



A Proposal to Decrease Neonatal Mortality in Apam, Ghana through Home Visitation by Community Health Nurses

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Introduction

In Ghana, the nation-wide neonatal mortality rate is 30 deaths per 1000 live births, and neonates account for 60% of the deaths in infancy. The central region of the country has much worse outcomes than this, with a neonatal mortality rate of 47 per 1000 live births.¹ Apam is a coastal town in the Central Region of Ghana, located approximately 45km east of the regional capital of Cape Coast. Between January and August of 2013, 63% of neonatal admissions for umbilical cord infections (omphalitis) at St. Luke's Catholic Hospital, were among infants delivered outside of a health facility. This is likely because of practices used to cut and clean the cord in the perinatal period. St. Luke's Catholic Hospital has a team of community health nurses in place who already promote healthy maternal and neonatal practices such as the use of antenatal care, exclusive breastfeeding and regular postnatal care visits with a nurse or physician. This poster explores the evidence in support of a strategy to reduce neonatal mortality among infants born outside a health facility through the distribution of clean delivery kits and promotion of healthy cord practices by community health nurses.

Methods

Relevant research concerning causes rates and causes of neonatal mortality in Sub-Saharan Africa and in Ghana was identified by searching Pubmed and Medline. Search terms included "neonatal mortality" plus "cord infections" plus "Ghana" or "community health workers" in the title or abstract. Articles reviewing causes of neonatal mortality in the region and articles summarizing past efforts to combat neonatal mortality using community-based schemes were given special attention.

Literature

There is a strong body of evidence supporting the use of community health workers (CHWs) to promote practices that reduce neonatal cord infections cord infections. The use of CHW-distributed chlorhexidine has been associated with up to 75% reductions in omphalitis and 24% reductions in neonatal mortality compared to dry cord care; and interventions discouraging placement of traditional substances on the umbilical cord significantly reduced rates of omphalitis and neonatal tetanus.² Specifically, distribution of clean cord kits to women who are most likely to deliver outside of a health facility is associated with significant reductions in omphalitis and neonatal sepsis.³ As such, clean delivery kits have been recommended by the WHO for this purpose.^{4,5}

Currently, even women who plan to deliver at home attend antenatal care visits with the community health nurses. It should thus be easy for the nurses to counsel pregnant women about the need for clean cord care, and encourage them to use the cord kits.



With the Community health nurses at St. Luke's Catholic Hospital

Summary

1. The bulk of childhood and neonatal deaths in Sub-Saharan Africa occur secondary to infectious causes.⁶
2. Omphalitis contributes a significant amount of neonatal infections; and are more common among infants delivered outside a health facility.
3. Neonatal home visits and distribution of clean cord kits by community health workers have been shown to reduce rates of omphalitis and neonatal sepsis

References

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UNFPA's clean delivery kit including: a bar of soap, a clean plastic sheet to lie on on, a razor blade for cutting the umbilical cord, a sterilized umbilical cord tie, a cloth to keep the baby warm, and latex gloves. The kits cost \$2-\$3.

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