

A New Commitment to Newborn Survival

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INTRODUCTORY COMMENTARY

Well-structured and thoughtful education programs in low-income countries offer hope for dramatically improved outcomes for pregnant mothers and their newborns. The American Academy of Pediatrics, the Indian Academy of Pediatrics, the Ethiopian Pediatrics Society, and the Pediatric Association of Nigeria are collaborating by implementing a combination of learning modules for health care providers who attend to pregnant women and their newborns. This new educational effort, described in the present article, is an example of how pediatricians worldwide are working through their national professional organizations to assist in the quest for improved newborn survival rates.

—Jay E. Berkelhamer

Column Editor

The world is <500 days away from the deadline to meet targets established for 2015 by the United Nations Millennium Development Goals (MDGs). A July 2014 report from the United Nations Secretary General showed that significant progress has been made and millions of lives have been saved but that more effort is needed, specifically in maternal and child survival (MDGs 4 and 5). However, newborn deaths continue to account for 44% of all deaths among children aged <5 years.¹ Globally, 2.9 million infants die in the first month of life, and an additional 2.6 million are stillborn.¹ In addition, every day, 800 women die during pregnancy or childbirth, making it less likely that their children will survive.² The majority of these deaths are preventable.

Earlier this year, the United Nations World Health Assembly ratified the Every Newborn Action Plan (ENAP).³ ENAP envisions “a world in which there are no preventable deaths of newborns and stillbirths, every birth is celebrated, and women, babies, and children survive and thrive and reach their full potential.” ENAP recognizes the critical role of trained birth attendants because quality care in the hours preceding and after childbirth is key to eliminating preventable maternal and newborn deaths. Four of 5 newborn deaths result from 3 preventable or treatable conditions: (1) complications from prematurity and low birth weight; (2) complications during childbirth (including birth asphyxia); and (3) infection.^{3,4} Proven, low-cost interventions, health commodities, and medicines can prevent more than two-thirds of newborn deaths. Gaps in coverage, equity, and quality of care around birth and postnatal care for small and ill newborn infants exist in health facilities in many low- and middle-income countries. These gaps include insufficient numbers of trained caregivers, poor birth attendant skills, poor quality of services, and lack of access to even basic technology and medications. Practical, competency-based training for providers, and implementation of quality improvement mechanisms for clinical services can help address these barriers to optimal care and thus to child survival.⁴ Maternal nutrition before and during pregnancy, tobacco smoke exposure, and other factors also contribute to a healthy birth weight, a strong indicator of a newborn’s



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chances for survival and healthy development. Engagement and investment of national private and public sector stakeholders, in collaboration with technical experts and global stakeholders, can help ensure that sustainable interventions become incorporated into country health care systems.

Current evidence suggests that it is possible to decrease preventable neonatal deaths by $\geq 50\%$ by implementation of neonatal resuscitation and other elements of essential newborn care through educational interventions with health care providers.⁵ Basic resuscitation interventions, such as those taught in Helping Babies Breathe (HBB), which focuses on the basic steps to be taken immediately after birth and encourages comprehensive program development with local ownership and accountability, can help transfer competency into clinical practice and lead to sustainable programs that will affect neonatal mortality and morbidity.⁶ The HBB program in 8 hospitals in Tanzania was associated with a sustained 47% reduction in early neonatal mortality within 24 hours and a 24% reduction in fresh stillbirths after 2 years.⁷ Based on the successes of the HBB program and evidence in the literature for the effectiveness of essential newborn care (which includes early and exclusive breastfeeding, continuous skin-to-skin care, and other interventions), the American Academy of Pediatrics (AAP) and the Survive and Thrive Global Development Alliance partners have undertaken a new initiative for neonatal survival.

