Rational Pharmaceutical Management Plus
International Congress on Evidence Based Interventions to Prevent Post Partum Hemorrhage: Translating Research into Practice, Goa, India July 7-16, 2006: Trip Report

Bannet Ndyanabangi

July, 2006
This report was made possible through support provided by the U.S. Agency for International Development, under the terms of cooperative agreement number HRN-A-00-00-00016-00. The opinions expressed herein are those of the author(s) and do not necessarily reflect the views of the U.S. Agency for International Development.

About RPM Plus

RPM Plus works in more than 20 developing and transitional countries to provide technical assistance to strengthen drug and health commodity management systems. The program offers technical guidance and assists in strategy development and program implementation both in improving the availability of health commodities—pharmaceuticals, vaccines, supplies, and basic medical equipment—of assured quality for maternal and child health, HIV/AIDS, infectious diseases, and family planning and in promoting the appropriate use of health commodities in the public and private sectors.

Abstract

Severe bleeding after childbirth is the largest cause of maternal death, accounting for at least one-quarter of maternal deaths worldwide. More women in India die from PPH than in any other country in the world. In the Africa region postpartum hemorrhage (PPH) contributes to an even higher proportion of maternal mortality. The International Federation of Gynecology and Obstetrics (FIGO) and the International Confederation of Midwives (ICM), in collaboration with USAID since November 2003, launched efforts targeting the prevention of post partum hemorrhage (PPH). This Asian regional conference was to build on the knowledge available about best practices to prevent PPH and to adopt a concerted action to reduce the occurrence of the mortality from PPH.

Partners and Collaborators

The conference was organized by the Jawaharlal Nehru Medical College, Belgaum, and the University of Missouri – Kansas City School of Medicine in collaboration with the USAID, Dept of Health and Human Services (NIH, NICHD), ACCESS project, JHPIEGO, MOH/ Government of India and the POPPHI project. Other partners present were WHO and UNICEF.

The conference brought together leading experts, program managers and safe motherhood professionals.

Activities at the Conference

At the conference, Bannet Ndyanabangi represented MSH/RPM Plus and made a poster presentation on management of uterotonics for prevention of PPH. He also facilitated discussions on policy recommendations for essential medicines for the prevention of PPH.

He also participated in the following plenary sessions:

- Epidemiology of postpartum in Africa
- The status of PPH prevention in Africa: results of a survey in Tanzania and Ethiopia
- Challenges in introducing Active Management of Third Stage Labor (AMTSI).
- PPH prevention in home births
- Promoting Community interventions to prevent PPH
Key Messages from the conference

- AMSTL should be provided by a skilled birth attendant to every woman at every birth
- Oxytocin is the recommended first-line medicine for prevention of post partum hemorrhage and for use in AMTSL. It is preferred because it is effective in two to three minutes after injection, has minimal side effects, and can be used in all women.
- There is an urgent need for community involvement in efforts to prevent PPH

Recommended Citation

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### Acronyms

<table>
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<th>Acronym</th>
<th>Description</th>
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<tr>
<td>ACCESS</td>
<td>USAID's global program to improve maternal and newborn health</td>
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<td>AMTSL</td>
<td>Active Management of Third Stage Labor</td>
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<td>CA</td>
<td>Contracting Agency</td>
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<td>FIGO</td>
<td>Federation of Gynecology and Obstetrics</td>
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<td>ICM</td>
<td>International Confederation of Midwives</td>
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<tr>
<td>IM</td>
<td>Intramuscular</td>
</tr>
<tr>
<td>IV</td>
<td>Intravenous</td>
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<tr>
<td>MSH</td>
<td>Management Sciences for Health</td>
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<tr>
<td>JHPIEGO</td>
<td>Affiliate of the Johns Hopkins University</td>
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<tr>
<td>NICHD</td>
<td>National institute of Child Health and Human Development</td>
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<td>NIH</td>
<td>National institute of Health</td>
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<tr>
<td>PATH</td>
<td>Program for Appropriate Technology in Health</td>
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<tr>
<td>POPPHI</td>
<td>Prevention of Postpartum Hemorrhage Initiative</td>
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<tr>
<td>PPH</td>
<td>Prevention of Postpartum Hemorrhage</td>
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<td>RH</td>
<td>Reproductive Health</td>
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<td>RPM Plus</td>
<td>Rational Pharmaceutical Management Plus Program</td>
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<td>STGs</td>
<td>Standard Treatment Guidelines</td>
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<tr>
<td>TBA</td>
<td>Traditional Birth Attendant</td>
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<tr>
<td>UNICEF</td>
<td>United Nations Children’s Fund</td>
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<tr>
<td>USAID</td>
<td>United States Agency for International Development,</td>
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<td>WHO</td>
<td>World Health Organization</td>
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Background

