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## A CRITICAL ROLE FOR COMMUNITY HEALTH WORKERS IN NEWBORN HEALTH CARE AND SURVIVAL

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### **ABSTRACT:**

*Community health workers (CHWs), when properly trained, supplied, supported, and supervised, have the ability to correctly diagnose and treat the vast majority of children who suffer from pneumonia, diarrhoea, and malaria. This is supported by ample evidence gleaned from research and the actual application of this knowledge. The tremendous success made in lowering the death rate of children is in large part due to the significant contribution made by community management of childhood illnesses. Since 1990, when there were 90 fatalities per 1000 live births, the mortality rate for children under the age of five has reduced by about half all across the world. Nevertheless, throughout the same time period, there has been a substantially smaller drop in the number of neonatal fatalities. The newborn mortality rate has barely decreased by two percent annually, going from 33 deaths per one thousand live births in 2010 to 20 deaths per one thousand live births in 2019. As a direct result of this, a greater percentage of deaths among children under the age of five now occur during the first month of life.*

**Keywords:** *Community, Health Worker, Newborn, Childcare*

### **INTRODUCTION:**

The deaths of 2.8 million infants in 2013 accounted for 44 percent of all deaths among children under the age of five. In addition, the majority of these deaths occurred within the first twenty-four hours after the baby was born, and they were caused by conditions that can be prevented or treated with interventions that are already available and effective. These conditions include premature birth, birth asphyxia, and neonatal infections. The first twenty-four hours after giving birth are often regarded as the most precarious moment for a new mother [1-3].

This study demonstrates how a programme that aims to lower the death rate of infants by training and deploying community health workers (CHWs)

may lead to substantial increases in the survival rates of both babies and their mothers [4].

The continuum of care is a basic notion that underpins the administration of successful treatments for maternal, infant, and child health. This continuum encompasses the provision of care in an uninterrupted manner during pregnancy, delivery, as well as the times of caring for a newborn and an infant. It includes visits to the medical institution or hospital, as well as follow-up treatment in the community and at the patient's home. The continuum of care is a fundamental component of the Global Strategy for Women's and Children's Health that was developed by the UN Secretary-General [5], and it is represented in the Every Newborn Action Plan that was introduced in June of 2014 [6].

Community health workers are an extremely important part of the process of making a continuum of care possible. They serve as the connecting link between the community and the medical centre. The World Health Organization (WHO) and the United Nations Children's Fund (UNICEF) have collaborated to create a package of resources named Caring for Newborns and Children in the Community. This bundle includes three different training and support programmes for community health workers (CHWs). To summarise, they are as follows:

#### **Caring for the Newborn at Home:**

Women get guidance from the CHW during a total of five visits to their homes: two during pregnancy, one on the day of delivery if the mother gave birth at home, or shortly after she has returned home from the health facility, and on days 3 and 7 following giving birth. Babies who were born with a low birth weight may need further checkups.

#### ***Caring for the Child's Healthy Growth and Development:***

The CHW provides families with guidance on techniques that may be carried out at home, such as newborn feeding, communication and play for child development, recognising and responding to children illnesses, and the prevention of illnesses (handwashing, vaccination, use of bednets).

#### ***Caring for the Sick Child in the Community:***

The Community Health Worker (CHW) evaluates, categorises, and treats children ages 2 months to 5 years old who have pneumonia, diarrhoea, or malaria. Additionally, the CHW evaluates for malnutrition. Oral rehydration salts (ORS), zinc pills, an antibiotic, and medication to treat malaria are the four different types of drugs that are used in the therapy interventions.

The majority of the programming experience that has been gained to this point has been with integrated community case management, which is another name for caring for ill children in the community. There is no room for debate on the significance of this curative treatment, and its use is growing in a variety of countries. In the meanwhile, community health workers are also capable of doing

a wide variety of additional duties. The knowledge gained via participation in iCCM may assist decision-makers in determining the most effective ways to include CHWs into plans designed to increase the number of newborns who survive.

