Background

Reproductive health in Malawi is framed by “uniform poverty”, according to a physician in the southern district, and the many challenges to health this poverty poses. In addition, a famine which started several months ago in pockets of the country is becoming more widespread.

The latest published prevalence figures for HIV suggest infection rates among adults of about 25 per cent in urban areas and 13 per cent in rural areas. Among women 15 to 24 years old, the estimated prevalence rate is 13 per cent. Ten per cent of women attending antenatal care in rural areas are HIV positive, as are 20 per cent of urban women who seek antenatal care. While the rates vary in the North and South, it is estimated that 70 per cent of the country’s hospital beds are occupied by those who are HIV positive.

The maternal mortality ratio has probably increased dramatically in the last decade. Of note is the fact that the C-section rate (as reported in the southern region) is very low, 2.7 per cent. The rate of obstructed labour ranges from 10 per cent to 22 per cent. Since fistulas form as a result of obstructed labour when emergency C-sections are not available, the logical conclusion is that fistula is a common occurrence. In addition, the review of a theatre logbook at one site revealed a considerable number of destructive vaginal operations for obstructed labour. It was apparent that fistula is widespread in the districts that were visited, although it should be noted that the study was done in only four districts and that the findings are not intended as generalizations about the fistula situation in the country. For these and other reasons, despite an unknown prevalence rate in the country, providers concur that fistula is a major problem in Malawi.

There is some good news on the reproductive health front, however. The contraceptive prevalence rate for modern methods has more than tripled since 1992. Currently, 30.5 per cent of married women are using a method—and 26 per cent are using a modern method; in 1992, the latter figure was only 7 per cent. In addition, 91 per cent of mothers who had children in the previous five years had at least one antenatal care visit. For 56 per cent of the births, the mothers had four or more antenatal care visits. Unfortunately, fully half of all pregnant women had not had even one antenatal care visit by the start of their sixth month of pregnancy, so the timing of visits remains a challenge. Despite this fact, the percentage of attended births delivered within a facility is 56 per cent, significantly higher than in neighbouring countries. The Government of Malawi, recognizing that maternal health needed to be made a priority, instituted a Safe Motherhood Initiatives programme in 1995, with the ultimate goal of reducing maternal and infant mortality by improving access to quality essential obstetric and neonatal care. To improve access, one key objective has been to obtain more vehicle and bicycle ambulances and to put these in the hands of headmen, whom experience has suggested are recognized by the community as those best suited to manage dispatch. There remains conflicting evidence, however, on the cultural acceptability of bicycle ambulances.

In addition to increasing access, the programme has also aimed to improve the attitudes of health care providers as well as to sharpen their technical skills. To understand the current situation, research will be conducted on attitudes and motivations, as well as what can be done to improve the supervisory system. A key component of the current initiative is to work closely at the community level to establish village committees on safe motherhood, organize transportation plans and enhance the knowledge of TBAs so that they can recognize signs of obstructed labour and act efficiently to get a woman to a facility. The (relatively high) percentage of women who deliver in a facili-
ty, as mentioned above, may be due to the interventions of the safe motherhood programme to date.

**Issues and Challenges**

The needs assessment team met with UNFPA country office staff, the MOH Reproductive Health Unit and staff of the United States Agency for International Development (USAID) in Lilongwe. In Blantyre, the team met with a representative of the Safe Motherhood Programme in the southern district, funded by the UK Department for International Development (DFID), as well as with staff of Queen Elizabeth Central Hospital and Mwaiwathu Hospital, a private hospital that provides services only for clients who can pay. Finally, the team met with staff at Mulanje Mission Hospital in Mulanje, Zomba Central Hospital in Zomba, Machinga District Hospital in Machinga and Nkhoma Mission Hospital in Nkhoma. At a debriefing meeting, the team also had the opportunity to engage in discussion with representatives from WHO and the Canadian International Development Agency (CIDA).

Of note is the fact that a gap exists between some policy makers and the service delivery community in terms of perspectives on fistula and knowledge about the condition. Among those who had not had the opportunity to spend a lot of time in treatment settings, there was little knowledge about fistula as a key reproductive morbidity within the country. At service delivery sites, the consensus among all levels of providers was that fistula is a big and growing problem. In fact, when asked whether any official communication (or advertising) about the availability of fistula repair services had been done in the community, one provider said, “Oh no, we would be too scared to do so...we would be overwhelmed.”

