Project Proposal Butajira General Hospital

Application for

Safe Motherhood Program: Maternity Waiting Home in Southern Ethiopia

Name of Organization	Butajira General Hospital
Project title	Maternity Waiting Home
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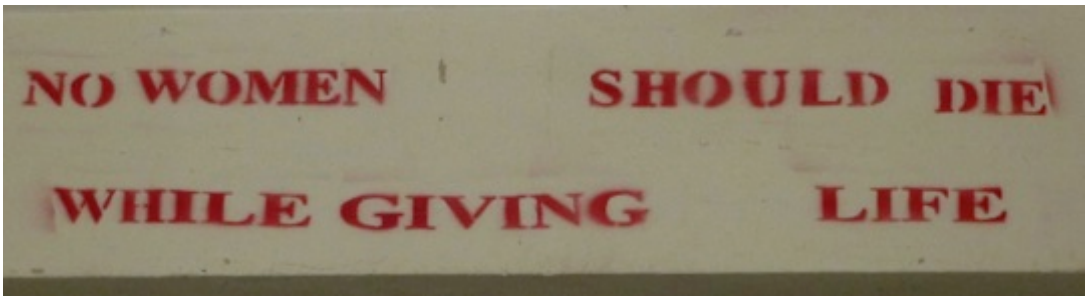
Starting date	October 2014
Termination date	End of December 2014
Total cost of the project	39,008 Euro
Acquired funding	☑ 4,000 Euro - Butajira General Hospital
	☑ 8,085 Euro - St. Tilly & Albert Waaijer Fonds for construction
	☑ 5,000 Euro - VSO The Netherlands for monitoring and evaluation using a third party evaluator
Grant applications at	☑ Florentina Foundation: is planning a support trip end March 2013 for physical (through construction) and financial support (min. 500 Euro p.p.)
	☑ Gurage Zone Development Association
	☑ R.K. Stichting voor Bijzondere Gezondheidszorg (SBG)
	☑ Nederlands Albert Schweitzer Fonds
	☑ VSO Ethiopia
	☑ Johannes Stichting
	☑ Stichting Dayalu
	☐ UNICEF (SNNPR) Ethiopia
Public endorsements from	☑ Butajira Hospital
	☑ Gurage Zonal Health Department
	☐ SNNPR Regional Health Department
	☐ VSO The Netherlands & Ethiopia
	☐ UNICEF Ethiopia
	☐ Irish Aid Ethiopia

Mrs. Tienke Vermeiden
November 25, 2013

Mr. Andualem Mengistu Tsegaye
November 25, 2013

Project Proposal
Maternity Waiting Home
Butajira Hospital, Southern Ethiopia



1. Executive Summary

Maternity waiting home for improving maternal and neonatal outcome in Southern Ethiopia

In Ethiopia, the chances of women and newborns dying because of complications of pregnancy and childbirth are still high: 30% of all deaths among Ethiopian women in the reproductive age group are related to giving birth; 31 newborns die per 1,000 live births (compared to 2,6 in The Netherlands[1]). Most of these deaths can be prevented with early identification and treatment of complications. In Ethiopia, 90% of the women deliver their baby at home, with a relative or traditional birth attendant. The poor utilization of maternal health services and antenatal care in Ethiopia is mainly the result of barriers to access, such as financial, transportation and sociocultural barriers.

Butajira General Hospital is located in Southern Ethiopia, in the Eastern Gurage Zone, where the percentage of home deliveries is even slightly higher, namely 93.5%. To bring pregnant women closer to needed obstetric care and thereby improve maternal and neonatal outcome, Butajira Hospital plans to build a Maternity Waiting Home (MWH). A maternity waiting home is a facility within easy reach of a hospital that provides 24-hour comprehensive emergency obstetric care. Women with high-risk pregnancies or those that are living far away are encouraged to await their delivery here. To bridge the potential sociocultural gap, the hospital will conduct a baseline study to identify possible barriers and essential pre-conditions for use of the MWH. Furthermore, the hospital will seek support and collaboration from the community, from the grassroots level up to the political level.