### **HOME VISITS FOR THE CONTINUUM OF CARE:**

Strategies aimed at training and deploying community health workers show a great deal of potential in boosting access to treatment and care for pregnant women and their newborn children. There is abundant data on the usefulness of home visits throughout pregnancy and after delivery to enhance mother and infant survival. Although the judgement is still out on the programmatic viability of CHW treatment of unwell newborns, the jury is in on the value of home visits during pregnancy. Home visits are an efficient method of providing medical treatment, enhancing fundamental procedures for the care of newborns, and spotting early warning signs of sickness in both mothers and their infants, particularly in areas with high rates of infant mortality. The UNICEF and WHO Joint Statement on Home Visits for Newborn Care [7] presents a number of suggestions and discusses the research that supports each of them, all while taking into account the factors that are relevant to the implementation of the programme.

#### ***During pregnancy:***

According to the report Fulfilling the Health Agenda for Women and Children [8] published in 2014, over half of pregnant women in poor countries still do not attend prenatal care appointments, and 37 percent do not get any expert care during the birth of their babies. When it comes to advising, motivating, and enabling families to obtain prenatal care from a certified health professional, community health workers (CHWs) may play a pivotal role. In addition to this, they assist the family in getting ready for the delivery by ensuring that they are aware of where to go and assisting them in overcoming obstacles with money, transportation, and other required family logistics.

A Community Health Worker (CHW) who has received training in the relevant WHO/UNICEF package seeks out pregnant women in the community and pays each of them two home visits [9].

#### ***Postnatal care:***

The postnatal period, which consists of the days and weeks after the delivery of a baby, is a very important time in the lives of both new mothers and their infants. It is possible that occurrences that take place during this time period will have a significant impact on the health of both the mother and the infant.

It is also the most hazardous moment, when the majority of fatalities among mothers and infants take place. However, this time of year receives the least amount of attention when it comes to the delivery of excellent services. The

evidence for a series of recommendations that address the timing, number, and place of postnatal contacts, as well as the content of postnatal care for all mothers and babies during the first six weeks after birth is outlined in a document that was just recently published and titled "WHO Recommendations on Postnatal care of the Mother and Newborn" [10]. This document provides a summary of the evidence for these recommendations. The evaluation of both the moms and the neonates to identify any potential issues or difficulties is also included in the guidelines. Breastfeeding mothers and their babies may benefit from a variety of different postnatal care treatments and interventions that can be provided by CHWs.

***Pre-and post-natal visits:***

Home visits may lower the number of deaths of newborns in high-mortality settings in developing countries by as much as 61 percent, according to studies that were done in Bangladesh, India, and Pakistan [11–15]. The visits also enhanced coverage of important newborn care practises that were being performed in the home. This research, which complements the experience gained in circumstances typical of industrialised countries, shows that postnatal home visits are successful in enhancing breastfeeding rates as well as parenting abilities [16].

An additional observational cohort research was conducted in Bangladesh to investigate the impact of postnatal care home visits performed by trained CHWs on the death rates of neonates [17]. According to the findings of the research, neonatal mortality was reduced by 67 percent among newborns who made it through their first day of life as compared to infants who did not get a visit on their first day of life. Receiving the first visit on the second day of birth was linked to a newborn death rate that was 64 percent lower than that of individuals who did not get a visit during the first two days of life.

In the United Republic of Tanzania, a cluster-randomized controlled study was conducted to assess the influence that home-based counselling had on infant care practises [18]. In this research, trained volunteers conducted home visits throughout pregnancy and after delivery to promote recommended newborn care behaviours including cleanliness and breastfeeding. These activities were deemed important for the health of the newborns. They were also able to identify low birth weight infants and give further treatment for them. Improvements in home care practises included delaying the baby's first bath by at least six hours (81 percent in intervention areas vs. 68 percent in control areas), exclusively breastfeeding the infant for the first three days after birth (83 percent vs. 71 percent), not putting anything on the cord (87 percent vs. 70 percent), and, for home births, tying the cord with a clean thread (69 percent vs 39 percent ).