The situation of women and their ability to seek maternal health care services is strongly influenced by local cultural beliefs, pregnancy at a young age, profound gender inequities and limited transportation options. In addition, at the facility level, there have been such dramatic staffing shortages that many health centres have had to close. Within the existing facilities, there are a number of challenges to quality of care, most notably poor staff treatment of clients and shortages of materials and supplies. Finally, as other reproductive morbidities, such as cervical cancer, are becoming more widely recognized, there is competition within facilities for operating theatre space as, understandably, clients with potentially life-threatening conditions take priority over fistula clients.

At the community level, depending on the region or area of the country, a number of local beliefs about pregnancy and delivery serve as obstacles to women seeking care, even when in obstructed labour. For example, in deference to local traditions, a woman will try not to tell anyone her due date. During antenatal care visits at health facilities, when asked the first date of her last menstrual period, she will reply that she must consult with her husband, as he will know. Indeed, he does know, as it is his responsibility to report a missed period to the elders, since menstruating woman are considered “impure” and, for this reason, are not allowed to perform certain tasks within the community.

As is often cited in neighbouring countries, women in the areas visited, are expected to give birth at home, especially for the first time. If a woman has a prolonged labour, she is assumed to have had other sexual partners, and must shout them out in order for the baby to be “released” through the birth canal. In some communities, the husband or partner is also expected to name other partners. One reason cited for a woman not delivering at facilities, therefore, is that it would appear that she is anticipating a difficult delivery because she has had other partners—thus labelling herself guilty of such actions even before enduring a prolonged labour. Decisions about when and where to seek care are usually made by the uncle (or occasionally, by the husband); without their input, a woman would be unlikely to seek care on her own. Because it is considered embarrassing to be in labour, if a woman needs to be transported to a health facility, she will wait until it grows
dark so that others will not see her.

Given that women most often experience first pregnancies as adolescents, the risk of obstructed labour is even greater because of insufficient pelvic size. Moreover, since they may have participated in rites of initiation, they are prime candidates for early and repeated STIs. While some initiation rites are educational and designed to teach girls about hygiene, cooking, housekeeping and sewing, others put them at significant risk. Notably, in some parts of the southern district, practicing “afisi” (which means hyena) involves sexual activity with a girl as young as eight. The girl’s parents choose, negotiate with and pay a man from their community to initiate sexual activity with their daughter at night as a way to “teach” her how to have sexual relationships. The girl is not told about this arrangement beforehand and, because it is dark, is not supposed to be able to identify the man.

Given all of the inequities in gender relations, it is not surprising that there is also evidence of imbalance of power in issues related to transportation. In some locations, bicycle ambulances were considered a possible way to overcome the dearth of transportation options, but in many locations, women would not be allowed to ride a bicycle. In addition, because women could be seen on a bicycle, even if the bicycle were driven by a man, it is not considered an ideal choice for a woman in labour. Furthermore, the oxcarts which were designed to help some communities secure additional transportation had to be re-positioned to tilt, as anyone lying on a flat surface is often considered dead.

Despite these obstacles, many health centres now have telephones and some have radios to communicate with the referral hospital, which can dispatch a vehicle ambulance (if one is available, working, etc.) In addition, the village health committees have helped to organize bicycle ambulances and oxcarts. Unfortunately, given the size of the districts, the many health centres (often 14 to 16) contained in each district and the tendency of the vehicle ambulances to break down, it can still easily take 24 hours for one to appear if called. As noted above, the bicycle ambulances and the oxcarts have faced some challenges, but are functioning effectively in some communities.

Moreover, because of severe staffing shortages, a number of health centres have had to close and a brand new, fully equipped health centre has not been able to open. The nursing school has had little success getting their students licensed (75 out of 100 students failed this year), and 1,800 trained nurses in the country are not working as nurses because the pay is so low and the working conditions so poor. In addition, the nursing council reports that 65 nurses have left Malawi over the past year for more lucrative employment elsewhere. There are 10 gynaecologists in the country, including eight expatriates, and they are all located in the central and southern districts. Due to the staffing crisis, many stories were shared with the assessment team about less than ideal solutions to this difficult situation.