To realize the MWH project, Butajira Hospital is seeking funds in total of 29.966 Euro. The majority of the funds are needed for the construction of the MWH (15.400 euro) to accommodate 10 women and their attendant, and to do community work (; the costs of running the MWH are relatively low. The results of the baseline study will be integrated into the implementation process, which could result in the need for more funding to overcome potential barriers. One of the barriers we foresee is the financial barrier; therefore we will raise funds for free deliveries for high-risk pregnant women staying at the MWH.

To ensure successful planning and implementation of the project, the hospital set up a MWH Committee composed of Ethiopian and Dutch professionals with expertise in international health and development and project coordination. The committee is working closely together with Dr. Asheber Gaym, Associate Professor at Addis Abeba University and Health Officer at Unicef, and with Dr. Jelle Stekelenburg, Associate Professor at the University of Amsterdam who did his PhD on MWHs in Zambia.

Thank you for your interest in our MWH project!

Andualem Mengistu Tsegaye	CEO Butajira General Hospital
Tienke Vermeiden	Hospital Administrator
Floris Braat	Medical Doctor, specialized in Tropical Medicine and Obstetrics
Gashaw Getnet	Medical Doctor
Merete Belete	Health Officer specialized in Emergency Obstetrics

Butajira General Hospital, Ethiopia
November 2013

[1] http://www.indexmundi.com/facts/netherlands/mortality-rate, viewed on November 9, 2013

2. Background information

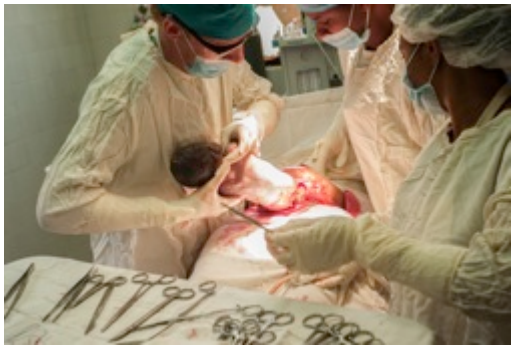
Ethiopia: the first day of life is the most dangerous for mothers and babies

Too many Ethiopian women die while giving life

Ethiopia is one of the five countries in the world in which half of global maternal deaths occur (Gaym, 2012; Shiferaw, 2013). Maternal deaths account for 30 percent of all deaths to women in Ethiopia in the age group of 15 to 49 (MoH, 2011). It is therefore unlikely that Ethiopia will meet Millennium Development Goal (MDG) 5 by 2015, set at 267 maternal deaths per 100,000 live births (MoH, 2012). With the estimated 2011 levels at 676 maternal deaths per 100,000 live births and 90% unattended deliveries, the challenge is clear (MoH Ethiopia, 2012). Hemorrhage, eclampsia, sepsis, unsafe abortion and obstructed labor are the five main direct obstetric causes of maternal death (Khan, 2006). Reaching a health facility on time that can provide emergency obstetric care is the best tool for reducing maternal mortality (WHO, 2004; Bulatao, 2003).

A dance with death: surviving the first month

A magnificent milestone: Ethiopia has already achieved the MDG 4 Target of reducing the under-5 mortality rate by two thirds between 1990 and 2015. Sadly, the risk of dying within the first month of life remains high; it constitutes 42% of under-5 deaths. Most of these deaths (70%) occur in the first week of a baby's life (Mekonnen, 2013). In high-risk pregnancies, neonatal mortality is known to be higher due to causes that are directly related to obstetrical complications like asphyxia and birth injury (Mekonnen, 2013). These complications and deaths can be prevented when women receive quality care.



Taking on the challenge of improving maternal and neonatal outcome in the Eastern Gurage Zone

Butajira General Hospital is situated 130 km south of the capital Addis Ababa, Ethiopia, and 50 km to the west of Zway town in the Rift Valley. It is located in the Gurage Zone of the SNNPR, the Southern Nations, Nationalities, and Peoples' Region, one of the nine ethnic divisions of Ethiopia.