***Photo: Courtesy of Christine Nesbitt, UNICEF (@UNICEF/CHRISTINE NESBITT)***

The impact of home-based newborn care delivered by community health professionals on the prevention of neonatal, infant, and perinatal death was examined in a comprehensive review of randomised controlled trials [19]. [Citation needed] [19] Home visits were made throughout pregnancy in four of the trials, and home-based preventative and/or curative newborn care was provided in all of the trials. Additionally, community mobilisation efforts were made (4 trials). A lower risk of death during the newborn and perinatal periods was related with the intervention. In one study, there was a discernible decrease in the number of infants who passed away. Subgroup and meta-regression studies revealed that a bigger impact would be seen with a higher newborn death rate at baseline. This analysis provided more support for the idea that home-based newborn care solutions should be used in South Asian settings with high neonatal death rates and limited access to health facility-based treatment. The Newhints cluster-randomized experiment was conducted in Ghana to investigate the impact of home visits by trained community-based surveillance volunteers (CBSVs) on neonatal mortality and home care practises [20]. The Neighborhood Health Service Volunteers (CBSVs) in the study zones received training to identify pregnant women in their community and to conduct two home visits while the woman was pregnant and three visits in the first week after the baby was born. During these visits, they educated parents on fundamental infant care practises, weighed newborns, evaluated them for potential risks, and referred parents where appropriate. The newborn mortality rate (NMR) overall was reduced by 8% as a consequence of the intervention, which is a lesser drop than the findings seen in South Asia. The estimate derived

from the summary of the meta-analysis points to a decrease in NMR of 12 percent.

An evaluation of a cluster-randomized controlled trial of a package of community-based maternal and newborn interventions in Bangladesh [13] found that community health workers (CHWs) identified pregnant women, made two antenatal home visits to promote birth and newborn care preparedness, made four postnatal home visits to negotiate preventive care practises and to assess newborns for illness, referred sick neonates to a hospital, and facilitated compliance in the intervention sites. CHWs also referred pregnant women to antenatal and postnatal care providers. As a result of the research, there was a high rate of coverage for prenatal home visits (91 percent visited twice), as well as postnatal home visits (69 percent visited on days 0 or 1). There was no effect on the death rate of newborns, but there were noticeable changes in newborn care practises and in the number of people seeking treatment for their newborns. In rural Pakistan, Bhutta et al. [21] conducted a pilot research in 2008 to examine the feasibility of implementing a community-based intervention package to improve perinatal care employing lady health workers (LHWs) and traditional delivery attendants (Dais). The LHWs received training on fundamental aspects of maternity and neonatal care. They met in groups to educate the community, were encouraged to form connections with neighbourhood Dais, and received help from volunteer health committees. The efforts resulted in a decrease in infant mortality (from 57.3 to 41.3 per 1000 live births), as well as an increase in the percentage of facility deliveries (from 18 percent to 30 percent). There was also an increase in critical infant care habits such as delayed washing, care for the umbilical cord, and early and exclusive nursing of newborns.

Recent findings from the African Neonatal Sepsis Trial (AFRINEST) studies conducted in the Democratic Republic of the Congo, Kenya, and Nigeria [22,23] demonstrate that CHWs are able to conduct an adequate assessment of a newborn for signs of illness, weigh the infant, and refer the newborn to medical care if necessary.

Home visits are made across Ethiopia by Health Extension Workers, who are also responsible for the care of unwell babies found in the community. It is important to highlight that these are not your normal CHWs since they have had nearly a whole year's worth of pre-service training and there is a national policy in place that gives them permission to treat neonates who have infections.

## **CONCLUSION:**

As nations strive toward lowering the death rate among children under the age of five and meeting the fourth Millennium Development Goal by 2015, accelerated action against the primary causes of child mortality is an absolute need. In order to adequately reduce death rates among children under the age of

five, there has to be a greater focus on newborns, as well as, within the context of the continuum of care, mothers before and after they give birth. Reaching out to disadvantaged people and providing them with the vital health care they need is necessary in order to accomplish this goal.

It is generally agreed upon that community health professionals may play a pivotal role in preventing deaths of mothers, newborns, and children in settings where such fatalities are avoidable. The Every Newborn Action Plan lays us an unmistakable picture for the future. In order to assist the implementation of a community-based approach, there are publications that include policies and recommendations, which give the most recent information possible, and training materials are also accessible.

CHWs are able to identify pregnant women and newborns who require medical attention and care, promote and encourage appropriate careseeking, and provide counselling and support for home care practises across the periods of pregnancy, newborn care, and childhood. CHWs can also identify women who are pregnant and newborns who are in need of medical attention and care. CHWs are able to increase treatment adherence and follow-up because they serve as the primary connection between a community and the health institution that serves that community as well as between the population and the health professionals. Community health workers are an essential investment choice that should be considered as a component of a complete primary health care system. For plans including CHW to be effectively implemented, there must be policy backing, training, monitoring, performance maintenance, and frequent supply replenishment. In addition, community health workers are increasingly accountable for a wide variety of activities related to both health and development; hence, any extension of their responsibilities requires careful consideration in this context.