Globally, Postpartum Hemorrhage (PPH) is the leading cause of maternal mortality. More than 125,000 women die each year due to postpartum hemorrhage, particularly in rural areas of underdeveloped countries. To address this critical issue, the World Health Organization (WHO), International Federation of Gynecology and Obstetrics (FIGO) and the International Confederation of Midwives (ICM), in collaboration with the U.S. Agency for International Development office of health, infectious diseases and nutrition (USAID/HIDM), have collaborated in encouraging nations to pursue evidence based PPH prevention practices. USAID and POPPHI launched a PPH Global Initiative in November 2003. More women in India die from PPH than in any other country. The goal of the Congress was to disseminate research findings and to effectively advance programs to prevent and treat PPH in health facilities in resource-poor communities thus supporting the Millennium Development Goal (MDG) of reducing maternal mortality by 75% by 2015. In July, 2006, Congress provided opportunities to hear and discuss updated, novel, cost effective, evidence-based interventions, explore innovative approaches, discuss challenges in low resource settings, participate in skill enhancement sessions, debate program approaches, and help develop country and community action plans. The meeting assembled leading researchers, clinical experts, program managers and reproductive health professionals to highlight critical issues associated with the major cause of maternal death and to propose solutions that can be integrated within existing maternal health programs.

Objectives of the Congress:

1. Assemble international experts and policy makers to share new data and assist translation of research findings into policy recommendations

2. Review new evidence and provide a framework that supports strategies for prevention and treatment of PPH in health care facilities and home settings by skilled providers as well as by community health workers and family members

3. Develop action plans for implementing large-scale programs to prevent and treat PPH

4. Forge Public-Private Partnerships for developing and implementing programs to reduce the burden of mortality from PPH

RPM Plus participated in the conference and made a poster presentation on management of Uterotonics. The presentation also included findings from a review of AMSTL policies and guidelines from six West African countries. In addition, RPM Plus facilitated group work sessions on essential medicines for the prevention and treatment of PPH.

Congress highlights included presentations on the following topics:

- The Worldwide Burden of Postpartum Hemorrhage
- A Critical Review of Literature on Prevention and Treatment approaches to PPH
Purpose of Trip

At the conference, Bannet Ndyanabangi represented MSH/RPM Plus and made a poster presentation on management of uterotonics for prevention of PPH. He also facilitated discussions on policy recommendations for essential medicines for the prevention of PPH.

Scope of Work

Scope of work for Bannet Ndyanabangi
- Make a poster presentation on management of uterotonics
- Participate in and facilitate group work sessions on management of medicines
Activities

Participate in the workshop and provide facilitation

RPM Plus participated in the five-day International congress. Bannet Ndyabanangi facilitated group work sessions on management of medicines and made a poster presentation on management of uterotonics. He also participated in the congress plenary sessions.

Key pharmaceutical management recommendations for improving availability of uterotonics emanating from the International congress: (Essential Medicines working group)

Draft Policy Recommendations on Essential Medicines for Prevention and Treatment of Postpartum hemorrhage (PPH)

Which medications should be included in essential medicines listing for PPH?

- Oxytocin, in ampoule or single dose pre-filled syringe (including Uniject)
- Misoprostol
- 15 methyl F2 Alpha (brand name Carboprost)
- Ergometrine

Levels of availability

_Tertiary level with doctors, nurses, midwives:_ Use AMTSL with oxytocin IM-IV

_Health Centre level:_ Use AMTSL with oxytocin in ampoule or pre-filled single use syringe, or AMSTSL with misoprostol. Keep ergometrine available for treatment in addition to oxytocin and misoprostol

_Community level:_

**Prevention**

If birth is not attended: In advance of birth a clinician or trained birth attendant can give misoprostol to a TBA for woman’s use.

If attended: Use AMTLS with oxytocin (in ampoule or pre-filled syringe) or misoprostol.

**Treatment:** Refer to health center.

_Dosage_

- Oxytocin, 10 units prevention; 10 or 20 units IV in normal saline or ringer lactate. Can be higher for treatment.
- Misoprostol, 400 to 600 mcg orally for prevention; 600 to 1,000 mcg rectally/orally/buccally for treatment
• 15 methyl F2 alpha, 250 mcg IM for treatment
• Ergometrine, .2 mm IM/IV for prevention and treatment

Vehicles for use:
• Oxytocin: Ampoule, preloaded syringes (e.g. including Unject)
• Prostaglandin, 15 Methyl F2alpha (Carboprost) Preloaded
• Ergometrine: Ampoule
• Misoprostol: Tablet

Storage and transport needs
• Oxytocin: 15° – 30° C. Can be kept at room temperature for three months according to the manufacturer’s label.
• Ergometrine: Refrigeration required 2°– 8° C. Keep away from light.
• Carboprost: Keep refrigerated.
• Misoprostol: Stable at room temp. Store in dry place.

