UNEST
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INTEGRATING COMMUNITY HEALTH WORKERS INTO MATERNAL & NEWBORN HEALTH:
Implications for achieving MDG No. 4 in Uganda

It is just five years to the 2015 target of attaining the Millennium Development Goals (MDGs). But achieving the MDG for Child Survival (MDG No.4) remains a challenge, especially due to failure to reduce neonatal deaths in low income countries. Globally, an estimated 3.8 million newborn babies die every year, and a similar number of stillbirths occur. In Uganda, these put together make an estimated 90,000 deaths or 6430 mini-buses (14 seater taxis) or 1125 buses full of dead babies. Preliminary experiences from the Uganda Newborn Study show that when linked to health facilities, community health workers are a low cost measure to help achieve MDG No.4

MDG GOAL No. 4: REDUCE CHILD MORTALITY
TARGET: Reduce by two thirds, between 1990 and 2015, the under- five mortality rate
UNEST says: "Community health workers can make a difference."

Whereas child mortality is decreasing in Uganda, newborn and maternal mortality have remained high and stagnated for over a decade. These deaths occur despite the fact that there exist simple and affordable interventions that can significantly reduce newborn deaths. But existing evidence shows that these do not reach most newborn babies or their mothers, especially among the rural and urban poor, although there is a favourable national policy.

Researchers at the Makerere University School of Public with support from colleagues from Karolinska Institutet in Sweden, the Uganda Ministry of Health, the World Health Organisation and Save the Children, are conducting a community-based facility linked newborn study in Iganga and Mayuge districts in eastern Uganda. Also called the Uganda Newborn Study (UNEST), its aim is to adapt, develop and cost an integrated maternal-newborn care package that links community and facility care, and evaluate its effect on maternal and neonatal practices in order to inform policy and scale-up in Uganda.

A mother using the kangaroo mother care initiative to boost the health of her pre-term baby

The study has three components, namely:

1. Training and supervising community health workers to visit pregnant two times and another three times to newly delivered women and their newborn babies in the first week after birth;
2. Strengthening linkages between the community and health facilities;
3. Health facility strengthening through training of health workers on essential maternal-newborn care skills and provision of basic supplies and implementation of maternal and perinatal audit.

Did You Know?

In Uganda:

- Total fertility rate is high at 6.7 per woman
- Mortality rate for under-fives is 137 per 1000 live births
- Neonatal Mortality Rate is 29 per 1000 live births
- Maternal mortality rate is 435 per 100,000 live births
- Antenatal attendance is recommended 4 times, but the attendance rate is only 42 percent
- Supervised deliveries are at 42 percent of all deliveries
- Emergency obstetric care met need is only 14 percent
- 12 percent of newborn babies have low birth weight
- An estimated 44,500 neonatal deaths and 45,100 stillbirths occur per year, of which 31,800 could be saved by simple interventions proven to work.
- Preventable causes of newborn deaths dominate, with infections and tetanus accounting for an estimated 31 percent of causes of neonatal deaths, followed by birth asphyxia (27%) and complications of preterm delivery (25%).

Intervention: The agreed CHW package

Home visits during pregnancy

1st home visit during pregnancy (Timing: First trimester or as early as possible)

- Negotiation for Antenatal Care, at least 4 ANC visits at health facility
- Birth preparedness; prepare for a clean delivery with mother and family members.
- Screen for danger signs and facilitate referral
- Counsel on family planning
- Health education

2nd visit during pregnancy (Timing: 3rd trimester, 7-8months)

- Reinforce birth preparedness
- Encourage delivery in health facility
- Counsel on;
  - Maternal and newborn danger signs
  - Family planning
  - Immediate newborn care practices (initiation/exclusive breast feeding, clean cord care, warm care and delayed bathing)

Visits after delivery

1st Post partum visit (Timing: within 24 hrs after delivery)

- Screen/assess for and counsel on maternal and newborn danger signs, facilitate referral in case of danger signs
- Take newborn temperature and assess for difficult breathing
- Thermal care (skin to skin, wrapping and delayed bathing)
- Eye care with tetracycline ointment
- Support immediate, exclusive breast/ feeding and clean cord care. If not breast feeding, the CHW should determine why and support accordingly
- Refer for immunization (if applicable) and facilitate birth registration
- Counsel on family planning

