REPORT

WORKSHOP ON STRENGTHENING MATERNAL DEATH REVIEWS TO IMPROVE MATERNAL AND NEWBORNS HEALTH SERVICES

Ha Noi, Viet Nam
10 – 12 October 2005

Manila, Philippines
February 2006
REPORT

WORKSHOP ON STRENGTHENING MATERNAL DEATH REVIEWS TO IMPROVE MATERNAL AND NEWBORN HEALTH SERVICES

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The views expressed in this report are those of the participants in the Workshop on Strengthening Maternal Death Reviews to Improve Maternal and Newborn Health Services.

This report has been prepared by the World Health Organization Regional Office for the Western Pacific for governments of Member States in the Region and for those who participated in the Workshop on Strengthening Maternal Death Reviews to Improve Maternal and Newborn Health Services, which was held in Ha Noi, Viet Nam from 10 to 12 October 2005.
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A Workshop on Strengthening Maternal Death Reviews to Improve Maternal and Newborn Health Services was held in Ha Noi, Viet Nam from 10 to 12 October 2005. The workshop was attended by 29 participants, 19 observers, 28 secretariat members, two consultants and one temporary adviser.

The objectives of the workshop were:

1. to review and share past experiences of maternal death reviews and lessons learnt;
2. to discuss and understand the Beyond the Numbers guidelines; and
3. to discuss and identify actions to be taken for national application of the guidelines.

Globally, more than half a million maternal deaths occur each year, with the majority of them in developing countries. Most of these deaths can be averted even where resources are limited. Reducing maternal mortality has become a public health priority. In 2000, the world’s leaders adopted the United Nations Millennium Declaration and committed themselves to achieving the Millennium Development Goals (MDG). Reducing the maternal mortality ratio by 75% of the 1990 level by 2015 is an important target of MDG 5.

In the Western Pacific Region, there are 40 to 50 million pregnancies with 30 000–50 000 mothers and 300 000 newborns dying on the first day of birth, every year. More than 90% of these deaths occur in Cambodia, China, the Lao People’s Democratic Republic, Papua New Guinea, the Philippines and Viet Nam. Within these countries, it is the poor and disadvantaged who suffer the most. In the past 10 years, the Regional Office has embarked on a strategy to reduce maternal mortality through comprehensive approaches. The strategy includes promoting governments’ commitment, increasing service capacity at community and referral levels, improving family planning services, building effective surveillance and monitoring systems, and strengthening partnerships. The maternal mortality ratio has declined in some priority countries of the Region because of the governments’ effective programmes and policies, health workers’ dedicated contribution and the strong partnership among organizations and agencies.

Maternal mortality offers a litmus test on the status of women, their access to health care and the adequacy of health systems in responding to their needs. Although different international agencies tried their best to assist governments to improve the health information system or conduct different surveys on maternal mortality, it is difficult to measure maternal deaths, particularly where civil registration of deaths and their causes is not well developed. In order to monitor the progress of achieving MDG, it is necessary to strengthen assessment, monitoring and evaluation, for better decision-making by policy-makers and planners. Knowing the statistics on the levels of maternal mortality is not enough; information is needed to help identify what can be done to prevent such unnecessary deaths.

Beyond the Numbers is an evidence-based guide designed to review maternal deaths and complications in order to find the underlying factors that lead to the deaths. The guide will help to answer policy-makers’ questions: "Why do maternal deaths occur and what can be done to prevent them?" It will also help to respond to programme managers’ questions: "Where are things going wrong and what can be done to rectify them?" This practical guide will help to
generate information that looks beyond the numbers, to the underlying, preventable causes of maternal deaths. The approaches can be adapted for use in any country and in any setting with a commitment to safe motherhood.

Sharing the experiences and the results of these reviews will not only help to improve the health services of mothers and newborns, but also play a powerful advocacy role to raise awareness and mobilize resources. In the Western Pacific Region, several countries, such as Malaysia, have successful experiences in maternal death review. This workshop provided a good opportunity for countries to share information and develop joint plans for the next step at country level.

The workshop was well received and participants appreciated the systematic way the session was organized, especially on the sharing of experience and gaining new knowledge. The participants were exposed to the important methodologies of maternal death reviews, listened to the experiences of different countries and developed a proposal on the national application of the guidelines. They learnt new ways to improve maternal death reviews and to strengthen the evidence-based guidelines that can help them tackle the underlying causes of maternal deaths and complications so that they can make pregnancy safer.
1. INTRODUCTION

A Workshop on Strengthening Maternal Death Reviews to Improve Maternal and Newborn Health Services was held in Ha Noi, Viet Nam from 10 to 12 October 2005. It was intended to provide a forum for countries in the Western Pacific Region to share experiences and develop joint plans for maternal death review at country level. Participants were exposed to the important methodologies of maternal death reviews, learnt from the experiences of different countries and developed a proposal on the national application of the guidelines.

1.1 Objectives

1. To review and share past experiences of maternal death reviews and lessons learnt.
2. To discuss and understand the Beyond the Numbers guidelines.
3. To discuss and identify actions to be taken for national application of the guidelines.

1.2 Participants and resource persons

Twenty-nine participants from the nine countries and areas in the Western Pacific Region (Cambodia, China, Fiji, the Lao People's Democratic Republic, Mongolia, Papua New Guinea, the Philippines, Solomon Islands, and Viet Nam) attended the workshop.

Nineteen observers and representatives from the Ministry of Health, Viet Nam; IPAS Vietnam; PATH, Viet Nam; and Save the Children, USA, attended the workshop.

There were 28 secretariat members, consisting of staff from the WHO Regional Office for the Western Pacific (Reproductive Health and Health Information), WHO Headquarters, Geneva (Making Pregnancy Safer), WHO country offices (Cambodia, China, the Lao People's Democratic Republic, Mongolia, Papua New Guinea, the Philippines, Viet Nam), the United Nations Children's Fund (Viet Nam Office) and the United Nations Population Fund (Mongolia, Fiji, Philippines, the Lao People's Democratic Republic, Viet Nam, and the UNFPA Country Technical Support for East and South-East Asia and Suva) (Annex 1).

Two WHO consultants and one temporary adviser also supported the workshop.

1.3 Organization

A pre-workshop meeting was held to finalize the agenda and timetable, and to discuss the role of each resource person. The agenda of the workshop is attached as Annex 2.

The first day of the workshop was devoted to presentations, including the introduction of the workshop and harmonizing maternal and child health data with the national health information by the WHO Regional Adviser in Health Information; the global strategy on making pregnancy safer by the Director, Making Pregnancy Safer, WHO Headquarters; issues and challenges on how to achieve the Millennium Development Goals (MDG) in the Region by the WHO Regional Adviser in Reproductive Health; country presentations on experiences and lessons learnt on maternal death review from China, Malaysia, Mongolia, and Viet Nam;
introduction of Beyond the Numbers guide to review maternal deaths and complications to make pregnancy safer by WHO consultant (Dr Gyaneshwar); general principal and methodology of verbal autopsy by WHO consultant (Dr Gyaneshwar), followed by country responses from Lao People's Democratic Republic and Viet Nam; general principles and methodology of facility-based maternal death review by WHO consultant (Dr Gyaneshwar), followed by country responses of Mongolia and Papua New Guinea.

The second day was devoted to presentations of the general principles and methodology of confidential enquiries into maternal deaths by the WHO consultant (Dr Li Zhu), followed by country responses from Fiji and Malaysia; general principles and methodology of “near-miss” case review by the WHO consultant (Dr Li Zhu), followed by country responses from China and the Philippines; general principal and methodology of clinical audit by WHO consultant (Dr Li Zhu), followed by country responses from Cambodia and the Solomon Islands; introduction of the worksheets for the implementation of Beyond the Numbers by the Medical Officer, Making Pregnancy Safer, WHO Headquarters, Geneva; and then followed by group work on the development of the national application of the guideline.

The third day was a continuation of group work; country presentations and plenary discussions on national application of the guideline.

