns in developing countries are born low birth weight, largely due to their mothers’ poor health and nutritional status, which results in increased vulnerability to infection and a higher risk of developmental problems.

The quality of care that both mother and newborn receive during pregnancy, at delivery, and in the early postnatal period is essential to ensuring women remain healthy and that children get a strong start.\(^10\) Many stillbirths and newborn deaths could be averted if more women were in good health, well-nourished, and received quality care during pregnancy, labor and delivery, and if both mother and newborn received appropriate care in the postpartum period.\(^11\)

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Health policies and programs in the fields of maternal, newborn, and child health, have generally focused on one issue alone—targeting interventions to only one of these groups and obscuring important linkages. When approached together and incorporated into integrated programs, these interventions could save millions of lives at a lower cost than separate initiatives. Linking interventions in packages can reduce costs by allowing greater efficiency in training, monitoring and supervision, and use of

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**Box 1**

**The MNCH Continuum of Care at Work in India**

An example of a continuum of care in action is the Reproductive and Child Health II (RCH II) program, which uses an integrated model of health care and focuses on women’s and children’s health from birth through adulthood. With the goal of improving reproductive and child health in India, RCH II concentrates on family planning and maternal, newborn, child, and adolescent health services. The program focuses on community participation and empowering people to play an active role in their reproductive health care. The newborn and child health package includes the integrated management of neonatal and childhood illness (IMNCI) strategy, immunization, skilled care at birth, and infant and young child feeding.

Globally, the World Health Organization/UNICEF strategy, integrated management of childhood illness (IMCI), has been widely implemented to address childhood morbidity and mortality. The generic IMCI guidelines do not include any specific measures for the first week of life, the period when most newborns die.

To address newborn mortality and improve overall health care, the Indian government added a newborn component to its existing IMCI program to form an IMNCI program, adding the ‘N’ for newborns. IMNCI is a key strategy within the RCH II program. The government added home visits targeted at newborns to its existing facility-based interventions. Health workers and community nutrition and child development workers will visit newborns at home three times within the first 10 days. Workers will promote exclusive breastfeeding, early recognition of illness, and management of complications. The program will be implemented at the national level as a part of the RCH program. The cost of adding the newborn component to the existing program will be less than an estimated 10 cents per child.\(^15\)
resources. Grouping interventions will help families more easily access and take advantage of them. Linking interventions also avoids the duplication and competition over resources that can divert attention from each cause. When overall levels of financial investment are limited, working together and pooling resources can have a stronger impact.

Support for a Continuum of Care

Recent research and reports have overwhelmingly supported a shift in health care strategies toward incorporating a continuum of care approach to maternal, child, and newborn health. The 2005 World Health Report stressed the need to include the newborn in maternal and child health initiatives and to create an integrated continuum. Also in 2005, the United Nation’s Millennium Project task force on child and maternal health called for a new focus on the rights of mothers and children, investment in newborn health, and for integrated systems. Finally, The Lancet Neonatal Survival series emphasized the importance of the concept of a continuum of care while focusing on saving newborn lives.

The newborn is increasingly being recognized as the vital link between mothers and children. This acknowledgment coincides directly with greater recognition of the importance of the continuum of care. The next step is to apply this understanding in policies and programs. India, for example, has developed a strategy to reach newborns as well as older children and reproductive-aged women, through home- and facility-based care (see Box 1). Similarly, the government of Ethiopia is in the process of incorporating the newborn into existing programs and policies and is working with the Partnership for Maternal, Newborn, and Child Health to improve MNCH services through a continuum of care (see Box 2).
The Partnership for Maternal, Newborn, and Child Health

Given the magnitude of the maternal, newborn, and child mortality burden, no individual government, agency, or organization can address these challenges alone. Many governments and nongovernmental organizations (NGOs) are launching new efforts and refining, refocusing, or scaling up existing programs to meet the Millennium Development Goals (MDGs).

To create a more unified voice and facilitate the creation of a continuum of care, three separate newborn, maternal, and child health partnerships—the Healthy Newborn Partnership, the Partnership for Safe Motherhood and Newborn Health, and the Child Survival Partnership—have recently merged to form a global partnership, the Partnership for Maternal, Newborn, and Child Health (PMNCH). Members include multilateral organizations, bilateral organizations, donor agencies, professional associations, and academic institutions. This joint partnership was established to work for the achievement of maternal and child health-related MDGs by strengthening and coordinating action at all levels; promoting rapid scale-up of proven, cost-effective interventions; and advocating for increased resources. Through combined efforts and strong linkages, the goal of the PMNCH is to contribute to more efficient and effective use of resources and coordinated action.

The partnership, led by Dr. Francisco Songane, a former minister of health of Mozambique, was launched on Sept. 12, 2005 at the United Nation’s 2005 World Summit. Speaking at the launch, Thoraya Obaid, executive director of the United Nations Population Fund, described what sparked the creation of the new global Partnership for Maternal, Newborn and Child Health. The lives of up to 7 million women, children, and newborns can be saved each year, she said, if the proven and cost-effective interventions are expanded to reach those in need. A large-scale, integrated approach would be needed. “This is a major effort,” she said, “and no one agency can do it alone.”

A key feature of the PMNCH is its adoption of the continuum of care as its framework for action. It is through this continuum of care that partners work to maximize linkages between maternal, newborn, and child health and ensure that no one issue is overlooked. The creation of a continuum of care requires sustained and concerted action, human and financial resources, and a common vision.

For more information about the Partnership for Maternal, Newborn, and Child Health and to learn how to participate, visit www.pmnch.org.

Conclusion

Saving the millions of women, newborns, and children who die each year from preventable causes presents a formidable challenge. Creating a MNCH continuum of care can result in considerable progress toward achieving these goals. A continuum of care lends one voice to the interconnected fields of maternal, newborn, and child health and helps ensure that the needs of each group are included in policies and programs. The PMNCH, by melding three existing partnerships into one, is working to accelerate progress to improve the lives of families around the world.
References

13. The United Nation’s Millennium Project is an independent advisory board commissioned by the UN Secretary-General to develop a concrete action plan to meet the MDGs. Task forces corresponding to each MDG were formed to study each goal and make specific recommendations.

Acknowledgments

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