2nd Postpartum visit (Timing: third day after delivery)

- Screen for maternal and newborn danger signs and if present facilitate referral
- Reinforce thermal protection and cord care
- Take temperature and assess for difficult breathing
- Refer for vaccination (if applicable)
- Counsel mother on breast feeding, cord care, skin care and birth spacing

3rd Post partum visit (Timing: 7th day after delivery)

- Follow up on problems which mother had previously
- Check and counsel on breast attachment and positioning, exclusive breast feeding, ITN use, good nutrition, rest for mother and family planning
- Hygiene, cord care and skin care
- Danger signs in mother and baby and refer if present
- Refer for immunization
- Reinforce thermal protection
- Promote access to under five clinics and family planning at 6 weeks
- Conduct 2 subsequent visits for Low Birth weight) LBW babies to promote Kangaroo mother Care (KMC)

Preliminary Findings

Community health workers are selected along the Uganda village health team approach by the districts. They are trained for five days and supervised by health workers from the nearby health units. The CHWs are given a monthly transport refund of UGX 10,000 ($5) as an incentive.

1.Community health workers are effective in making home visits during pregnancy and delivery as is shown in figure 1.

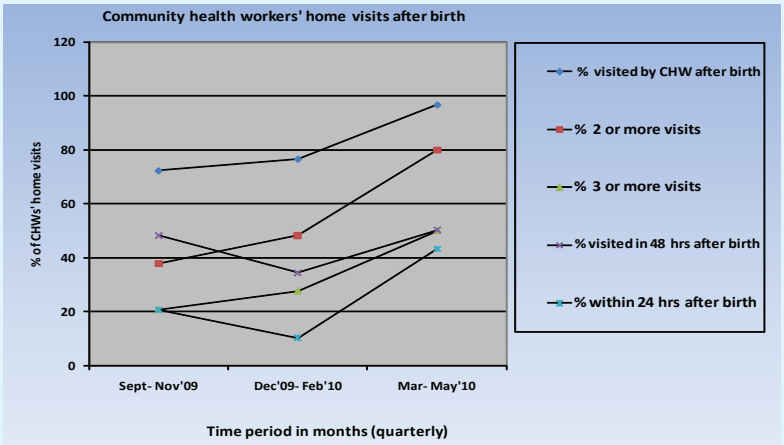

Figure 1: CHWs' visits after birth

Preliminary Findings.. *cont'd*

2.CHWs are helping mothers improve knowledge of pregnancy and newborn danger signs as is shown in figure 2.

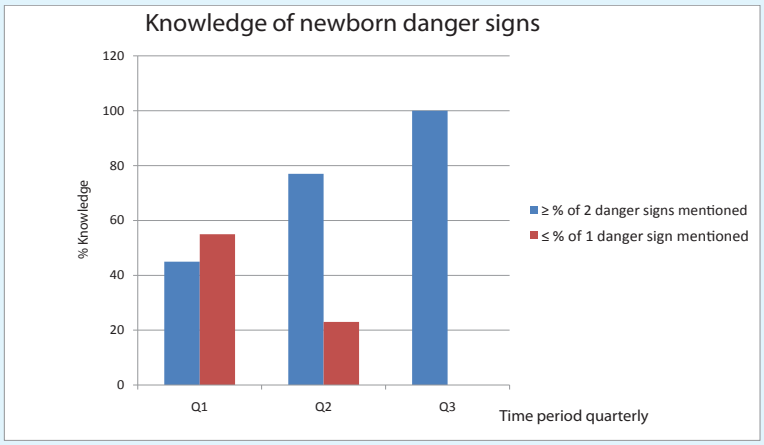

Figure 2: Knowledge of newborn danger signs

3.CHWs are helping improve ANC attendance and the proportion of women who deliver in health facilities. Through monitoring, we have seen that:

- 70 percent of mothers attended ANC at least 3 times compared to 31 percent at baseline.
- Percentage deliveries from hospital or health facilities are also improving – from 46 percent at baseline to 53 percent currently.