The “Helping 100 000 Babies Survive and Thrive” initiative is a partnership between the AAP and the pediatric societies of India, Ethiopia, and Nigeria, 3 of the 6 countries with the highest number of preventable newborn deaths. The vision of Survive and Thrive Global Development Alliance partners and in-country stakeholders for the initiative is, “To support the Every Newborn Action Plan—a world

in which there are no preventable deaths of newborns and stillbirths, every birth celebrated, and women, babies, and children survive and thrive and reach their full potential.”

The new initiative includes curriculum modules that directly address neonatal survival and preventable newborn deaths; together these modules are known as Helping Babies Survive. These modules include Helping Babies Breathe, Essential Care for Every Baby, Essential Care for Small Babies, and Antenatal Corticosteroids for Preterm Birth. Collectively, the pediatric societies of the United States, India, Ethiopia, and Nigeria have signed a memorandum of agreement to work with governments and other in-country stakeholders and global and national partners to develop and implement the “Helping 100 000 Babies Survive and Thrive” initiative. This commitment was announced in June 2014 at the US Agency for International Development’s Acting on the Call meeting held in Washington, DC, which marked the 2-year anniversary of the Call to Action for Child Survival.

With implementation of skills learned in the modules, birth attendants will be better equipped in supporting newborns to survive and thrive, especially those newborns born too small, too early, or unable to breathe. In addition, country plans will be developed to ensure a supply of and distribution of life-saving commodities (eg, ventilation bags and masks, suction devices, antibiotics) for low-resource settings to permit application of training and sustainability of interventions. The modules deliver education for health workers with innovative and complementary methods, and they support and empower those same health workers to improve the quality of services.

The “Helping 100 000 Babies Survive and Thrive” initiative demonstrates how professional associations can play a key role in empowering and equipping birth attendants and other

front-line health providers to change the trajectory of newborn and child health. With effective tools and materials, professionals can support the plans of their health ministries and countries to end preventable deaths. This action can help more countries reach the MDG targets, address the ENAP goals, and improve the health of children in the post-2015/post-MDG future. For more information or to become involved in the AAP Survive and Thrive Initiatives, see: <http://surviveandthrivegda.org/> and www.mchip.net/sites/default/files/mchipfiles/Survive%20thrive%20brochure.pdf.

REFERENCES

1. UNICEF, WHO, The World Bank, United Nations. *Levels & Trends in Child Mortality: Report 2013*. New York, NY: UNICEF; 2013:1. Available at: www.childmortality.org/files_v17/download/unicef-2013-child-mortality-report-LR-10_31_14_195.pdf. Accessed December 1, 2014
2. World Health Organization. Maternal mortality, fact sheet no. 348. Updated May 2014. Available at: www.who.int/mediacentre/factsheets/fs348/en/. Accessed December 1, 2014
3. World Health Organization. Every woman, every child, every newborn: an action plan to end preventable deaths. Available at: http://apps.who.int/iris/bitstream/10665/127938/1/9789241507448_eng.pdf?ua=1. Accessed December 1, 2014
4. Dickson KE, Simen-Kapeu A, Kinney MV, et al, for The Lancet Every Newborn Study Group. Every newborn: health-systems bottlenecks and strategies to accelerate scale-up in countries. *Lancet*. Available at: [http://dx.doi.org/10.1016/S0140-6736\(14\)60582-1](http://dx.doi.org/10.1016/S0140-6736(14)60582-1)
5. Child Survival Call to Action, Ending Preventable Child Deaths. Summary Report, Version 1. Available at: <http://5thbdaysaid.gov/pages/ResponseSubroadmap.pdf>. Accessed October 29, 2014
6. Ersdal HL, Singhal N. Resuscitation in resource-limited settings. *Semin Fetal Neonatal Med*. 2013;18(6):373–378
7. Msemu G, Massawe A, Mmbando D, et al. Newborn mortality and fresh stillbirth rates in Tanzania after helping babies breathe training. *Pediatrics*. 2013;131(2). Available at: www.pediatrics.org/cgi/content/full/131/2/e353

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