

Maternal Health Knowledge Cafe

- Summarize key facts related to maternal health
- Understand the state of evidence related to maternal health service delivery at the community level
- Discuss experiences and gaps for implementation and for learning/research



Maternal Health Task Force

The Maternal Health Task Force strives to create a strong, well-informed and integrated community of individuals around the globe focused on ending preventable maternal mortality and morbidity worldwide.





Maternal Health: A continued challenge

Maternal deaths per 100,000 live births (MMR), 2015

Source: Trends in maternal mortality: 1990 to 2015



Complications Sepsis and other maternal infections of abortion Causes of maternal (18%) (9%) mortality, 2013 Source: Graham, et al. Lancet maternal health series, 2016 Other maternal disorders (22%) Haemorrhage (18%) Obstructed labour (8%) Indirect causes Hypertensive disorders (12%) HIV/AIDS (12%) (1%) Maternal Health **Task Force**

Maternal Health: When and how are women dying?

Maternal Health and the Sustainable Development Goals

Goal 3: Ensure healthy lives and promote well-being for all at all ages

By 2030, reduce the global maternal mortality ratio to less than 70 per 100,000 live births

By 2030, no country should have a MMR greater than 140 per 100,000 live births

How? Good quality, evidence-based, affordable, and respectful maternal health services for every woman, everywhere











Maternal Health and the Life Cycle



Good quality, evidence-based, affordable, and respectful maternal health services for every woman, everywhere AND during:

- Preconception
- Newborn
- Childhood
- Adolescence

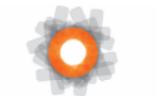
Source: MARCH | Centre for Maternal Adolescent Reproductive & Child Health @ LSHTM



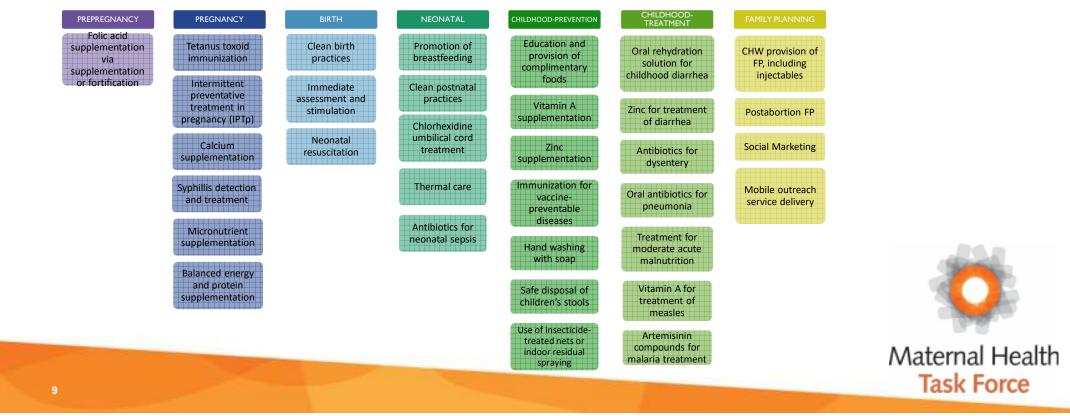
What is the State of Evidence for Community-Based Maternal Health Service Delivery?

We now have substantial evidence showing that community health workers can reduce maternal mortality.

We also have important evidence showing that communitybased family planning can reduce maternal mortality.



Community-Based Service Delivery



Community-Based Maternal Health Interventions

- Intermittent preventative treatment for malaria in pregnancy
- Calcium supplementation for preeclampsia
- Magnesium sulfate for eclampsia



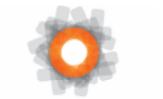
Task Force

Malaria in Pregnancy

Malaria presents health risks for the woman, fetus and newborn

WHO recommends a three-pronged approach to address malaria in pregnancy:

- 1. Insecticide-treated bed nets (ITN)
- 2. Intermittent preventative treatment in pregnancy (IPTp)
- 3. Case management of malarial illness



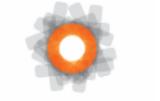
Intermittent Preventative Treatment in Pregnancy (IPTp)

- IPTp includes a full course of antimalarial medicine as part of routine prenatal care as early as possible in the second trimester
- IPTp has been shown to decrease cases of malaria in pregnancy and to reduce maternal and fetal anemia, low birth weight and neonatal mortality



IPTp-SP

- Ideally, women should receive at least three doses of sulfadoxine-pyrimethamine (SP) during pregnancy
- SP should be administered as directly observed therapy (DOTs)
- Doses should be given at least one month apart



Community-Based IPTp and ITNs in Nigeria (Orobaton et al, 2016)

- House-to-house distribution of SP to all eligible pregnant women
- SP administered by DOTs by community health workers (CHWs)
- Added intervention and support to system of CHWs already in operation
- Every CHW linked to a health facility for supply and supervision
- CHW promoted antenatal care visits (ANC) along with SP administration
- SP doses were tracked by CHW and by woman herself
- Community-based IPTp increased SP coverage and ANC visits