1.4 Opening ceremony

Dr Hans Troedsson, WHO Representative for Viet Nam, opened the workshop and delivered the opening remarks on behalf of Dr Shigeru Omi, Regional Director for the Western Pacific. During his address, Dr Troedsson reported on the status of maternal mortality, both globally and in the Region, and outlined the Regional Office's strategy to reduce the number of women who die during pregnancy or childbirth. The strategy includes promoting governments’ commitment, increasing service capacity at community and referral levels, improving family planning services, building effective surveillance and monitoring systems, and strengthening partnerships. He encouraged all attendees to participate in the discussions and to learn from the experiences shared by their colleagues from other countries.

2. PROCEEDINGS

A summary of the presentations and discussions are given in this section. Detailed presentation outlines can be requested from the Reproductive Health Focus of the WHO Western Pacific Regional Office. All participants have obtained all presentations and relevant documents on a CD-ROM.

2.1 Workshop introduction

Dr Y. C. Chong, Regional Adviser in Health Information, presented the background, objectives and programme of activities of the workshop. He mentioned that during the three-day workshop all the participants would be exposed to issues and challenges facing maternal death, new approaches on maternal mortality and morbidity case review, progress made towards the achievement of the MDG, and the need to use the Beyond the Numbers approaches. He hoped that all the participants, through presentations, exercises and group discussions, would be able to understand the basic principles and methodologies of the Beyond the Numbers approaches, and how to improve maternal care to make pregnancy safer. He also requested the participants to
develop feasible action plans for their countries and take immediate action when they return to their countries.

2.2 Global making pregnancy safer strategy

Dr Monir Islam, Director of Making Pregnancy Safer, WHO Headquarters, Geneva, presented the *Global Making Pregnancy Safer Strategy*. He said that no issue is more central to global well being than maternal and perinatal health. Every individual, every family and every community at some point is intimately involved with pregnancy and the success of childbirth. Yet every day, 1600 women and over 5000 newborns die due to complications that could have been prevented. He said the strategy is a way forward for making pregnancy and childbirth safer for women and their newborns, and in accelerating the reduction of maternal and perinatal mortality and morbidity – especially in the developing world, where 90% of these deaths occur. He pointed out that based on the current trends, the international community might fail to meet the goals of reducing the maternal mortality ratio by three quarters and of reducing the "under-five" mortality rate by two thirds. They will need to redouble their efforts to meet the targets because until now there has been no concrete global plan and focused efforts at the country level to translate these international commitments into lives saved. The key message in this strategy is continuum of care and universal coverage ensuring skilled care at every birth within the context of continuum of care. Integrated Management of Pregnancy and Childbirth (IMPAC) will help shape technical support to countries in strategic and systematic ways to improve maternal, perinatal and newborn health. He mentioned that there were four strategic areas with 12 component strategies to reach the target of assuring skilled care at every birth within the continuum of care principal. He finally pointed out that these strategies were part of WHO's efforts, in collaboration with governments and partners, to improve significantly maternal and newborn health.

2.3 The Millennium Development Goals and WHO's perspectives

Dr Pang Ruyan, Regional Adviser in Reproductive Health, spoke on achieving MDG 5. She first reviewed MDG 5, and then raised the challenges to achieving MDG 5 in the priority countries. She called attention to the need for an effective maternal and child health surveillance system and described the current maternal and child health information system in the Western Pacific Region. She pointed out that maternal mortality offers a litmus test on the status of women, their access to health care and the adequacy of health systems in responding to their needs. Although different international agencies have tried to assist governments to improve the health information system or conduct different surveys on maternal mortality, it is difficult to measure maternal deaths, particularly where civil registration of deaths and their causes is not well developed. In order to monitor the progress of achieving MDG, it is necessary to strengthen assessment, monitoring and evaluation, for better decision-making by policy-makers and planners. But knowing the statistics on the levels of maternal mortality is not enough. She mentioned that information is needed in order to identify what should be done to prevent unnecessary deaths.

In closing, she emphasized that the five approaches of *Beyond the Numbers* should be beneficial to the three levels of the health care system. They will improve health workers' capacity on case management, provide managers tool/measure to carry out monitoring and supervision, and provide information for decision-makers (develop policies and strategies).
2.4 Country presentations on experiences and lessons learnt on maternal death review

China, Malaysia, Mongolia and Viet Nam presented their country background information, brief description of their health system, data collection system/methods and country’s experiences in reviewing maternal and perinatal/newborn mortalities and morbidities.

2.5 Introduction of Beyond the Numbers guide to review maternal deaths and complications to make pregnancy safer

Dr Gyaneshwar introduced the Beyond the Numbers guide. He said that maternal mortality rates are useful for making comparisons, setting targets, and crudely measuring national development, but are not sensitive in identifying strategies for useful health interventions. Furthermore, they are often inaccurate, with limited value for smaller countries and for countries with low maternal mortality ratios. Most importantly, maternal mortality ratios do not tell why mothers die. The Beyond the Numbers strategy recognizes that to get meaningful information there is a need to understand the pain/anxiety; to create trust and to learn not to blame; to teach and not to find faults; and to maintain confidentiality. Beyond the Numbers concentrates on two outcomes—maternal deaths and near misses (i.e. life threatening complications), and on one process—clinical care. Beyond the Numbers reviews can be conducted in a community, at a health care facility, at district and country levels. The Beyond the Numbers strategy targets health professionals/managers and empowers them to improve clinical practice based on lessons from past bad outcomes. The strategy is action oriented, is easy to use, requires commitment and a disciplined approach, and requires methodology that suits local context. Beyond the Numbers has five basic approaches to finding out the full story: (1) community-based reviews (e.g. verbal autopsy), (2) facility-based reviews, (3) confidential enquiries, (4) “near-miss” reviews, and (5) clinical audit.

2.6 General principle and methodology of verbal autopsy

Dr Gyaneshwar introduced the verbal autopsy approach. Verbal autopsy is a community-based maternal death review. By interviewing people who knew the mother and the circumstances of her death, researchers can find out risk factors about the person, family, community and clinics. Verbal autopsies reveal health system problems (e.g. delays in seeking, reaching and obtaining care) and are useful at national, provincial and district level to identify strategies to improve the health system. Verbal autopsies require an experienced leader, adequate resources, support from communities and health facilities, an interview form, and trained interviewers and data collators. Conducting a verbal autopsy involves several steps: finding cases, obtaining data, training interviewers, determining the medical cause of death, and deciding what to do with the information. Dr Gyaneshwar argued that if a mother’s death is a statistic, it means little, but if her story is compelling, change will happen. One mother’s death may save another’s life if the findings are acted upon.

2.7 General principle and methodology of facility-based maternal death review

Dr Gyaneshwar presented the facility-based maternal death review. It is a process of learning from deaths occurring in health facilities and is an in-depth qualitative review of why a maternal death occurred in a health facility. It reviews every encounter with the health facility and identifies problems that need fixing. Facility-based case reviews provide a powerful learning tool, provide an opportunity for team building, show that the facility is prepared to be accountable, i.e. an audit tool, and are essential for clinical quality improvement. Facility-based case reviews examine every maternal death or “near miss”, i.e. life threatening complications in an individual facility or in several facilities in a district and associated with a particular problem, e.g. bleeding, caesarean section deaths/complications. The scope of the review includes clinical
care provided by the facility, all care provided during pregnancy, social factors (e.g. education, economic, domestic violence, drugs), cultural factors (e.g. religious beliefs, taboos, gender issues), and community factors (e.g. lack of support for women's health, transportation, telephones). Facility-based case reviews can assist training of clinicians, improve clinical practice, and provide information for resourcing and advocacy. However, they do not provide population data, may not get a clear idea of community factors, and sometimes cannot identify the 'lessons'. Carrying out a facility-based maternal death review requires a leader, a review team, agreed upon ground rules, identification of cases for review, and a set time and place. In order for the review to be successful, individuals should not be blamed, lessons learnt should be implemented, and processes and findings should be shared.