#### REFERENCES:

- 1) George A, Menotti EP, Rivera D, Montes I, Reyes CM, Marsh DR. Community case management of childhood illness in Nicaragua: Transforming health systems in underserved rural areas. *J Health Care Poor Underserved*. 2009;20(4) Suppl:99–115. doi: 10.1353/hpu.0.0205. [PubMed] [CrossRef] [Google Scholar]
- 2) Yeboah–Antwi K, Pilingana P, Macleod WB, Semrau K, SiazeeleK.Kalesha Pet al. Community case management of fever due to malaria and pneumonia in children under five in Zambia: A cluster randomized controlled trial. *PLoS Med* 2010;7e1000340. 10.1371/journal.pmed.1000340 [PMC free article] [PubMed] [CrossRef] [Google Scholar]
- 3) UN Interagency group for child mortality estimation. Report 2014. Levels and trends in child mortality. New York: UNICEF, 2014. Available

- at: [http://www.childmortality.org/files\\_v17/download/UNICEF%202014%20IGME%20child%20mortality%20Report\\_Final.pdf](http://www.childmortality.org/files_v17/download/UNICEF%202014%20IGME%20child%20mortality%20Report_Final.pdf). Accessed: 1 October 2014.
- 4) Save the Children International. State of the world's mothers: surviving the first day. London, UK: Save the Children International, 2013. [Google Scholar]
  - 5) The Partnership for Maternal, Newborn and Child Health. Global strategy for women's and children's health, United Nations Secretary-General, 2010. Available at: [http://www.who.int/pmnch/activities/advocacy/fulldocument\\_globalstrategy/en/](http://www.who.int/pmnch/activities/advocacy/fulldocument_globalstrategy/en/). Accessed: 1 October 2014.
  - 6) The Every Newborn. The Every Newborn Action Plan 2014. Available at: <http://www.everynewborn.org/every-newborn-action-plan>. Accessed: 1 October 2014.
  - 7) World Health Organization, United Nations Children's Fund. WHO and UNICEF Joint Statement. Home visits for the newborn child, a strategy to improve survival. New York, USA: WHO and UNICEF, 2009. [Google Scholar]
  - 8) Countdown to 2015. Fulfilling the health agenda for women and children. 2014 report. Geneva: WHO and UNICEF, 2014. Available at: [http://www.countdown2015mnch.org/documents/2014Report/Countdown\\_to\\_2015-Fulfilling%20the%20Health\\_Agenda\\_for\\_Women\\_and\\_Children-The\\_2014\\_Report-Conference\\_Draft.pdf](http://www.countdown2015mnch.org/documents/2014Report/Countdown_to_2015-Fulfilling%20the%20Health_Agenda_for_Women_and_Children-The_2014_Report-Conference_Draft.pdf). Accessed: 1 October 2014.
  - 9) World Health Organization and the Global Health Workforce Alliance. Global experience of community health workers for delivery of health related Millennium Development Goals, 2010. Available at: <http://www.who.int/workforcealliance/knowledge/publications/alliance/CHWreport.pdf>. Accessed: 1 October 2014.
  - 10) World Health Organization. Recommendations on postnatal care of the mother and newborn. Geneva: WHO, 2013. Available at: [http://apps.who.int/iris/bitstream/10665/97603/1/9789241506649\\_eng.pdf](http://apps.who.int/iris/bitstream/10665/97603/1/9789241506649_eng.pdf). Accessed: 1 October 2014.
  - 11) Baqui AH, El-Arifien S, Darmstadt G, Saifuddin A, Williams EK, Seraji HR, et al. Projahnmo Study Group Effect of community-based newborn-care intervention package implemented through two service-delivery strategies in Sylhet district, Bangladesh: a cluster-randomised controlled trial. *Lancet*. 2008;371:1936-44. doi: 10.1016/S0140-6736(08)60835-1. [PubMed] [CrossRef] [Google Scholar]
  - 12) Kumar V, Mohanty S, Kumar A, Misra RP, Santosham M, Awasthi S, et al. Effect of community-based behaviour change management on neonatal mortality in Shivgarh, Uttar Pradesh, India: a cluster-