4.CHWs are helping improve some newborn care practices although others are difficult

- Early bathing in the first 6 hours following birth has decreased from 56 percent at baseline to 20 percent currently. However, only 14 percent (an improvement from 4% at baseline) of mothers delay bathing more than 24 hours.
- There is improvement in breastfeeding practices. The proportion of women who initiate breastfeeding immediately is now 60-80 percent compared to 52 percent at baseline. However, other feeds are still given to about 30 percent of babies (compared to 35% at baseline) in the neonatal period.
- CHW drop out is a problem in urban areas
- Cord care –57 percent (compared to 49% at baseline) of mothers still put substances on the cord contrary to recommendation of putting nothing. This is an area that is still difficult to change despite efforts by CHWs.

Some Preliminary implications for policy

As the Uganda Government prepares to fully operationalise the Village Health Teams, a largely community driven initiative, experience from the Uganda Newborn Study can offer some lessons to inform policy. Based on UNEST's preliminary experiences, these are some lessons leant:

How to get effectiveness of CHWs

- A specially designed 5 day training package coupled with effective supervision by health workers can impart skills in Community Health Workers.
- When CHWs are well integrated into the community, they are able to identify children with danger signs among newborns. Women also easily appreciate them and are encouraged to self report pregnancies.
- A well designed Behaviour Change Communication intervention by CHWs can improve birth preparedness, contrary to briefs that Africans do not prepare for the unborn child.
- Conducting CHW trainings closer to their communities is feasible, preferable and makes them appreciated in the target population.

Prerequisites for CHW performance

- For CHWs to be effective there is need for strengthening the quality of maternal and newborn care at health facilities in order to complement the work of CHWs. For instance, a Kangaroo mother care room and a designated admission section for newborns have been established at Iganga Hospital, and this has led to more referrals of low birth weight babies to the facility.
- Prior to CHW programme introduction, there is need for involvement of many key stakeholders such as Traditional Birth Attendants, private providers and men.

Challenges for CHW work

- CHWs need to be motivated with incentives like a monthly allowance, bicycles, and umbrellas, and likewise, medication and insecticide treated nets are some of the material things that mothers can be availed, to appreciate community interventions.
- Selection of CHWs based on permanent residence (ownership of a home/building) can help minimize the dropout rate in urban settings.

Conclusion:

Preliminary experiences from the Uganda Newborn Study show that this low cost intervention which integrates CHWs into maternal and newborn health, if linked to basic improvements in facility care, can lead to better indicators in rural settings. However, the challenge is how to manage CHW motivation to minimize drop out and loss of momentum. We believe that nothing comes free – so

A CHW educating a couple on care of their newborn baby

investments in CHW motivation must be done if we are to improve maternal and newborn health, and thereby have a chance of achieving MDG 4. The current CHW intervention needs to be supported and scaled-up.

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Further Reading

Papers

1. Peter Waiswa, Stella Nyanzi, Sarah Namusoko, Stefan Peterson, Goran Tomson , George Pariyo. Community perceptions and care of preterm babies in Eastern Uganda. In press TMIH (2010)
2. Peter Waiswa Karin Kallander, Stefan Peterson, Goran Tomson, George W. Pariyo. Using the three delays model to understand why newborn babies die in eastern Uganda. Tropical Medicine & International Health Vol15; 8, August 2010, 964-972
3. Waiswa P., Peterson S, Tomson G, Pariyo G. W.,(2009). Poor newborn care practices – a population based study in eastern Uganda, BMC Pregnancy and Childbirth 2010, 10:9
4. Pattinson R, Kerber K, Waiswa P, Day LT, Mussell F, Asiruddin SK, Blencowe H, Lawn JE. Perinatal mortality audit: counting, accountability, and overcoming challenges in scaling up in low- and middle-income countries.
5. Waiswa, P., Kemigisa, M., Kiguli, J., Naikoba S., Pariyo, G. W., Peterson, S. Acceptabilityof evidence-based neonatal care practices in rural Uganda -implications for programming, BMC Pregnancy & Childbirth, 8 (21) (2008).

Academic Book

6. Understanding Newborn Care in Uganda - Towards Future Interventions http://www.amazon.co.uk/gp/product/images/3838319591/ref=dp_image_0?ie=UTF8&n=266239&s=books

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Credits

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