2.8 General principle and methodology of confidential enquiries into maternal death

Dr Li Zhu presented the approach of confidential enquiries into maternal death (CEMD). CEMD is a systematic, multidisciplinary, anonymous investigation of all maternal deaths, or a representative sample, occurring in an area at regional (state) or national level. The approach identifies the numbers and causes of death, and the avoidable or remediable factors associated with them. The investigation is confidential, i.e. the names of women and health workers are not revealed. The results of the investigation will tell a unique story of each maternal death. CEMD investigators trace a woman’s health care path, collect necessary detailed material, invite different kinds of people to participate, do not blame or call for punitive action, and can use multimedia technologies. CEMD can be used to understand the whole process of death, to understand why mothers really die, to learn lessons about why she died, to develop intervention strategy, to improve health care service, to avoid preventable deaths, to conduct public education campaigns, and to explore political, social and funding support.

In this session, Dr Narimah, Temporary Adviser, introduced Malaysia's experience with CEMD. Because of the Malaysian Government's support and good nationwide civil registration system, a systematic enquiry procedure has been established for many years. Participants discussed the possibility of using the method in countries that do not have a good quality civil registration system. It was agreed that the method could be used even if the registration system was incomplete. The case review would be helpful in improving the capacity of health workers.

2.9 General principle and methodology of “near-miss” case review

Dr Li Zhu presented the approach of “near-miss” case review. A “near-miss” case refers to a woman who is pregnant or has recently delivered (within six weeks after termination), whose immediate survival is threatened, and who survives because of chance or because of the hospital care received. Case definitions of “near-miss” should be country-specific, i.e. appropriate to local circumstances, to enable local improvements to be made in maternal care. A standardized definition is strongly recommended in a country or region to facilitate the comparison with standard treatment protocols and enhance quantitative comparisons between facilities or over time. Health outcomes might be a more meaningful focal point than process indicators. Near-miss cases reviews are proposed because near-miss cases are more common than maternal deaths, enable more comprehensive quantitative analysis, and are less threatening to providers than deaths.

Near-miss case reviews examine the stories of survivors, thereby enabling woman to share their perception of care received. Near-miss case reviews also use the facility-based maternal deaths review approach, the CEMD approach and clinical audit approach.
A participant from China shared their experiences with the pilot test of the near-miss review in several counties. It was mentioned that in order for this method to be successful, the Government must understand it and be actively involved.

2.10 General principle and methodology of clinical audit

Dr. Li Zhu presented the approach of criterion-based clinical audit (CBCA). CBCA is a process that seeks to improve patient care and outcomes by the systematic review of care against explicit criteria and the implementation of change. Aspects of the processes and outcomes of care are selected and systematically evaluated against explicit criteria indicated; changes are implemented at an individual, team or service level and further monitoring to confirm improvements in health care delivery. CBCA is a systematic analysis of the structure or process of clinical care: the procedures used for diagnosis, treatment and care, the associated use of resources, the resulting outcome and quality of life for the patient; comparing care received against explicit standards/agreed criteria of optimal management, and emphasis is on directly improving the quality of care. Its main focus is the care provided to women with life-threatening obstetric complications. The CBCA loop should be ultimately closed. The difference from CEMD and maternal death review: adverse outcomes (death or morbidity) versus process of care. CBCA is complimentary to, rather than alternative to, facility-based review.

The topic selected for CBCA should be one that is part of process of care complications. And it should be narrow, not broad. Explicit criteria should be previously determined and agreed, evidence-based criteria. There should be succinct statements about good quality care (optimal care). Criteria should be measurable activities that are appropriate for the setting in which they are used. It should be measured by the extraction of data from the records of relevant patients and concentrate on major complications that lead to death. Working criteria should be simple, identifiable from routinely recorded information, complications of life-threatening nature only and able to use without clinical judgment. Health facility who wants to conduct CBCA should have patient registers exist to find cases of interest, should have patient written records exist and contain information on clinical care received, and patient records can be retrieved for the audit, and there is staff available to extract information from the records. Results of CBCA are very specific to the facility where it was conducted.

2.11 Country plans

On the third day of the workshop, participants in country groups, with the help from the members of the secretariat and resource persons, developed their draft plans of action to apply Beyond the Numbers approaches to strengthen maternal death review. The country plans were presented to the plenary session after group discussion (Annex 3). Each presentation was followed by discussion. It was agreed that each participant, after returning home, would finalize the country plan of action, report to the ministry of health, and submit the plan to the WHO Regional Office. Consultants, the temporary adviser and members of the secretariat provided recommendations to participants on conducting a pilot study of Beyond the Numbers approaches to strengthen maternal death review.

2.12 Closing ceremony

Before the closing ceremony, participants agreed on a set of conclusions and completed the workshop evaluation questionnaire.

Evaluation questionnaires were distributed to all the participants. Ninety-two per cent of the respondents noted that workshop objectives were met, 86% of the participants were satisfied on the methods used in the workshop, and 95% were satisfied with the working papers provided.
However, a number of participants complained that the meeting room was too small. The participants suggested that another workshop should be held in two years to enable them to exchange and share their experiences from their pilot study and improve their capacities. Most participants recommended that country governments, WHO, UNFPA and UNICEF should continue to support their country activities.

Dr Y.C. Chong delivered the closing remarks on behalf of Dr Omi. He expressed his hope that the participants had gained better insight and learnt new methods to improve maternal death reviews and also learnt ways to strengthen the evidence-based guidelines that can help them tackle the underlying causes of maternal deaths and complications and make pregnancy safer. He encouraged the participants to translate their developed proposals into action and thanked the Government of Viet Nam for hosting the workshop and for the excellent arrangements made. He also thanked the consultants and the temporary adviser for their valuable contributions and in facilitating the discussions during the workshop, and the international partners for sharing their resources and experiences. Lastly, he thanked all the participants, for their ideas, suggestions and active participation for making the workshop a success.

3. CONCLUSIONS

The main conclusions of the workshop were as follows:

(1) The participants recognized that maternal mortality offers a litmus test on the status of women, their access to health care and the adequacy of health systems in responding to their needs, but it is difficult to measure maternal deaths, particularly where civil registration of deaths and their causes are not well established. *Beyond the Numbers* is an evidence-based guide designed to review maternal deaths and complications in order to find the underlying factors that lead to the deaths.

(2) The workshop introduced the five approaches of the guideline and requested participants to share their experiences, challenges or problems encountered in using the approaches. The participants indicated that the approaches are very practical and can be adapted for use in their countries and in any setting with a commitment to safe motherhood.

(3) The strategy and objectives of *Beyond the Numbers* were emphasized in the workshop. The strategy is to get meaningful information. The objectives are: to understand the pain and anxiety; to learn and not to blame; to teach and not to find faults; and to maintain confidentiality.

(4) Country teams have developed a framework for the next step. They were advised that pilot tests should be started in a small area, for example, in several facilities to conduct a facility-based review or in several communities to carry out a community-based review. "Near miss" is a new approach and can be tried in facilities with a small number of maternal death cases.

(5) Governments should provide technical and financial support to the maternal death review. The results of the review should feed back immediately to the governments or decision-makers in order to get more recognition and support.

(6) Representatives from UNICEF and UNFPA indicated that the approaches of *Beyond the Numbers* for maternal death review would be introduced and used in their project areas. Maternal death reviews can be a good entry point for cooperation among the agencies.
ANNEX I

LIST OF PARTICIPANTS, CONSULTANTS, TEMPORARY ADVISER, REPRESENTATIVES, OBSERVERS AND SECRETARIAT

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ANNEX 2

AGENDA

1. Opening ceremony
2. Orientation of the workshop
3. Global and regional programmes to achieve Millennium Development Goal 5
4. Country presentations on experiences and lessons learnt on maternal death reviews
5. Presentation on Beyond the Numbers and group discussion on the different methodologies of maternal death reviews
6. Introduction of the worksheets for Beyond the Numbers methodology implementation
7. Group work on the development of the national application of the guidelines
8. Group presentations and plenary discussions
9. Closing ceremony
ANNEX 3

COUNTRY PLANS OF ACTION
Outline of proposal for strengthening current methodology to investigate maternal deaths to Make Pregnancy Safer

Workshop on Strengthening Maternal death Reviews to Improve Maternal and newborn Health Services
Hanoi, Viet Nam
10-12 October 2005

Making "Crossing the River" safe

Background information
• Number deliveries- 236179 (public sector only)
• MMR- 437 per 100,000 (Sisterhood method 2000)
• Estimated number of maternal deaths per year 100 (selected provinces)
• Possible lives saved - 80

Government's commitment to reducing maternal death
• Increase the number of midwives in health centers is a target for the Government/donor annual consultative group meeting
• A reduction in maternal mortality is a key target in the Health Sector Strategic Plan
• Maternal Death Review is a strategic activity in the proposed Reproductive Health Strategic Plan

Maternal Death Review in Cambodia
• Cambodia MoH started MDR in November 2004 in 17 provinces
• It proposed to maintain MDR in 10 provinces, 10 Operational Districts, 10 RHs, 90 HCs, and improve the quality of the review process
• Methodology: Verbal autopsy, CEMD
• Aims and objectives:
  - strengthen current verbal autopsy system by ensuring adequate resources:
    - refresher training, monitoring;
    - strengthen feedback mechanisms;
    - advocate and sensitizing political, technical leaders for appropriate response.