With 190 beds, the hospital provides clinical services for the town of Butajira and its surrounding communities, serving approximately 1,300,000 people. Health services include:

- Emergency and Trauma care,
- Gynecology and Obstetrics,
- (24-hour emergency obstetrics) Surgery,
- Radiology Department, with high-resolution ultrasound,
- Pediatric Care, incl. Neonatal Intensive Care and a malnutrition program,
- Antenatal Care and Family Planning.

Last year[2], the hospital assisted 2,041 deliveries. The maternal mortality was 6 (0,3%). Infant mortality was 75, of which 50 where neonates. The number of women that visited antenatal care was 1,259.

In 2013 (2005 E.C.), the Zonal Health Department requested Butajira General Hospital to establish a Maternity Waiting Home (MWH). Provision of a MWH, a residential facility located near a medical facility with comprehensive obstetric care, where women can await birth, is a possible intervention to improve maternal and neonatal outcome (Stekelenburg, 2004).

Maternity Waiting Home in Attat Hospital

The hospital formed a committee to guide the planning, implementation and monitoring of the MWH project. The committee has 4 members: Mr. Merete, an Ethiopian Health Officer specialized in Emergency Obstetrics Surgery; Dr. Gashaw Getnet, an Ethiopian medical doctor; Dr. Floris Braat, a medical doctor from the Netherland specialized in Tropical Medicine and Obstetrics, and Tienke Vermeiden, a Hospital Administrator from the Netherlands, specialized in International Development and Communication.

Mr. Merete

Dr. Gashaw *Dr. Floris*

Tienke

3. Problem statement

The problems that Ethiopia faces with regard to maternal and neonatal health also apply to the specific situation of the SNNPR, where Butajira Hospital is located.

In the SNNPR, the percentage of home deliveries is even slightly higher than the national average, standing at 93.5% (MoH, 2011). This low utilization of maternal health services is mainly a result of barriers to access (Lonkhuijzen, 2012). Factors that prevent pregnant women from getting the care they need are recognized in the Three Delays Model (Thaddeus, 1994).

[2] Last year refers to 2005 in the Ethiopian calendar; the year starts and ends on a different date than in the European calendar.

The "Three Delays" as they relate to causes of Maternal Mortality	
The First Delay	Delays at community level in recognizing an emergency situation and/or delays in the decision to seek care at a health facility
The Second Delay	Delays in reaching appropriate care due to lack of access to transport or lack of resources to pay for transport
The Third Delay	Delays in receiving appropriate care – including adequate quality of care – after arrival at a health facility

Setting up a MWH is targeted at overcoming the Second Delay (Hussein, 2012). With its 24-hour comprehensive obstetric care, a MWH at Butajira Hospital can help bridge the gap between the rural areas – where 90% of the people live (MoH, 2011) – and the availability of quality care (the Third Delay). To contribute towards lifting the barriers of the First Delay, we will do a baseline study before the start of the MWH, build our relationship with the community and join efforts with other safe motherhood programs in the region.

4. The goal and primary objectives

"Pregnancy related deaths are preventable.
Let's do it, together with our community."

- Mr. Andualem, CEO Butajira General Hospital

Goals

1. The main goal is to improve maternal and neonatal outcome in the Eastern Gurage Zone, Southern Ethiopia.
2. To achieve the first goal, we aim increase the involvement of the hospital in the Eastern Gurage community with regard to maternal and neonatal health.