Not surprisingly, the quality of care is compromised within the health facilities that continue to function. Nurses are in charge of as many as 140 patients per ward, and are often reported as treating the clients very poorly, a clear deterrent to seeking care at a facility. The team repeatedly heard stories of women being told immediately after giving birth to “clean up their mess” with their own chitenge cloths, a sari-like cloth wrapped around the lower body of a woman for reasons of modesty and custom. Supplies of medical equipment and other materials are not great, although in the case of fistula surgery, most staff report that they have what they need to conduct such operations. An exception occurs when supplies of materials also used for other operations, such as sutures and catheters, are depleted.

Despite this challenging scenario, the sites conducting obstetric fistula repair (visited by the team) serve one to 12 clients per month. For example, the facility in Nkhoma was performing an average of 12 to 14 cases per year between 1997 and 1999, but since the arrival of a gynaecologist with interest in fistula, the numbers have risen
steadily to 35 in 2000, 40 in 2001 and 30 in the first six months of 2002. In Zomba, the physician has operated on 48 cases in the four months since holding a training workshop. Although few providers in Malawi have had the opportunity to be trained at an official training centre, such as the hospital in Addis Ababa, through great initiative on their part they have formed a collegial network of interested parties. The physician in Zomba (as noted above) helped to organize a fistula training workshop in April, which brought in outside expertise in the form of two well-known fistula surgeons from Europe. During the workshop, eight fistula clients were operated on and the physicians and clinical officers had an opportunity to upgrade their skills.

It should be noted that in Malawi, unlike some other countries in the region, any cadre of clinical or medical officers can be trained to do fistula repair. There is no policy limiting this training to specialists. “For us, competence is the only thing that matters,” commented a chief administrator at a hospital in Blantyre.

While six sites were visited in central and southern Malawi where repairs are conducted, an additional four sites are known to have been conducting fistula surgery in the past, and there may be others with the capacity as well. In each of the mission and government hospitals, the providers stressed the fact that the number of fistula clients is increasing. Whenever a provider with the capacity to conduct repairs is present, “the women just know and they show up,” explained a provider in the southern district. When the providers leave, even for a holiday, the women stop coming. Providers have taken the initiative to travel to other districts to operate both to help a local provider who needs support in conducting fistula repair surgery and because fistula clients are often too poor to be able to fund their transportation to a service delivery site. In one hospital in the north, a provider was trained to do repairs at the hospital in Addis Ababa, but he is the only one at the facility and is not sufficiently comfortable with his skill level to perform fistula surgery alone. As in other locations, this situation points to the need to train more than one person per site.

None of the sites visited require obstetric fistula clients to pay. In each of the government hospitals, clients were not expected to pay for services, as is customary in government sites. Although mission hospitals usually do require some form of payment, in one of the mission hospitals visited, the doctor pays for all of the surgeries out of her own pocket and, in the other, the doctor has been able to raise funds from an American organization to cover the costs of the repairs he does.

**Recommendations and Critical Needs**

- **Support Zomba Central Hospital as a site for a national or regional fistula repair training centre.** Zomba Central Hospital is well positioned to become a training centre for a number of reasons. They have already conducted an international level training workshop and have plans to conduct another one. They are doing on-the-job training in fistula repair among clinical officers and nursing sisters. The gynaecologist is currently going out to other districts to perform fistula surgery in support of a network of colleagues and hospitals, linkages that are now well established. In addition, the hospital is in the midst of constructing a theatre for gynaecological surgery, which could be used for fistula surgery training sessions. Unlike the other nearest central hospital, Zomba is not overwhelmed by a huge number of emergency surgeries, so there would not be a need to stop and start fistula operations when emergency cases appear. Finally, and perhaps most importantly, the chief administrator, a physician who does fistula surgery and other staff have planned this initiative on their own, so they already have ownership of the issue and are now working to make it a reality.

- **Conduct data gathering to assess the situation of girls and women with fistula at the community level and adapt the current health management information system to capture**
fistula information at the national level. While much is known about women with fistula if and when they make it to a facility, little is known about their situation at the community level. Insight into the lives of girls and women from this perspective will be pivotal in initiating work to prevent fistula and to facilitate reintegration back into the community once they have been repaired. In addition, adapting the current health information management system to collect data on fistula will facilitate the ability of national level policy makers to create programmes and responses within the context of a reasonably accurate prevalence rate.