Recommendations for availability
• Include misoprostol on WHO Essential Medicines List for PPH
• Follow country steps for availability
• Steps to Product Availability in a Country:
  • Add to country’s Essential Drugs List or National Drug List, and include in country’s Standard Treatment Guidelines (STGs). This means drug is approved for use for PPH. This can be supported in a formal policy statement.
  • Prequalification and GMP for public procurement.
  • Engage a low cost manufacturer.
    – South-South trade
    – Manufacturer must be willing to submit registration for PPH indication.
  • Determine level of availability and evaluate distribution channels
  • Drug registration by country’s drug regulatory authority. This is a legal approval of a specific manufacturer’s product, for sale by a local distributor, by prescription.
  • Build awareness: Educate doctors, midwives, and community health workers. Develop and use posters, brochures.
  • Distribution systems: Commercial marketing; social franchising and marketing; free distribution through public systems.
Collaborators and Partners

The workshop was made possible by the joint effort involving several partners, namely:

United Nations Agencies:
- WHO
- UNICEF

Partner Organizations
- USAID
- Jawaharlal Nehru Medical College, Belgaum
- University of Missouri –Kansas City School of Medicine
- Dept of Health and Human Services (NIH, NICHD),
- ACCESS project,
- JHPIEGO (affiliate of the Johns Hopkins University)
- MOH/ Government of India
- PATH/POPPHI project,
- MSH/RPM Plus

Next Steps

Immediate Follow-up Activities

- Circulate summary of congress outcomes to colleagues in MSH and USAID.
- Inclusion of activity to address pharmaceutical management issues on Misoprostol in 06/07 work plan such as the development of policy briefs to enable policy makers to make informed decisions about incorporating misoprostol in STGs and EML for PPH

Important Upcoming Activities or Benchmarks in Program

RPM Plus plans to support the scale-up of the AMSTL program in Benin, Ghana and Mali. RPM Plus initiated the planning of an assessment of AMSTL practices at the facility level which includes an analysis of the availability, storage conditions and use of uterotonics in Benin and Ghana.
Annex 1: Congress Objectives and Highlights

Objectives of the Congress:
• Assemble international experts and policy makers to share new data and assist translation of research findings into policy recommendations

• Review new evidence and provide a framework that supports strategies for prevention and treatment of PPH in health care facilities and home settings by skilled providers as well as by community health workers and family members

• Develop action plans for implementing large-scale programs to prevent and treat PPH

• Forge Public-Private Partnerships for developing and implementing programs to reduce the burden of mortality from PPH

Highlights of Scientific Sessions:
• The Worldwide Burden of Postpartum Hemorrhage

• A Critical Review of Literature on Prevention and Treatment approaches to PPH

• Results of a Randomized Controlled Trial of Oral Misoprostol for Prevention of PPH in rural India

• Reports of other Misoprostol trials in Community and Hospital Based Settings

• Pharmaceuticals for prevention/treatment of PPH – Importation, Registration, Storage, Distribution and Availability

• Novel Approaches to Assess Postpartum Blood Loss – “BRASSS-V Drape”

• Redefining Postpartum Hemorrhage in the Developing World

• Training of Rural Health Workers for Prevention and Treatment of PPH

• New low-cost technologies in the management of PPH – Uniject, BRASSS-V Drape, Uterine Tamponade, and Non-inflatable anti-Shock Garment

• Evaluating PPH programs in the field

• Translating Research into Practice

• Role of USAID, MOH & NGO's supporting PPH initiatives
Uterotonic Supply Management Issues to Consider

Selection

- Choosing the appropriate uterotonic drug
- Choice of the drug based on the availability

- Age of the mother
- Length of labor
- Length of active phase
- Presence of bleeding

Policy and Legal Framework

- The policies and legal frameworks for uterotonic interventions
- The role of governments in ensuring the availability of uterotonic drugs
- The role of international organizations in supporting the implementation of uterotonic interventions

Conclusion

- The importance of uterotonic interventions in improving maternal and newborn health
- The need for continued research and policy development in the field of uterotonics

For more information, contact:

- World Health Organization
- United Nations Population Fund
- USAID
- POPPH

This program is supported by the United States Agency for International Development (USAID) and the United Nations Population Fund (UNFPA) through the Uterotonic Intervention Project (UIP), a program implemented by Management Sciences for Health (MSH) and funded by USAID and UNFPA. For more information, visit www.msh.org/uterotonic.