Principles of Maternal Death Review
Underlying principles:
- Confidentiality
- Every maternal death must be reviewed
- Open and honest sharing of information
- Should not be a fault-finding exercise and no punitive action should not be taken as a result.
Annex 3

**Committee structure for Maternal Death Review**

1. National Committee for Maternal Death Review comprises of representatives of:
   - National Reproductive Health Program
   - National Maternal and Child Health Center and
   - Department of Planning and Health Information

2. Provincial Committee comprises of:
   - Provincial Health Director
   - Director of provincial technical bureau,
   - Chief of provincial maternal and child health,
   - Chief of operational district,
   - Chief of DO MCH,
   - Director of Referral Hospitals,
   - Chief of maternity ward,
   - Two midwives from provincial MCH,
   - Officer from provincial planning and health information

**Ensuring effective implementation**

- Committees have clear Terms of Reference
- PHDs encourage to include budget for Committee in annual operational plans
- Financial, technical and emotional support including training, monitoring, reward/ recognition of good performance by senior level
- Confidentiality is a challenge - possible strategies - allowing a "cool down" period between incident and review

**Committee process**

- National Committees meets annually
- Provincial committee meets in response to reported cases (approximately 4 times a year)
- Studies all deaths (100 expected)

**Maternal Death Review**

- Information collected from:
  - health facility: medical records and staff interviews
  - community: to speak to those individuals who are most knowledgeable about maternal death and particularly events before the woman arrived at the facility (it may be woman's mother, husband, sister or TBA); no judgment.

**Data collection forms**

- Notification of death form - facilities and health centers through their links with TBA and VHW
- General check lists - general information and personal details, obstetric history, care received, medical events leading up to death, comments
- Specific check list (abortion, antenatal, during labour, post partum) - for specific cause of death, time line of events
- Flow chart to assist enquiry

**Report from Provincial Committee**

Data should highlight:
- Key points from the checklists.
- Avoidable factors and details of their classification
- Delays in seeking and receiving care
- Quotations from interviewees that illustrate key points
- Inconsistencies between the various data sources.
### National Committee report and action on recommendations
- Annual report from National Committee - to influential leaders including donors
- Presentation at Health Technical Working Group
- Inform the Joint Annual Performance Review and future planning
- Medical and Midwifery Association and Medical Council to sensitize health personnel in the private sector

### Next steps
- Strengthen mechanisms to provide feedback to providers and community
- Awareness raising - community participation
- Work with commune councils to release information it receives from new death certification system
- Advocacy
- Resource mobilization, Technical Expertise

### Estimated budget
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<th>Category</th>
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<tr>
<td>Monitoring</td>
<td>20,000 US$</td>
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<td>Advocacy</td>
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<td>Production of materials</td>
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### Making "Crossing the River" safe
[Image of very wet road with text: attend]
Country work plan on Maternal Death Review

—China—

Background

- Covering a total population of more than 300 million in 1000 counties of 22 provinces;
- Since then, RMB 600 million (including central and provincial contribution) has been invested for this programme,
- Around RMB 400 million has also been budgeted for 2006;
- Disparities in maternal death between east and west, urban and rural; MMR varies from less than 10 up to 400 per 100,000;
- Since 2000, MoH, MoF, and State Council Working Committee on Women and Children initiated a national programme in reducing maternal mortality in the poor areas and western regions;
- Some of the approaches about Maternal Death Review (MDR) have been applied in the ongoing programme, such as facility-based death review.
- Some others methods regarding MDR learned from this workshop will be integrated to strengthen the programme implementation.

Objectives

- To establish and/or improve a national system for Maternal Death Review in China;
- To enhance the quality of maternal health care services;
- To increase awareness of the issue of maternal mortality in the whole society;
- Planning and advocacy meetings to increase awareness of issues regarding maternal mortality in China;
- Setting up multi-sectored Coordinating Group and development of a national strategic plan for MDR;
- Establishing a National Expert Group
- Advocacy and promotion for MDR
Annex 3

Activities (II)

3.5 Pilot in ten counties
- Selection of pilot sites: 10 counties in 5 provinces selected from the ongoing national MMR reduction programme;
- Training on standardized methodologies for MDR at provincial and county level;

Activities (II)

3.5 Pilot works in ten counties
- Implementation of verbal autopsies, facility based review, near miss and CEMD in pilot areas;
- Two maternal death cases from each of the ten counties will be reviewed by the county team;

Activities (III)

3.6 Documentation and dissemination of pilot experience

3.7 Development and endorsement of national MDR guide;

3.8 Planning for promotion and expansion of nationwide implementation of standardized MDR in China

Monitoring & Evaluation

- Developing M&E guidelines;
- Based on national and provincial level;
- Contents of M&E guidelines:
  - Management of MDR;
  - Implementation of MDR;
  - Output (professional skills upgrading, improving quality of MDR, better awareness of MDR at social level);
- Giving feedback:
  - Recommendation for improvement of quality health care, etc.

Timeline

2006-2007

Budget

- Planning and advocacy phase:
  - Advocacy and Expert mtg and development of training tool: $20,000 (MOH and WHO)
- Pilot:
  - Launching (45 pers): $15,000 (MOH)
  - Training at provincial (30 pers) and county level (50 Pers): $25,000 ($10,000 + $15,000)
  - Cases reviews: $15,000 ($1500 x 10) (request to WHO)
- Overall analysis and report writing: $10,000
Budget

- Documentation and dissemination: $15,000 (MOH)
- Development of national MDR guide: $8,000 (request to WHO)
- Planning for nationwide expansion: $10,000 (MOH)
- M&E: $30,000 (MOH and UNICEF)
- Total: $148,000
REVITALISING MATERNAL MORTALITY REVIEW IN FIJI

REESTABLISHING NATIONAL CONFIDENTIAL ENQUIRY INTO MATERNAL DEATHS

OUTLINE OF PROPOSAL FOR METHODOLOGY TO INVESTIGATE MATERNAL DEATHS TO MAKE PREGNANCY SAFER

Status of Maternal Mortality

- Number of deliveries per year: 17714
- Maternal mortality ratio: 50.8
- Annual number of maternal deaths: 9
- Estimated annual avoidable deaths: ?
- Number of deliveries and deaths
  - In facilities
    - Deliveries: 17537
    - Deaths: 9*
  - In the community
    - Deliveries: 177
    - Deaths: 0*

Methodology proposed: CEMD

- **Aim**
  Set up a national CEMD framework, as an advocacy tool
- **Objectives**
  Improve maternal health services and further reduce MMR to meet MDG 5

1: Establish a Steering Committee

- **Remit**
  - Meet and draw up draft terms of reference, structure and suggested composition of the National CEMD
  - Meet with and report to the CEO of Health, Divisional Heads, Director of Public Health, O&G Consultants
- **Composition**
  - Director of Public Health or nominee
  - Consultant O&G, Labasa
  - Consultant O&G, Lautoka
  - Consultant O&G, Suva
  - Matron Maternity Unit, Suva
  - TA: UNFPA CST
- **Two meetings only – first at end of November**