• **Standardize protocols and guidelines for fistula surgery, as well as pre-operative and post-operative care.**
  As the needs assessment team conducted interviews with all levels of providers, it became apparent that a standardized set of guidelines or protocols would help to facilitate the use of best practices. Even sharing simple tips about how to help a fistula client train her bladder after surgery would help those caring for clients to do a better job.

• **Ensure that fistula training always includes more than one person per site.**
  When conducting training on fistula repair, it is critical that at least two individuals per site are trained, preferably a doctor-nurse team. If only one person at a facility has been trained, s/he appears to be significantly less likely to feel comfortable conducting fistula repair surgeries, so is not likely to be able to maintain his/her skill level. If a decision has to be made between training two people from one site or one person from two sites, the former option is more likely to create sustained change than the latter, an especially important lesson if a national or regional training centre is created.

• **Support the collegial network of providers already working on fistula.**
  The physicians, medical and clinical officers, and nursing staff who are working on fistula have done much to find and support each other on this issue in Malawi. Finding ways to continue to support their initiative and enthusiasm is critical. Perhaps a card with a list of all the referral facilities and providers could be created and distributed throughout the country and kept updated. Some fundraising could also be done to secure equipment and supplies for providers and even furnish them with some money they could draw on for fistula clients. Any measures that would support these providers would go a long way toward engendering goodwill and ensuring that high quality fistula services remain available in Malawi.

• **Focus on prevention by increasing awareness of different aspects of reproductive health.**
  Data indicate that approximately 91 per cent of pregnant women in Malawi have had some type of antenatal care. These visits would be an opportune time for providers to offer information on the potential complications of childbirth and the importance of emergency obstetric care. Giving culturally appropriate information to community members about the potential harm of some common traditional practices and early marriage might also dispel misperceptions about obstructed labour.
A. Queen Elizabeth Central Hospital, Blantyre, visited 7 August 2002

**Size:** Unclear. Most of the hospital is non-paying, but there is a paying ward, which operates at about 40 per cent of capacity most of the time.

**Medical staff:** Three gynaecologists, but the only one doing fistula repairs is Dr. Rijken, who has performed more than 1,000 fistula repairs in his 20 years practicing in the tropics. Queen’s Hospital serves as a referral hospital for fistula due to Dr. Rijken’s skill level. Specialists are employees of the university rather than the hospital, and they have limited time for actual clinical practice because of their teaching duties. There is a critical nursing staff shortage; most nurses are charged with caring for more than 100 patients and work from 7:30 am to 5 pm. Queen’s is noted as the hospital with the worst staffing shortage in the country.

**Caseload:** At least 52 fistula clients per year are operated on; more are waiting for services, especially when other gynaecological surgeries need to take precedence or Dr. Rijken is away.

**Provenance of clients:** The clients come from all over; many are from Mozambique.

**Typical client profile:** All ages of women, but the majority of clients are young—about age 18 is typical, although most do not know exactly how old they are. Usually they experience a fistula with their first delivery.

**Assessment and screening process:** Not available.

**Post-operative care:** Not available.

**Rehabilitation/reintegration:** Not available.

**Community outreach:** None, except for a DFID-funded safe motherhood project working in the southern district.

**Support at the policy level:** Fistula is not a priority at the policy level.

**Estimated fully-loaded cost per procedure:** Not clear. Clients do not have to pay.

**Resources:** The Government of Malawi.

**Barriers:**
- Far more clients request services than can be operated on.
- Only one specialist with skills is available and he has only one to two days of theatre time each week.
- Transportation is difficult for women to manage.
- Delays in getting to the facility are often pronounced.
- Staffing shortage is critical.
- Due to all of the above, women sometimes have their surgery postponed two or three times before it can take place.

B. Mulanje Mission Hospital, Mulanje, visited 7 August 2002

**Size:** 160 beds.

**Medical staff:** One American gynaecologist, two tropical doctors from the Netherlands, and clinical officers. The American gynaecologist, Dr. Sue Makin, was trained during six weeks at the Addis Ababa hospital in 1995 and performs “simple” VVF repairs. The more complicated fistula cases are referred to Dr. Rijken at Queen’s Hospital in Blantyre. “Need to have the imagination of a plastic surgeon for the difficult cases—I don’t have it!” Dr. Makin reports. She also does simple repairs for two other hospitals from time to time.