Preeclampsia and Eclampsia

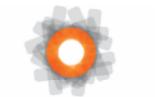
- 2nd leading cause of maternal death globally
- Rapid increase of blood pressure and presence of protein in urine during pregnancy (preeclampsia)
- Causes dizziness, headaches and swelling
- If untreated, can lead to seizures (eclampsia), organ failure and death



Calcium Supplementation

In areas where dietary calcium intake is low, WHO recommends calcium supplementation during pregnancy (at doses of 1.5–2.0 g elemental calcium/day) for the prevention of pre-eclampsia in all women

- Especially those at high risk of developing pre-eclampsia
- Reduces risk of pre-eclampsia by 40-70%
- Should complement efforts to improve nutrition



Community-Based Calcium Supplementation in Kenya (Martin et al, 2016)

- No known national program to incorporate calcium supplementation into antenatal care
- Colleagues in Western Kenya conducted implementation research to learn from iron and folic acid supplementation
- Formative research to design community-based intervention





Community-Based Calcium Supplementation in Kenya (Martin et al, 2016)

- Training on anemia, preeclampsia, danger signs in pregnancy and the importance of ANC visits
- Provide credentials to CHWs and materials to help foster dialogue
- Rather than informing on risks of preeclampsia and eclampsia, focus on the preventive benefits of calcium



Magnesium Sulfate

- WHO recommends magnesium sulfate recommended for the prevention and treatment of eclampsia in preference to other anticonvulsants
- For settings where it is not possible to administer the full magnesium sulfate regimen, the use of a magnesium sulfate loading dose followed by immediate transfer to a higher level health-care facility is recommended



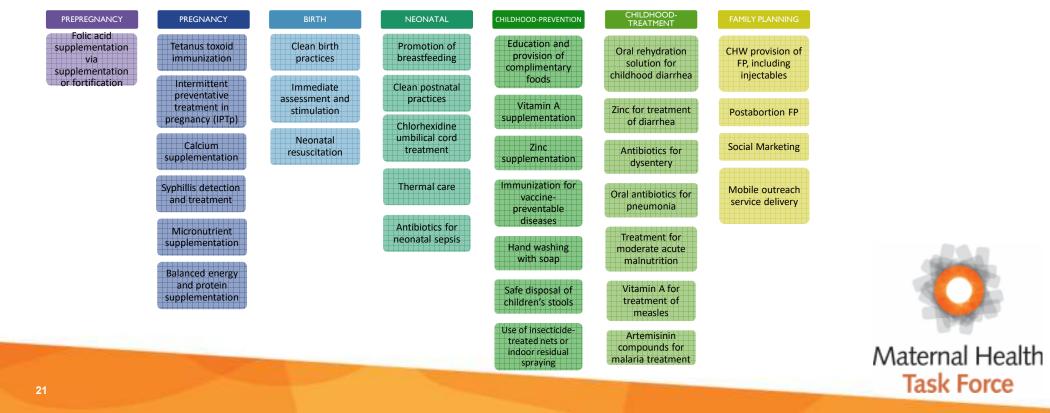
Community-Based Magnesium Sulfate in India (Ramadurg et al, 2016)

- Conducting focus groups with CHWs to better understand knowledge and experiences (ASHA, ANMs and staff nurses)
- Found some knowledge of link between hypertension and eclampsia, but also found several misconceptions
- CHWs can and want to administer life-saving medications, but more training is needed
- Strong referral and emergency transport systems are critical





Community-Based Service Delivery



Discussion Questions

- What experience have you had working to introduce any of these community-based maternal health interventions in your country?
 - IPTp
 - Calcium supplementation
 - Magnesium sulfate
- What are the gaps you face related to implementation?
- What are the gaps you face related to learning and research?



Thank you!

Jacquelyn Caglia, MPH jcaglia@hsph.harvard.edu www.mhtf.org

Subscribe: bitly.com/MHTFsubscribe Email: MHTF@hsph.harvard.edu Follow @MHTF on social media





Task Force

2

Key Readings

- Trends in maternal mortality: 1990 to 2015; WHO, UNICEF, UNFPA, World Bank Group and the United Nations Population Division, 2015
- Lancet maternal health series, 2016
- WHO policy brief for the implementation of intermittent preventive treatment of malaria in pregnancy using sulfadoxine-pyrimethamine (IPTp-SP)
- Scaling-up the use of sulfadoxine-pyrimethamine for the preventive treatment of malaria in pregnancy: results and lessons on scalability, costs and programme impact from three local government areas in Sokoto State, Nigeria
- <u>Translating formative research findings into a behaviour change strategy to promote antenatal</u> <u>calcium and iron and folic acid supplementation in western Kenya</u>
- <u>Community health worker knowledge and management of pre-eclampsia in rural Karnataka State,</u> <u>India</u>