2. Establish CEMD structure

- **Meet twice yearly**
- **Will require a p/t secretary**
- **Publication and limited release of a short information sheet annually (internal plus targeted external audience)**
- **Publication and 3-yearly general release of a national report**
3. Suggested Pool for Membership of CEMD
- CEO, Directors of Public Health and Directors of Health Service Divisions, Risk Management Unit
- O&G Consultants, Matrons of Maternity Units
- Presidents of health professional bodies eg FCGP, FMA, FNA
- Ministries of Women, Works, Finance, Justice
- Women's rights groups
- Medical School, Nursing School

Responsibilities
- Data forms
  - Modify and revise existing data collection form – the steering committee will be responsible for this
- Ensuring follow-up on recommendations
  - Chairperson of CEMD, through the divisional heads and the O&G consultants, matron of the hospital, who will be personally accountable for their respective areas
  - Make implementation of the recommendations part of annual appraisal requirement for Divisional Heads, O&G consultants

Scope of Activities
- Information on maternal deaths/studies
  - Data from HIMS, annual reports, departmental reports, academic papers, PM reports (all maternal deaths)
- Deaths to be studied
  - All deaths, 9 to 12 per annum
- Facilities to be studied/Coordination
  - All facilities to take part in CEMD/HOD, SDMOs, SHNs, NPs
- Ensuring staff awareness and full participation
  - Staff orientation including a participation in mock CEMD
  - Include in undergraduate medical and nursing curriculum
- Ensuring facilities involved in reporting progress
  - Already occurs – consolidated monthly returns already go to Divisions and HQ

Tightening up Facility Based Reviews to feed into CEMD
- Responsibility for data collection form completion
  - HOD O&G Department of 3 divisional hospitals, who investigates, produces verbal report in 24 hours, written report in 48 hours, then awaits path report after 2 weeks
  - Draft report to be ready within 4 weeks of the maternal death
- To whom should the draft report be sent for review?
  - 3 person maternal mortality review team to be convened for each death, appointed by Divisional Head – 1 obstetrician not involved in care of patient, a senior midwife not involved in care of patient, a senior doctor from a relevant discipline
  - To meet within 6 weeks of maternal death
  - Jointly complete HM Report/Form, HOD forwards report
  - To whom will the final forms, with the assessment, be sent? Will the maternal mortality committee be responsible for appointing a member to do this?
  - Report to be anonymised by HOD before sending to CEMD Secretary
Maternal Death Review in the Lao PDR

Background Objectives
- Number of deliveries 112,195
- Maternal mortality ratio 530
- Estimated number of maternal 595
- In facilities
  - Deliveries 13814
  - Deaths 34
- In the community
  - Deliveries 98381
  - Deaths 561

Objectives
1. To identify the number of maternal deaths both in the communities and facilities
2. To identify the factors, causes that lead to the death address the issues related to three delays: delay in making decision, delay in access to HC and delay in receiving health care

Methodology
- Verbal autopsy: (94% deaths)
  1. Current deaths
  2. Retrospective in the last 6 months
- Facility based review (6%)

Resources
- Using existing resources (Human resource) and reporting and meeting mechanism
- Outside technical support (WHO, UNFPA..)
### Time frame

<table>
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<tr>
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<th>Date</th>
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<tbody>
<tr>
<td>Consensus building</td>
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<tr>
<td>Proposal development</td>
<td>12-1/05</td>
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<td>Approval</td>
<td>2-3/06</td>
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<td>Data collection</td>
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<tr>
<td>Analysis</td>
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### Time frame cont.

- First report writing 9-10/07
- Dissemination of findings 11-12/07

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Thank you
BTN strategy implementation in Mongolia
(MOH, UNFPA, WHO, UNICEF, ADB and others collaboration)

Next Steps

1. Debriefing meeting
- Objectives:
  - Orientation on BTN (by team)
  - Reach agreement on BTN approach for Mongolia
  - Commitment of Government for introduction of approach (Ministers order)
  - Commitment of partners for mobilization of resource (MOH, WHO, UNFPA, UNICEF, ADB, GTZ and private sector)

Participants of debriefing meeting
- Minister/Vice Health Minister
- MOH senior staff responsible for MCH
- Seniors staff from others divisions
- Heads of all maternity hospitals in Ulaanbaatar
- Heads of city and selected aimags hospitals
- Members of Ob/Gyn professional council
- National center for health development
- Health science university
- WHO, UNFPA, UNICEF, ADB, GTZ

Date and venue
- 30th October, 2005
- Ulaanbaatar

2. Adaptation of BTN material
- Adaptation and translation of BTN manual
- Review existing MM approach
- Agreement on BTN approach
- Draft forms, questionnaire for data collection

3. National workshop
- Objectives:
  - Orientate all aimags representatives on BTN
  - Introduce draft BTN forms and questionnaire
  - Develop work plan for implementation

Date: January, 2006
Maternal Death Review

General Objective

Philippines

To improve the quality of maternal care services and consequently reduce maternal mortality.

Maternal Death Review

3. To determine criteria for emergency referral to appropriate health facility.
4. To use the data as a means of evaluating the effectiveness of various strategies and interventions for safe motherhood.
5. To use the data for redirection of program strategies and activities.

Activities to strengthen existing MDR teams from pilot areas of UNICEF and UNFPA

- Conduct baseline studies from results of provincial maternal death reviews (highlights the experiences, challenges and success of the team)
- Establish and identify MDR team of other provinces
- Train new MDR team
- Implement MDR
- Feedback of PHO to CHD
- Monitoring and Evaluation (CHDs)
- Documentation

Activities to advocate MDR

- Create a National MDR Committee
  - To include UNICEF, UNFPA and other stakeholders as members of the committee
- Present a national report on MDR to the policy makers (legislative and executive)
- Revised/enhanced the National Clinical Practice Guidelines
- Inclusion of the Guidelines in the National Health Insurance System

Framework of MDR Methods Development

Policy Makers

Advocacy

National Review Committee

Feedback

Technical assistance/ supervision/ monitoring

CHD Review Committee

Technical assistance/ supervision/ monitoring

UNICEF and UNFPA

Pilot sites with MDR Team

Strength/ enhance Local Government

MDR Team

Expansion

Maternal Death Review

Specific Objectives:

1. To improve regional, provincial, district, municipal and village level health care systems for safe motherhood by reviewing the circumstances surrounding a maternal death.
2. To strengthen the referral system/linkages between health facilities at different levels.
Annex 3

<table>
<thead>
<tr>
<th>Activities</th>
<th>Agency Responsible</th>
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<th>Resources</th>
<th>Output</th>
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<td>2005-2006</td>
<td>GOPI, UNICEF, UNFPA, PHILFMI, IOM</td>
<td>Report on the results of MOR</td>
</tr>
<tr>
<td>Advocacy campaign</td>
<td>DOH-NCDPC</td>
<td>2006</td>
<td>GOPI, UNICEF, UNFPA, PHILFMI, IOM</td>
<td>New provincial MOR teams created</td>
</tr>
<tr>
<td>Training of new provincial MOR teams</td>
<td>DOH, CHD</td>
<td>2006-2008</td>
<td>PHILFMI budget</td>
<td>Training conducted</td>
</tr>
<tr>
<td>Mobilization of MOR</td>
<td>PHO</td>
<td>2009-2010</td>
<td>Provincial budget</td>
<td>MOR reports</td>
</tr>
<tr>
<td>Feedback</td>
<td>PHO</td>
<td>2015</td>
<td>Provincial budget</td>
<td>Synthesis of MOR reports</td>
</tr>
<tr>
<td>Monitoring and evaluation</td>
<td>CHD</td>
<td>2010-2015</td>
<td>DOH budget</td>
<td>Problems, issues identified and resolved</td>
</tr>
</tbody>
</table>

Hospital Facilities

General Objective

- To strengthen or systematize the Maternal Mortality-Morbidity Reviews (MMMR) in tertiary hospitals and medical centers in the Philippines as part of a national effort to review all maternal deaths in order to improve obstetric care in the country.