- randomised controlled trial. *Lancet*. 2008;372:1151–62. doi: 10.1016/S0140-6736(08)61483-X. [PubMed] [CrossRef] [Google Scholar]
- 13) Darmstadt GL, Choi Y, Arifeen SE, Bari S, Rahman SM, Mannan I, et al. Evaluation of a cluster-randomized controlled trial of a package of community-based maternal and newborn interventions in Mirzapur, Bangladesh. *PLoS ONE*. 2010;5:e9696. doi: 10.1371/journal.pone.0009696. [PMC free article] [PubMed] [CrossRef] [Google Scholar]
- 14) Bhutta ZA, Soofi S, Cousens S, Mohammad S, Memon ZA, Ali I, et al. Improvement of perinatal and newborn care in rural Pakistan through community-based strategies: a cluster-randomised effectiveness trial. *Lancet*. 2011;377:403–12. doi: 10.1016/S0140-6736(10)62274-X. [PubMed] [CrossRef] [Google Scholar]
- 15) Bhandari N, Mazumder S, Taneja S, Sommerfelt H, Strand TA. Effect of implementation of Integrated Management of Neonatal and Childhood Illness (IMNCI) programme on neonatal and infant mortality: cluster randomised controlled trial. *BMJ*. 2012;344:e1634. doi: 10.1136/bmj.e1634. [PMC free article] [PubMed] [CrossRef] [Google Scholar]
- 16) Hannula L, Kaunonen M, Tarkka MT. A systematic review of professional support interventions for breastfeeding. *J Clin Nurs*. 2008;17:1132–43. doi: 10.1111/j.1365-2702.2007.02239.x. [PubMed] [CrossRef] [Google Scholar]
- 17) Baqui AH, Ahmed S, El Arifeen S, Darmstadt G, Rosencrans AM, Mannan I, et al. Effect of timing of first postnatal care home visit on neonatal mortality in Bangladesh: a observational cohort study. *BMJ*. 2009;339:b2826. doi: 10.1136/bmj.b2826. [PMC free article] [PubMed] [CrossRef] [Google Scholar]
- 18) Penfold S, Manzi F, Mkumbo E, Temu S, Jaribu J, Shamba D, et al. Effect of home-based counselling on newborn care practices in southern Tanzania one year after implementation: a cluster-randomised controlled trial. *BMC Pediatr*. 2014;14:187. doi: 10.1186/1471-2431-14-187. [PMC free article] [PubMed] [CrossRef] [Google Scholar]
- 19) Gogia S, Sachdev HS. Home visits by community health workers to prevent neonatal deaths in developing countries: a systematic review. *Bull World Health Organ*. 2010;88:658–666B. doi: 10.2471/BLT.09.069369. [PMC free article] [PubMed] [CrossRef] [Google Scholar]
- 20) Kirkwood BR, Manu A, ten Asbroek AH, Soremekun S, Weobong B, Gyan T, et al. Effect of the Newhints home-visits intervention on neonatal mortality rate and care practices in Ghana: a cluster randomised

- controlled trial. *Lancet*. 2013;381:2184–92. doi: 10.1016/S0140-6736(13)60095-1. [PubMed] [CrossRef] [Google Scholar]
- 21) Bhutta ZA, Memon ZA, Soofi S, Salat MS, Cousens S, Martines J. Implementing community-based perinatal care: results from a pilot study in rural Pakistan. *Bull World Health Organ*. 2008;86:452–9. doi: 10.2471/BLT.07.045849. [PMC free article] [PubMed] [CrossRef] [Google Scholar]
- 22) AFRINEST Group Simplified regimens for management of neonates and young infants with severe infection when hospital admission is not possible. *Pediatr Infect Dis J*. 2013;32:S26–32. [PMC free article] [PubMed] [Google Scholar]
- 23) AFRINEST Group Treatment of fast breathing in neonates and young infants with oral amoxicillin compared with penicillin–gentamicin combination. *Pediatr Infect Dis J*. 2013;32:S33–8. [PMC free article] [PubMed] [Google Scholar]