**Caseload:** About 12 fistula clients per year.

**Provenance of clients:** Most are from the area bordering Mozambique.

**Typical client profile:** Most are young (around 18); most are pregnant for the first time and very poor. Occasionally, a woman has already had one to six children at home before running into a problem with obstructed labour and developing a fistula. Dr. Makin covers the cost of the procedure, which is about $15 USD.

**Assessment and screening process:** Dr. Makin
examines the women (without anaesthesia) to determine if she can do the repair. If she thinks she can and it has been three months since the fistula formed, she usually can operate on them within a couple of weeks. Otherwise, she sends clients home until it has been three months and refers the difficult cases to Queen’s, where there is a waiting list of about three to four months. No screening tests are done.

**Post-operative care:**
- Nurses are trained to care for fistula clients.
- Clients tend to stay in ward for about two weeks following surgery.
- Clients are counselled on HIV and family planning methods and can get free methods at the hospital—Norplant, depo and tubal ligations are the most common.

**Rehabilitation/reintegration:** No programmes were mentioned, and Dr. Makin covers the cost of the procedure and the food for the client and an attendant she may have. Dr. Makin’s perception is that about half of the time, the partner/husband stays with the woman; the other half of the time women are abandoned and end up returning to their parents’ house.

**Community outreach:** None known.

**Support at the policy level:** Although fistula is not perceived to be a priority, especially since the recent discovery of a great deal of cervical cancer, a group of doctors in the southern region communicate regularly about fistula and convened a workshop on the topic in March, during which they operated on eight cases the same week.

**Estimated fully-loaded cost per procedure:** Hospital charges about $15 USD per procedure but it is not known what the actual cost to the facility is. Clients do not have to pay.

**Resources:**
- The Government of Malawi.
- Presbyterian Church of the United States.
- Presbyterian Church of Ireland.
- Presbyterian Church of Scotland.
- Dutch NGOs.
- Project HOPE (Health Opportunity for Everyone) supports voluntary counselling and testing (VCT).

**Barriers:**
- No anaesthesiologist, so surgeries have to wait until one can come, usually about once every two weeks.
- Inadequate supply of HIV/AIDS tests. The government is supposed to provide them, but they seem to “go missing”. Frequently, when the supply is low, the hospital saves the tests to use on potential blood donors.
- Fistula prevention messages in the community need to be created.
- Famine is becoming more widespread.

---

**C. Maiwathu Hospital, Blantyre, visited 7 August 2002**

**Size:** 60 beds.

**Medical staff:** Five gynaecologists, one anaesthesiologist, and an ample number of nurses.

**Caseload:** Four fistula clients over the past three years, but fistulas were not obstetric in origin.

**Provenance of clients:** Clients at this facility are from Blantyre and have the means to pay what are considered hefty sums locally for services. The cost of a C-section, for example, is 36,000 kwacha ($450 USD). Most women with fistula are from the border area with Mozambique; some are from inside Mozambique. One staff member noted, “There are many, many women living with fistulas in rural areas” but they are not seen in this hospital.

**Typical client profile:** Fistula clients at this private hospital are not the typical ones, as these clients have a fair amount of disposable income. They are older and their fistulas are from other causes, not obstructed labour.

**Assessment and screening process:** Not available.

**Post-operative care:** Not available.

**Rehabilitation/reintegration:** Not available.
Community outreach: Not available.
Support at the policy level: Not available.
Estimated full-loaded cost per procedure: Not known.
Resources: A private bank and an American organization helped to fund the hospital; all patients pay for services.
Barriers: Not available.