Specific Objectives

1. To introduce the BTN strategy for implementation in the National Maternity Hospital which will then serve as a model for other tertiary hospitals of the country to follow
   - meeting with the current members of the hospital's MMMR committee
   - asking each of them to read the book to familiarize themselves with its concepts
   - conducting a series of lectures on what it is all about to the rest of the staff

Specific Objectives

2. To expand the membership of the hospital's MMMR committee to include a multidisciplinary team
   - invite representations from Nursing, Midwifery, Anesthesia, and Pathology
3. To improve the current methodology of conducting the reviews in the hospital in such a way that the stories behind each death and severe illnesses are explored in detail to obtain lessons that can be used to prevent future deaths and illnesses:

- using the steps in conducting facility-based reviews and clinical audit outlined in BTN
- include the patient's views in reviewing severe morbidities
- broadening the scope to include community factors that may have contributed to the death or illness
- documenting administrative constraints encountered

4. To generate a MMR report and provide feedback to stakeholders on a regular basis:

- send copies to referring agencies, hospitals
1. Introduction

Papua New Guinea (PNG) has one of the highest estimated maternal mortality ratio in the world. Over the years efforts were put in to review maternal deaths but they were done in fragmentation and uncoordinated fashion. The review will be done for all 650 health centres and 22 hospitals, both from government and church health facilities. The review will provide health workers with better understanding of the reasons why mothers are dying from childbirth so that future deaths could be averted. It will also provide a tool for training, an advocacy tool for decision and policy makers at all levels of government to improve maternal health services in the country, hence reduce overall maternal mortality.

2. Background information

One cannot over emphasise the plight mothers and children's poor health situation in the country, in particular of rural women and children. They are still dying from easily preventable and treatable diseases and conditions. Currently in Papua New Guinea:

PNG has the lowest life expectancy in the Western Pacific region and is one of the few countries in the world where female (55) life expectancy is lower than male (65). PNG also has one of the highest maternal mortality ratios (370 per 100,000 births) in the region. From these deaths, 30% are reported to be among teenage mothers. Contraceptive prevalence (modern methods) is 20% of women (15-49) despite high level of awareness. The infant
mortality (64 per 1000 live births) is also the highest in the region with no decline in the last 10 years.

The reproductive health gains have been limited in the last 30 years in country. PNG has one of the highest fertility rates (4.6) in the region. There is a shorter birth interval of 2 years that can be dangerous to women's health and the survival of the child in PNG. A high percentage of pregnant women do not seek antenatal care delivered by professional health staff. On average 56% of pregnant mothers seek antenatal care once in their pregnancy while only 39% of women achieve a supervised delivery by a trained health worker. These figures have not improved over the last five years. Of those who seek antenatal care, 85% of them get tetanus toxoid.

Many PNG mothers attend ANC only once in the pregnancy and very late in the pregnancy or when they are about to deliver. Reasons for this can be attributed to logistic and difficult terrain to the health facilities, and sometimes a negative attitude of the health workers. Outreach mobile clinics are nowadays not conducted for many logistic reasons.

Overall it is a very poor performance in the last five years. The saddest situation is mothers were not delivering at health facilities. The poor performance of this indicator has a lot to do with the high maternal mortality ratio in the country.

Table 1. Maternal Health Indices in PNG

<table>
<thead>
<tr>
<th>Number of Deliveries per year</th>
<th>200,000</th>
</tr>
</thead>
<tbody>
<tr>
<td>Estimated Maternal Mortality Ratio</td>
<td>370 per 100,000 live births (1996 DHS)</td>
</tr>
<tr>
<td>Estimated Annual Number of Maternal Deaths</td>
<td>740</td>
</tr>
<tr>
<td>Estimated Annual Number of Avoidable Deaths</td>
<td>592</td>
</tr>
<tr>
<td>Estimated Annual Number of Deliveries</td>
<td></td>
</tr>
<tr>
<td>In Facilities</td>
<td>Deliveries</td>
</tr>
<tr>
<td></td>
<td>Deaths</td>
</tr>
<tr>
<td>In the Community</td>
<td>Deliveries</td>
</tr>
<tr>
<td></td>
<td>Deaths</td>
</tr>
<tr>
<td>Facilities with midwives/skilled attendants</td>
<td>682 (All health facilities)</td>
</tr>
<tr>
<td>Number of Obstetricians in PNG</td>
<td>9</td>
</tr>
<tr>
<td>Percentage of Deliveries in each health facilities</td>
<td></td>
</tr>
<tr>
<td>Midwives/skill attendant</td>
<td>94%</td>
</tr>
<tr>
<td>Obstetricians</td>
<td>6%</td>
</tr>
<tr>
<td>Proportion of total Deliveries Occurred in Health Facilities</td>
<td>39% (HIS 2004)</td>
</tr>
<tr>
<td>Proportion of supervised deliveries in Private Health Facilities</td>
<td>&lt;1%</td>
</tr>
<tr>
<td>Proportion of supervised deliveries in Government and Government subsidized (Churches Health Facilities)</td>
<td>&gt;99%</td>
</tr>
<tr>
<td>Proportion of total deliveries that occur in the Community/ at Home</td>
<td>61% (HIS 2004)</td>
</tr>
<tr>
<td>Proportion of total births who have skilled attendant at a home birth</td>
<td>1.9% (DHS 1996)</td>
</tr>
<tr>
<td>Proportion of total births who have only supervision by relatives/ TBAs/no-one (10.2%)</td>
<td>46.8 (DHS 1996)</td>
</tr>
</tbody>
</table>
PNG has one of the most rugged terrain in the world. The land area is 462 840 square km - 0.5 per cent beaches and ridges, 1.5 percent mangroves, 11 per cent swamps, 15 per cent other lowlands and 43 per cent foothills. The mountains rise up to 1000 m above sea level and 25 per cent mountains 1000 - 3000 m and 4 per cent mountains above 3000m. The country has reef area of 40 000 square km and has 1400 islands. There are occasional earthquakes and tsunamis in the country. There have been few active volcanoes that have caused eruptions in recent years. There are few roads and most these are inaccessible.

Women hardly have personal or financial choices to have access to health care in the country. There is also bad attitude from health workers, particularly in work attitude and towards to the mothers. There is poor accessibility of mothers to health facilities. Furthermore there is lack of delivery planning both by the health staff and the family, particularly the husbands.

3. Aims and objectives:

Aim: To find the causes, reasons and socio-economic associations related to maternal deaths and use this information for advocacy and continuing education of RH workers.

Objectives
1. To find out how many women died from childbirth.
2. To describe the typical stories of women dying in childbirth and use this as an advocacy tool to influence the community and government to raise awareness and provide more resources and better care for women.
3. To use the information and the stories to provide continuing education feedback to health workers providing reproductive care for women.

4. Process of Implementing of Maternal Mortality Review

There has been support from the development partners, particularly by WHO, JICA, EU, UNFPA, AusAid and New Zealand Aid in Reproductive Health. The support are in training, technical advisors and family planning commodities. We anticipate the support will continue, this time for the Maternal Mortality Review.

Currently maternal mortality data are collected through the National Health Information Discharge System (NHIS). The other and only source of maternal death survey was one DHS of 1996, which is more reliable, and hopefully will be done in 2006, and is coordinated by the National Statistics Office (NSO). The other source of maternal reviews were done through limited surveys in the 70s, 80s and 90s. We hope to continue use and strengthen the NHIS to report on maternal deaths for review and disseminating of the data. The review will also include death certificates and continuing of the current clinical audits done by the hospitals.

From the survey data all the maternal deaths have clinical data. There were not much work done on health or community system except in research projects.

5. Involvement of the Key Stakeholders
Annex 3

Currently we do not have a National, Provincial, District or Health Facility health committees to review maternal deaths. The only committee existing is the National Reproductive Health Advisory Committee, which generally advices Department of Health on Reproductive Health issues.

There are other important key stakeholders who have direct relation to this review, these are PNG Medical Society, PNG O&G Society and PNG Family Health Association.

The main persons who can make this review a success is the Director of Health Improvement Branch and Principle Advisor for Family Health in the Department of Health. At the senior level, the Secretary and the Minister of Health can provide leadership and advocacy for the review to be success.

There are other important key professional advocates for maternal health or people working with women's rights such as ICRAV. The only female Member of Parliament, Dame Carol Kidu, Minister for Community Affairs, is the advocate for women's health.

There are no venues or organisation to bring the different groups and advocates together. Also there are no forums to address this, mainly due to lack of motivation and interests. However this could be taken on board in the future.