SMART[3] Objectives 2013 & 2014

1. To contribute towards reducing maternal and neonatal mortality amongst high-risk pregnant women in the Eastern Gurage Zone, measurable by a 13% increase in the total number of deliveries at Butajira Hospital[4] after the MWH is open for one year, attributable to an increase in the number of high-risk deliveries.
2. To communicate with all 19 health centers in the Eastern Gurage Zone about the MWH at least twice in 2014.
3. To create awareness about and gain support for the MWH from health professionals, community and/or religious leaders in 12 "woreda's", at the Butajira City Administration, the Gurage Zonal Health Department and the SNNPR Regional Health Bureau; support can be given through public endorsements, technical support and/or financial support.
4. To collaborate with at least one other Safe Motherhood program in the Eastern Gurage Zone by the end of 2014 to promote maternal care in general and the use of the MWH specifically.

At the end of 2014, we will evaluate the project results and determine the objectives for the following years. The aim is to make the project as self-sustainable as possible. Also see: Monitoring and Evaluation.

[3] Specific, measurable, achievable, realistic, time-bound
[4] In 2005 (Ethiopian Calendar; 2013 European Calendar), the total number of deliveries was 2,041.

5. The main strategies

Strategy 1: Conducting a baseline study

> *"One of the greatest challenges facing the global health community is how to take proven interventions and implement them in the real world. (…) We spend billions on health innovations, but very little on how best to use them. This problem affects everyone, but in particular populations in low- and middle-income countries where the implementation challenges are greatest."*
>
> **- World Health Organization** (Implementation Research in Health: a Practical Guide, 2013).

By engaging diverse stakeholders and multiple disciplines, our research can play an important role in identifying the contextual factors that affect the implementation of the MWH intervention in the Eastern Gurage Zone. By integrating our research into the project planning and implementation from the beginning, our scientific inquiry can be integrated directly into the implementation problem-solving process. Consequently, the results of the research could alter the other strategies.

Our specific research objectives for the baseline study are to describe:

1. The determinants of health that contribute to maternal health in the Gurage zone, Southern Ethiopia.
2. The possible barriers and essential conditions for use of a maternity waiting home (MWH) in the Gurage Zone, Southern Ethiopia.

To contribute towards more scientific evidence on the effectiveness of a MWH, we will also do a study on:

3. Maternal and neonatal outcome among women who gave birth in a hospital with a maternity waiting home (MWH) and women who gave birth in a hospital without a MWH over a 5-year period.

The research is supervised by:

Jelle Stekelenburg, M.D. / PhD
• Gynecologist, Leeuwarden Medical Centre, The Netherlands
• Lecturer & researcher, VU Amsterdam, Groningen University, Royal Tropical Institute (KIT), The Netherlands
• PhD Thesis 2004: Health Care Seeking Behavior and Utilization of Health Services in Kalabo District, Zambia
• Co-author Cochrane 2012: Maternity waiting facilities for improving maternal and neonatal outcome in low-resource countries (Review)
• Chairman of the Working Party International Safe Motherhood, The Netherlands, www.safemotherhood.nl

Asheber Gaym, M.D.
• Associate Professor of Obstetrics and Gynecology, Addis Abeba University, Ethiopia
• Health Specialist, UNICEF Ethiopia
• Author article 2013: Maternity Waiting Homes in Ethiopia – three decades of experience

For more details, please send us a request for the research proposal.

Strategy 2: Constructing the MWH on the grounds of Butajira Hospital
Based on the results of the baseline study, experiences from other Maternity Waiting Homes and the amount of funds raised, local contractors will build the MWH on the grounds of Butajira Hospital, in close proximity of 24-hour comprehensive emergency obstetrics care:

- A basic cement housing structure, sized approximately 5 m2 by 15 m2
- One room with 10 beds, matrasses, blankets and bed nets
- A veranda to provide shade
- Outside pit latrine facilities and washing area
- Outside traditional kitchen
- Cement and roofed corridor to the Obstetrics ward and OR
- Water and electricity provided by the hospital[5]

Pictures of Attat MWH. Top left: a room for 10 pregnant women and their attendant. Top middle: the "veranda" providing shade. Top right: traditional kitchen. Bottom left: toilet facilities with running water and pit latrine toilets. Bottom right: outside view, showing that the kitchen and toilets are close to the MWH.