6. The Scope of Work

We are going to expand the in depth investigation of maternal death, which is 10%, is currently being done at PMGH1 and nine other hospitals where there are obstetricians in the country and we will expand to the rest of the country. We will and make it work. The reviews will be published and disseminated to relevant stakeholders. The review will be done in the standardized reporting form attached. The established committee will review the data quarterly and provide regular feedback. At health facility level where the report initiated the staff will know the name, location of the mother who died, except at the national level there will be anonymity.

The review will cover 700 or more maternal deaths in 670 health centres and 22 hospitals. There will be a national advocacy by the Minister and Secretary of Health and officially launch it.

The Ha Noi group will ensure the recommendations are implemented.

We already have designed the form
DEPARTMENT OF HEALTH

PAPUA NEW GUINEA MATERNAL MORTALITY REPORTING FORM.

Name…………………………… Date of Death……………………………Age(best estimate)………

Place of Death…………………… District of Origin…………………… Province of origin……

Parity (excluding this pregnancy)……………… Gravida………… Children alive………Children dead……

Number of antenatal visits…………… Seen by medical or nursing staff in labour. Yes/No,

Referred to hospital Yes/No, This baby, Liveborn, stillborn, NND: Birth weight g

Date of delivery………………………… Place of delivery………………………………………………

Antenatal problems;
1. ………………………………………………………………………………………………………………………
2. ………………………………………………………………………………………………………………………
3. ………………………………………………………………………………………………………………………

Labour problems.
1. ………………………………………………………………………………………………………………………
2. ………………………………………………………………………………………………………………………
3. ………………………………………………………………………………………………………………………

Type of Delivery and Delivery problems.
1. ………………………………………………………………………………………………………………………
2. ………………………………………………………………………………………………………………………

Post partum problems.
Annex 3

1. ................................................................................................................
2. ................................................................................................................
3. ................................................................................................................

Past Medical or Obstetrics History problems.

1. ...........................................................................................................
2. ...........................................................................................................
3. ...........................................................................................................

Treatments given.

1. ...........................................................................................................
2. ...........................................................................................................
3. ...........................................................................................................

Was this death avoidable, Yes/No. If so, How?

Your name and position ............................................................

**Please write The STORY of how this mother died over the page.**

Every maternal death is a sad story but it needs to be told so that others might not die.

WRITE A CHRONOLOGICAL ACCOUNT (ie the story of this mother's death), HERE.

---

DEFINITION OF MATERNAL DEATH.
Maternal death is the death of a woman dying of any cause while pregnant, or within 42 days (six weeks) of delivery or termination of the pregnancy, and includes deaths from abortions, miscarriages, ectopics, hydatidiform mole and choriocarcinoma.

REPORTING OF MATERNAL DEATH.
All maternal deaths, wherever they occur, must be reported on one of these forms as well as on a death certificate if the mother dies in the health center. All mothers who die as a maternal death in the village should also be reported when you hear about it even if you can't get all the information about the death.

When you visit aidposts or do MCH patrols and mobile clinics, do ask if anyone has heard about any woman dying in association with pregnancy or post-partum.

WHERE TO SEND COMPLETED FORM.
Send the completed form to the epidemiologist, Dept of Health, Box 507, Waigani NCD.

Send a copy to Dr. Glen Mola, Obstetrician, Port Moresby General Hospital, FMB, PO Box 700, PO Boroko NCD; copy to your Health Advisor/Provincial health information officer in the Provincial Health Office.
### Time Frame

<table>
<thead>
<tr>
<th>Activity</th>
<th>Date</th>
<th>Comments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Consensus building</td>
<td>Since 1995, &amp; 2001</td>
<td>Already exists (Ha Noi Team)</td>
</tr>
<tr>
<td>Specify activities</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Proposal development</td>
<td>2001</td>
<td>Done</td>
</tr>
<tr>
<td>Approval</td>
<td>2001 &amp; Sept 2005</td>
<td>Done</td>
</tr>
<tr>
<td>Data collection</td>
<td>Since 70s, 80s, 90s, 2000s</td>
<td>Done</td>
</tr>
<tr>
<td>Pilot</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Pilot analysis</td>
<td>Since 70s, 80s, 90s, 2000s</td>
<td>Done</td>
</tr>
<tr>
<td>Process starts</td>
<td>17/10/05</td>
<td>Re-activated again</td>
</tr>
<tr>
<td>Reporting Implementing</td>
<td>17/11/05</td>
<td>Reports coming in</td>
</tr>
<tr>
<td>First report writing and recommendations, and distribution of findings</td>
<td>As soon as the data comes in</td>
<td>Continue on with the reporting writing and distribution</td>
</tr>
</tbody>
</table>

### Budget

<table>
<thead>
<tr>
<th>Activity</th>
<th>Cost</th>
<th>Source of Funding</th>
<th>Time of Release of Money</th>
</tr>
</thead>
<tbody>
<tr>
<td>Printing of the Forms (5000)</td>
<td>US$10,000.00</td>
<td>AusAid</td>
<td>17 November 2005</td>
</tr>
<tr>
<td>Distribution, Dissemination and Feedback</td>
<td>US$10,000.00</td>
<td>WHO/UNFPA</td>
<td>November - December 2005</td>
</tr>
<tr>
<td>Logistic support</td>
<td>US$30,000.00</td>
<td>WHO/UNFPA/AusAid</td>
<td>Jan- March 06</td>
</tr>
<tr>
<td>Data Collection</td>
<td>Recurrent</td>
<td>NDOH</td>
<td>March 06</td>
</tr>
</tbody>
</table>
Annex 3

CONTACT DETAILS PARTICIPANTS

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Telephone: (675) 3256022

Fax: (675) 3258212

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2. Name: Dr. Gilbert Hiawalyer

E-mail: gilbert_hiwalyer@health.gov.pg/ghiawalyer@datec.net.pg

Telephone: (675) 3013660/3013650/3232142

Fax: (675) 3230022

Address: Monitoring, Evaluation and Research Branch
Department of Health
P.O. Box 807,
WAIGANI, NCD
Papua New Guinea.
SOLOMON ISLANDS

OUTLINE OF PROPOSAL FOR METHODOLOGY TO INVESTIGATION MATERNAL DEATHS TO MAKE PREGNANCY SAFER

Outline

- Country/State/Facility
  Guadalcanal Province, Solomon Islands
- Methodology propose
  - Community (Verbal autopsy) &
  - Facility Based Maternal Death Review
  - Over-all Co-ordinator of the project – Director of Guadalcanal Province

Available resources

- Staff
- Facilities
- Additional Resources Required
  - Transport (ObM, Fuel & Canoe)
  - Radio
  - Fund for training, printing, survey

Methodology cont...

- RH Officer G Province ensure that data collection forms are completed
- Final assessment form will be analyzed by the sub-committee and a draft report will be submitted by the Director of Health GP to the National Committee
- Feedback
  - Through nurse in-service training
  - Yearly report
- Ethical committee approval require
Annex 3

**Aims & Objectives**

1. **Aims**
   - Improve maternal & newborn health in Guadalcanal Province

2. **Objectives**
   - i. To improve maternal death reporting
   - ii. To reaffirm Guadalcanal Province reported maternal mortality figures
   - iii. To identify possible causes and contributing factors to the deaths
   - iv. To improve quality of care in the health facilities

**Background**

- Estimated annual number of deliveries
  - In facilities: Deliveries 564, Deaths 2
  - In community: Deliveries 510, Deaths 3

**Maternal Mortality Steering Committee**

- Existing Safe Motherhood Advisory Committee
- Members
  - Co-opted Members
    - Guadalcanal Provincial
      - Health Director
      - Director of Nursing (DON)
      - Reproductive Health Officer
      - Midwife

**Frequency of Meetings**

- **Fortnightly**
  - Develop protocols for Verbal autopsy and facility based review
  - 12 cell protocol
  - Adaptation of the form
  - Pre-testing the form
  - Revise the questionnaire
  - Plan training programme
- **Quarterly**
  - To review cases received

**Background Information**

**Guadalcanal Province**

- Total Population: 64,964
- WCBA (15-49): 13,506
- Health Facilities: 34
- Number of deliveries: 1074
- Maternal mortality ratio: 475/100,000
- Estimated number of maternal deaths: 5

**Time & Place of Meeting**

- Guadalcanal Provincial HQ
- When? As soon we return

**Background Information Already Available on Maternal Deaths**

- Simplified verbal autopsy & facility based reviews
- Comparative maternal mortality reporting system in place

**Usefulness of available information**

- To assess and improve skills in reporting, reduce priority and to take appropriate action
Propose study

- Deaths occurring in the communities and health facilities
- 5 deaths/year
- Facilities & Communities in Weather Coast & Highlands of Guadalcanal
- Staff awareness
  - Initial meeting GP Health Authority
  - Training of staff who will be participating in the study

Confidentiality of the Study

- Confidentiality will be part of the training
- Reporting will be anonymous

Progress Report

- By regular radio contact
- Supervisory tours
- Monthly report

Report

- RHD with GP will produce yearly report
- Ministry of Health
  - OB/GYN
  - Pediatrician
  - RHD
- Produce a report to inform decision makers at all government levels, churches, NGOs, and other stakeholders
- WHO, UNFPA, UNICEF

Follow-up - Recommendation

- National Level
  - Senior Health Conference
  - Twice yearly meeting
- Provincial Level
  - Guadalcanal Health Authority
  - Monthly Health Managers Meeting (GP)
- Area Council Level
  - Village Health Committees
  - Church Women’s Group

Design of data form

- Responsibilities
  - RHD Team to develop draft and present it to the Maternal Mortality Steering Committee
- Data collection will be drafted later
  - Questionnaire
  - 12 cell will be used as part of the analysis
REVIEWING MATERNAL DEATHS AND COMPLICATIONS FOR REDUCING MATERNAL MORTALITY
Reproductive Health Department - MOH
Viet Nam

Section 1: COUNTRY BACKGROUND INFORMATION

- Number of Deliveries (2000-2004)

Where Did the Maternal Deaths Happen?

- On the way to hospital: 8%
- Private doctor: 1%
- Hospitals: 47%
- At home: 46%

Source: MOH's survey 2002

BACKGROUND INFORMATION

- Estimated annual number of deliveries: 85% in facilities, 15% in the community.
- How many facilities are run by midwives/skilled attendants: 82%.
- What proportion of all deliveries are in institutions/facilities: 85%.
- What proportion of women are delivered by relatives/traditional birth attendant: 6.3%.

Important relevant details specific to country?
(1) Geographic obstacles: MMR in the mountainous areas is very high.
(2) Others:
- Poor current reporting system:
  - Reluctance to pay for death certificate
  - Near-miss cases are taken home: Diabetar without facilities
- Culture (forest delivery):
  - Data of whole medical system are not effectively collected
- Abortion
- SES/Poor knowledge of complications

Main barriers to improving the outcomes of pregnancy
- Motivation of health staff
- Insufficient budget: Equipments, Training staff
- Lack of effective management of human resource development
- Lack of effective data collection system

Other problems might women have in accessing care?
- Remote areas/Transportation system
- Minority ethnic groups not want to go to medical centres
- Social economic status (poor)

Which UN/other donor agencies and on what projects?
- UNICEF: Safe-motherhood project (50,000-100,000$) for 18 provinces
- UNFPA (3 districts)
- Save Children US (5 hospitals)
- JICA (1 province)

Methods currently have for obtaining data on maternal deaths?
- Routine data sources:
  - Death certificates/vital registration: Available
  - Hospital records: Available
  - Census surveys: Available
- Specific maternal health surveys:
  - 1995: RH Department (MOH) supported by WHO: 11 provinces for 18 provinces
  - 2000-2001: RH Department (MOH) supported by WHO: 7 provinces (Geographically representative for 7 geographic areas)
  - Other sources:
    - Small-scaled surveys have been conducted within districts/provinces (Please committee CFFC reporting system)

How reliable are the data from these methods?
- Clinical causes: Reliable
- Health/Community system causes: Unreliable
- Others:
  - The well-designed surveys could provide reliable data
  - Unfortunately, these surveys have been focused mainly on clinical causes, not "social" causes such as delay.
  - Additionally, the data from other data collection systems are considered to be not very reliable.
### Number of Maternal Deaths: Report Data vs. Survey Data

<table>
<thead>
<tr>
<th>Source: Vietnam MOH's survey 2002</th>
</tr>
</thead>
<tbody>
<tr>
<td>Year</td>
</tr>
<tr>
<td>2000</td>
</tr>
<tr>
<td>2001</td>
</tr>
<tr>
<td>2002</td>
</tr>
</tbody>
</table>

### Key Stateholders

**Section 2: Key Stakeholders**

- **Maternal death/health committee**
  - The maternal death committee is not available.
  - The maternal health committees are available in several pilot provinces/districts.

- **Organizations/Institutes**
  - RH Department
  - Tertiary O&G Hospital, National Pediatric Institutes
  - Provincial MCHIFP centres
  - Provincial O&G/Pediatric hospitals
  - District O&G/Pediatric Departments
  - MCHIFP teams

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**Section 3: Planning Your Approach**

- **Who are the key people who can make things happen in the Ministry of Health?**
  - Minister of Health
  - Director of RH Department

- **Which National or State Ministers can make things happen?**
  - Minister of Planning/Investment
  - Minister of Finance
  - MOHPC
  - Women's Union

- **Do you have a well-known advocate for women's health, e.g., a First Lady or well-known personality?**
  - Nguyen Thi Thuy, former leader of Vietnamese government
  - Le Thi Thi, chairman of GPF
No facility based maternal death reviews

- Setting up a maternal death review committee to oversee and manage the introduction of such enquiries.
- Only feasible for selected 7 provinces. The Safe motherhood committees are also in charge for maternal death reviews.
- How best to obtain professional support.
  - With the approval of the provincial health services, there is a collaboration of two current medical systems. MCHF/FP centres and O&G hospitals.
- Identifying key professional leaders/professors etc. in a number of facilities who would be willing to start the process after a workshop.
  - Leaders of Provincial health services
  - Technical offices of Provincial health services
  - O&G departments of district hospitals
  - MCH/FP provincial centres

Section 4: Outline of Proposal for Methodology to Investigate Maternal Deaths to Make Pregnancy Safer

Objectives

- To find out the cause and influential factors of maternal deaths.
- To propose possible solutions for reducing maternal mortality in VN.
- To implement these possible solutions.

Proposed Progress

Methodology

- Combination of:
  - Verbal autopsy
  - Facility-based maternal deaths review
  - "Near-miss cases are taken home?"
Set up a maternal mortality steering committee

- Members of the committee or the offices they represent
  - Provincial level
    - Leaders of Provincial health services
    - Technical offices of Provincial health services
    - Leaders of the hospital
    - Leaders of the O&G departments of district hospitals
    - Leaders of MCHFIP provincial centres
  - District level
    - Leaders of district health services
    - Leaders of the hospital
    - Leaders of the O&G departments of district hospitals
    - Leaders of MCHFIP district centres
  - Hospital level
    - Leaders of the hospital
    - Leaders of the O&G departments of hospitals
    - Chiefs of midwives/nurses of the hospitals
    - Leaders of MCHFIP teams

How often will it meet?
- 6 months (to analyse data/recommend and monitor the implementation)

What is its remit?
- To evaluate/improve the current data collection system
- To collect and analyse data/information
- To recommend
- To monitor supervision to support the implementation/performance

When / where will the first meeting be?
- November 2005

What background information is already available about maternal deaths?
- National data of health situations
- Primary national data of maternal deaths and their determinants
- The pilot possible solutions for reducing maternal deaths

Which deaths are you proposing to study?
- All district facilities in the provinces
- Community

Who will follow up on how the recommendations are being implemented?
- Leaders of health centres assign the MCHFIP centres to monitor on how the recommendations are being implemented.

Data forms: Who will be responsible for designing these?
- A team of national senior expert on obstetrics.

CURRENT PROBLEMS

1. Methodology
   - Near-miss cases taken home

2. Quality of current data collection system?
   Immediate action to improve?

3. Questionnaires need further, extensive revision

Thank you and welcome to Vietnam

Appendix 3