Strategy 3: Community awareness campaign
The primary target audiences of the awareness campaign are women in the reproductive age group, their husbands, community leaders and traditional birth attendants. The aim is to promote the use of maternal care, and specifically the use of the MWH in case of a high-risk pregnancy. Intermediary target audiences are the health professionals in health centers and health posts; we need to inform them about the MWH and (train them) when to refer. We will seek collaboration with other parties who are already involved in maternal care in the community, see Strategy 4.

[5] Based on MWH at Attat Hospital, that has over 40 years of experience.

- Information to all stakeholders about the opening of the MWH, the criteria for admission, services offered, costs, etc.
- Invitation to all stakeholders to the MWH for a workshop at Butajira Hospital.
- Visit to all health centers by Butajira Hospital at least once in 2014.
- Provision of educational material on maternal care and the use of MWH to health centers, health posts and traditional birth attendants.
- Daily maternal and child health education to pregnant women coming to Antenatal Care and those staying at the MWH.
- Providing feedback to health centers about the pregnant women they referred to the MWH and delivered in the hospital.

Word of mouth promotion is said to be an essential form of promotion of the Maternity Waiting Home (Attat, 2013; MoH Cambodia, 2010). Women and their attendants leaving the MWH with their baby are our potential ambassadors.

Strategy 4: Community support and collaboration
Butajira Hospital cannot single-handedly bring about a decrease in maternal and neonatal mortality. It must be a collaborative and comprehensive endeavor. Therefore, we will seek collaboration with health professionals, traditional birth attendants, community and religious leaders, and (non) governmental organizations at different levels, from the grassroots level up to the regional level. In the maternal health determinants analysis, we aim to identify the most important stakeholders and existing safe motherhood programs that will allow us to join our efforts. Support and collaboration can be provided in numerous ways, for example by: publicly endorsing the project, giving technical advice, providing research support and/or financial support, partnering in maternal care activities, communities' willingness to relieve the burden of families of which the high-risk pregnant woman is staying at the MWH.

6. Beneficiaries

The primary beneficiaries are:

1. **High-risk pregnant women in the Eastern Gurage Zone**, by providing them the option to stay at the MWH. Staying near 24-hour emergency obstetrics care greatly improves a women's chance of survival as well as that of her baby in case of:
    a. breech presentation,
    b. malpresentation,
    c. multiple pregnancy,
    d. previous C.S.,
    e. previous stillbirths,
    f. previous antepartum hemorrhage,
    g. previous premature baby,
    h. short/young/elderly primigravida,
    i. pre-eclampsia/medical problems, and/or
    j. difficulty of getting to the hospital on time in case of emergency.
    (Attat, 2006; Gaym, 2013)
2. **Her children.** If a mother dies, her orphaned children have an increased risk of death (Anderson, 2007), poor health, educational outcomes and economic status (Yamin, 2013).

The secondary beneficiaries are:

1. **The community at large** benefits when maternal mortality decreases. Maternal mortality has a far-reaching impact on families and communities, by repeating the cycle of poverty (Yamin, 2013) and significantly lowering GDP per capita (Kirigia, 2006).
2. **Health professionals** are provided with a referral option for women with high-risk pregnancies.
3. **Butajira General Hospital** is able to provide a higher standard of care to its catchment population.

7. Timeline

	2013	2014				REQUIRED FUNDING in EURO
ACTIVITY	4th QUARTER	1st QUARTER	2nd QUARTER	3rd QUARTER	4th QUARTER	
1. Writing research proposal						
2. Writing project proposal						
3. Fundraising for research & project (if needed, ongoing)						
4. Preparing research						
5. Executing research						3.005
6. Preparing construction						400
7. Hiring public health officer						
8. Preparing community work						5.043
9. Constructing MWH *						18.920
10. Community work (community visits, workshops, etc.)						
11. Setting up protocols & training staff						
12. Opening of MWH						6.640
13. Maternal and child health education at hospital						
14. Monitoring & evaluation (yearly)						5.000
Total required funding						**39.008**

* With the Florentina Foundation, we are planning a "Support Trip" at the end of March 2014. The objective of the Support Trip is to give 10 to 20 volunteers the opportunity to provide physical and professional support to the MWH project in addition to their financial support. This means that they will help construct the MWH and donate a minimum amount of 500 Euro per person. It is the intention of the Florentina Foundation to build a long-term relationship with the MWH at Butajira Hospital, comparable to that in Tanzania where they have been involved for over 10 years.

8. Expected results

By the end of 2014, we expect the following results in the Eastern Gurage Zone, Ethiopia:

1. Insight into the maternal health determinants, existing barriers and essential pre-conditions for use of the MWH.
2. More evidence on the effectiveness of the MWH intervention for improving maternal and neonatal outcome.
3. A functional MWH at Butajira Hospital.
4. (Possible) solutions to overcoming barriers and creating essential pre-conditions for use of the MWH.
5. An informed and involved community.
6. A partnership between Butajira Hospital and a third party on safe motherhood promotion.

In the first year that the MWH is functional, we expect the following results:

7. Between 200 and 260 high-risk pregnant women stay at the MWH for on average two weeks.
8. An increase in the total number of deliveries at the hospital by 13%.
9. An increase in the total number of women that receive antenatal care at the hospital by 13%.

In 2013, UNICEF listed the MWH as ***"an innovative approach and low-cost solution to Maternal and Newborn Health"***. Once the construction is realized, the running costs of the project are relatively low, especially because no special staff has to be assigned. Women are not sick and can take care of themselves and each other. They visit Antenatal Care on a daily basis for education and contact with the midwife in charge. In case of problems, the Gynecologist is consulted. In case of labor, women are moved to the labor ward.

Yearly running costs MWH project	Birr	Euro
Electricity, water, provided by hospital	N/A	N/A
Maintenance on the building	7.500	300
Cleaner, provided by hospital	N/A	N/A
Public Health Officer, assigned & paid for by government	N/A	N/A
Total running costs	**7.500**	**300**

For the success of the project, it is crucial to determine the potential financial, geographical and sociocultural barriers in the Eastern Gurage Zone. Together with the community, we strive to create the necessary pre-conditions for high-risk pregnant women to stay at the MWH.

9. Monitoring and Evaluation

Based on the results of the baseline study, we will make the necessary adjustments to the implementation of the MWH intervention.

Monitoring will be done on a regular basis. After establishing the MWH, we will keep a logbook of pregnant women staying at the MWH. Data will include: socio-demographic data, the reason for admission and the pregnancy outcomes. In addition, we will ask the women staying at the MWH as well as their attendant to answer survey questions at the end of their stay about the perceived quality of care at the MWH and the hospital.

The results from the baseline study also allows for proper **evaluation of the intervention after implementation**. The project will be evaluated:

- By measuring the maternal health determinants before and after the implementation of the MWH intervention;
- By measuring outcome indicators related to maternal and neonatal mortality before and after the implementation of the MWH intervention.

VSO The Netherlands has donated 5,000 euro for third party evaluation of the project to make objective and valid interpretations about the implementation of the project's strategies, its outcomes and effects. We are currently considering which third party can best take on this role. Together with the chosen third party, we will design the specific evaluation plan and forms.

10. Project Budget 2013 & 2014

Strategy 1: Baseline study	Ethiopian Birr	Euro
Staff		
Data collectors	17.400	696
Translation	3.000	120
Statistical analysis	5.000	200
Research		
Printing questionnaires	1.250	50
Incentives focus group discussions	3.600	144
Travel		
Driver	1.900	76
Fuel	17.500	700
Hotel	3.200	128
Maintenance car	12.500	564
10% unforeseen/overhead costs	14.100	268
2% government fee ethical approval	1.473	59
Subtotal baseline study	***75.118***	***3.005***

Strategy 2: Construction MWH		
Advertising costs bidding process	10.000	400
Construction: house, kitchen, shower, 2 toilets	350.000	14.000
Construction: corridor to obstetrics ward	75.000	3.000
Beds, matrasses, blankets, bed nets	25.000	1.000
10% unforeseen/overhead costs	46.000	920
Subtotal Construction	**506.000**	**19.320**

Strategy 3: Community work		
Travel		
10 visits to 20 health centers	5.000	200
4 visits Regional & Zonal Health Bureau	2.400	96
4 visits NGO's	3.000	107
Maintenance	10.000	400
Education material	25.000	1.000
Regular workshops & trainings health officers, health extension workers, traditional birth attendants	125.000	3.000
10% unforeseen/overhead costs	17.040	240
Subtotal Community Work	**187.440**	**5.043**

Operational costs		
Free deliveries for MWH women	166.000	6.640
Subtotal Operational Costs	**166.000**	**6.640**

Monitoring & evaluation		
Third party monitoring and evaluation	125.000	5.000
2x visits per year to MWH Butajira		
Yearly reporting to Hospital and donors		
Subtotal Operational Costs	**125.000**	**5.000**

Total costs	**1.059.558**	**39.008**

Updated version 13 December 2013

Budget explanation

We are seeking funding for the realization of the different phases of the Maternity Waiting Home project at Butajira General Hospital in Ethiopia. The hospital has allocated 100,000 Ethiopian birr (4,000 euro) for the project. In addition, it will cover the running costs of the project, such as: water, electricity, staffing and maintenance.

Baseline study

- **Data collectors:** we will collect data at Butajira Hospital, Attat Hospital and in the community using questionnaires, in-depth interviews and focus group discussions. We will need 2 independent data collectors for 3 hours per day for 6-7 weeks in Butajira, 2 independent data collectors in Attat Hospital for 3 hours per day for 6-7 weeks, 3 data collectors for 8 days in the community, 1 focus group discussion leader for preparing and executing the focus group discussion, 1 data entry person for the 12,000 hospital records. Remuneration is based on a salary of 3,000 birr (120 euro) per month.
- **Translation**: The in-depth interviews and focus group discussions need to be recorded, transcribed and translated before the researchers can analyze the data. The researchers will do the transcriptions without compensation. One of the researchers will most likely do the translation, but in case this is not possible, we have included remuneration based on 1 month of work, based on a salary of 3,000 (120 birr) per month).
- **Statistical analysis:** to ensure that we are doing proper statistical analysis, we will call in the help of an experienced statistician.
- **Questionnaires**: the surveys that we do need to be printed.
- **Incentives:** Based on the experiences of other researchers in Ethiopia, we've included a small remuneration for those who participate in the focus group discussions.
- **Driver:** for the community surveys, interviews and focus group discussions with community members, we can use the car of the hospital or our own personal car, but we will need a driver. Salary is based on 100 birr per day (4 euro).
- **Fuel:** The data collection will be done at Butajira Hospital, which does not require travelling, at Attat Hospital, at 100 km from Butajira (4 planned visits for supervision and interviews), and in the catchment area of the hospital, at on average 50-90 km from the hospital (19 planned visits for surveys, interviews, focus group discussions). For supervision purposes, we will travel to Addis Abeba from Butajira, at 130 km (4 planned visits, including hotel costs as it usually is a 2-day trip). Fuel costs using our own car are estimated at 2.5 birr (0.10 Euro) per kilometer.
- **Hotel:** The data collection in the community will be done per 2 days, to save travel costs and time. For the data collectors and the driver, a hotel and meals are needed.
- **Maintenance costs** are calculated as follows: total kilometers * 2,5 birr for maintenance.

Construction

- **Advertising costs**: to manage the undertaking of the construction process, a construction bidding will be advertised.
- **Construction:** the MWH will start out small providing space for 10 beds, including toilet, washing and cooking facilities. This is based on an advice from Attat MWH; over 40 years ago, they also started with 10 beds. Anno 2013, they have 44 beds.
- **Beds, matrasses, blankets and bed nets**: this inventory is also based on what Attat provides at their MWH. There is no storage space, no beds for attendants, no kitchen utilities, etc. If the baseline study sheds a different light on this matter, we have to rethink this strategy.

Community Work

- **Fuel costs:** *Health Centers* - we estimate that we will visit 2 health centers in one day, travelling approximately 100 km per day. *Zonal Health Bureau* in Awassa at 162 km. *Regional Health Bureau* in Welkite at 108 km. Most *NGO's* are based in Addis at 135 km. The trips to Addis may not be possible in 1 day. For this, we calculated 2 rooms at 400 birr (16 euro) per person.
- **Maintenance:** Total km's = 1000 km to HC's, + 648 km to ZHB, 432 km to RHB, 1,080 km to Addis = 3,160 km * 2,5 birr maintenance costs.

Operational costs

- **Free deliveries MWH women**: many literature studies include **transportation and financial barriers** as the main barriers for seeking health care (MoH, 2011; Shiferaw, 2013). The government of Ethiopia has introduced free delivery care in 2005 (Ethiopian calendar; 2012 European calendar). However, hospitals are not adequately reimbursed for this service (Pearson, 2011), making it difficult to offer this to patients and still provide quality care. To lower the financial barrier, we will raise funds to offer free deliveries to women staying at the MWH.
- **Other running costs**: the costs of running the project will be relatively low. The required staff is limited and does not need to be solely assigned to the MWH. Water and electricity will be provided by the hospital, incurring little extra cost. For now, we are following the advice and experience of Attat MWH not to provide kitchen utensils, food or other items. If the baseline study proves that this will form an important barrier for women to use the MWH, we have to rethink our strategy. One option is to raise more funds and another is to set up small Income Generating Activities that can be done by the women staying at the MWH, such as making "injera".

11. Literature & references

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Annex 1: Endorsement Butajira General Hospital

Butajira General Hospital

Office of the CEO

P.O. Box 46

Butajira, SNNPR, Ethiopia

November 25, 2013

RE: Maternity Waiting Home at Butajira Hospital

Butajira General Hospital is hereby expressing its support for setting up and running a Maternity Waiting Home at the hospital.

The birth of a child should be a time of wonder and celebration. But for thousands of women and babies in our catchment area, it is a dance with death. Maternal deaths were estimated at 676 per 100,000 live births in 2011 in Ethiopia, while the MDG is set at 267. Can we save the lives of these women and babies? In most cases, the answer is: yes. Most maternal and neonatal deaths are from preventable and treatable causes, if the needed care is available and on time.

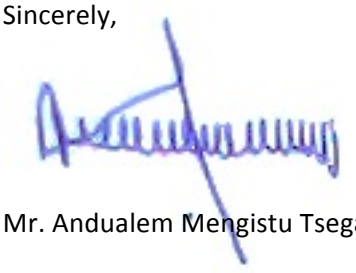
Provision of a Maternity Waiting Home (MWH), a residential facility located near a medical facility where women can await birth, is a low-cost intervention and a tremendous opportunity for us to save lives. A Maternity Waiting Home can help bridge the gap between the rural areas around Butajira – where 90% of the people in our catchment area lives– and the availability of quality 24-hour emergency obstetrics care at our hospital.

Mother and newborn survival is a clear opportunity for our community. Mothers and children surviving and staying healthy means more children in school and able to learn, which in turn means productive adults who can drive sustained economic growth.

In sum, Butajira General Hospital wants to contribute to reducing maternal and neonatal mortality through the provision of a MWH. The Governing Board of the hospital has approved the Maternity Waiting Home Project, as part of 2006 Annual Plan, and has allocated 100,000 Ethiopian birr. To cover the required budget, we will seek collaboration with NGO's. We will also be working more closely together with the community to identify and tackle possible barriers for use of the MWH.

We look forward to working with the MWH Committee, the community and partnering NGO's to ensure the project is successfully implemented and monitored.

Sincerely,



Mr. Andualem Mengistu Tsegaye