D. Zomba Central Hospital, Zomba, visited
8 August 2002

Size: 400 beds; currently, some patients are having to share beds. One major operating theatre, one small theatre and one more currently planned.
Medical staff: Two OB/GYNs (expatriates from Austria who have been there two years and are leaving in October); and clinical officers.
Caseload: The hospital has done 48 repairs in the last four months, of which two were RVFs; during the week that Dr. John Kelly was there for the workshop, they conducted eight repairs.
Provenance of clients: Most were referred from other district hospitals; some come from Zomba catchment area as well, which serves 1.5 million people; Zomba has become a fistula referral centre.
Typical client profile: The majority are young, and the fistula occurred with their first pregnancy. Some clients have been living with fistula for as long as 15 years. However, all are poor and many have been ostracized or are ashamed of their condition so they won’t tell a nursing sister immediately why they are there: they might first mention “stomach pains”.
Assessment and screening process:
• Examination with anaesthesia to determine the position and size of the fistula.
• Screening and treatment for any current illnesses/conditions.
• No routine HIV screening.
Post-operative care:
• Dye is injected into the bladder to make sure that procedure was successful.
• Clients are counselled on abstaining for three months; the husband is likely to hear in the community that his wife is now healthy, so he tends to come back to her once she has been repaired.
• Clients are counselled on family planning (injectables are most popular method), HIV/AIDS and the need to return to the hospital to give birth for any future pregnancies.
• Clients tend to stay on the ward (with other female clients) for two weeks with catheter.
• Bladder is trained for another several days.
Rehabilitation/reintegration: None known.
Community outreach: Some bicycle ambulances are bringing women in, so this link with the community has been at least partially successful. Nurses are trying to work with TBAs to help them to recognize signs of obstetric emergencies, yet they have found that they need to go back repeatedly to follow up to support the TBAs.
Support at the policy level: The Department of Clinical Services at the MOH has been supportive.
Estimated fully-loaded cost per procedure: Not known, but women do not have to pay.
Resources: Funds from the Government of Malawi, as well as a few donations and equipment from expatriate visitors.
Barriers:
• Currently, space is a constraint, but a new building is being constructed. The original building dates from 1938.
• When the two Austrian OB/GNs leave, the hospital will need to find another gynaecologist.
• Although equipment and materials are sufficient for now, if Zomba becomes a fistula training centre, the hospital will need to secure more supplies, as well as a steady source of staff and financial support.
E. Machinga District Hospital, Machinga, visited 8 August 2002

Size: 239 hospital beds.
Medical staff: Two general doctors, one gynaecologist (Egyptian), one surgeon, two anaesthetist clinical officers, one orthopedic clinical officer, four general clinical officers and 46 nurses.
Caseload: Currently the facility handles about three cases a month. They refer many cases to Queen’s as well, since the doctor currently feels comfortable operating on simple cases only.
Provenance of clients: Clients come from throughout the region. The hospital is newer than most and has a reputation for being very good and for having staff who treat clients well. The hospital is also in the president’s district.
Typical client profile: Young (younger than 20 years old), first pregnancy, poor. Staff note that they are seeing pregnancies in girls as young as 12 in the region. There is a strong belief in rural areas about giving birth at home.
Assessment and screening process:
• Examination under anaesthesia.
• Screened for schistosomiasis.
• Haemoglobin.
• Stool/urine checked.
• No HIV tests.
Post-operative care:
• Clients are given counselling on abstaining, family planning and the need for subsequent deliveries to occur in a facility.
• Women tend to stay in ward for about 14 days.
Rehabilitation/reintegration: No information was available, but staff members feel that there is not much ostracizing of women with fistula in the community.
Community outreach: Nurses are working in communities, but not on fistula specifically. They do talk with village health committees about how to identify obstetric emergencies and have given advice on how to create a makeshift “ambulance” using poles and cloth. The famine has had an impact in the area.
Support at the policy level: Staff members feel that because the facility is located within the president’s district the perception is that they are well supported.
Estimated fully-loaded cost per procedure: Not known.
Resources: The Government of Malawi.
Barriers:
• The biggest obstacle is early childbearing.
• The skill level of the OB/GYN is limited. He would like to get more practice in fistula repair.

F. Nkhoma Mission Hospital, Nkhoma, visited 9 August 2002

Size: 220 beds; two operating theatres, only one of which can be used for fistula repairs.
Medical staff: Three doctors, one of whom, Dr. Ter Haar, has experience and interest in gynaecology, but is not a gynaecologist; three clinical officers. There is no anaesthesiologist, so the clinical officers supervise spinal anaesthesia. A severe shortage of nursing staff is currently a problem. Two VVF workshops were held this year: one with Dr. Kelly and one with Dr. Lydia Engelhart and Dr. Walter Hull from the United States.
Caseload: Fourteen fistula clients in 1997; 10 in 1998; 14 in 1999; 35 in 2000; 45 in 2001; and in the first six months of 2002, the staff has performed 30 repairs. The problem is growing, and they are receiving more referrals. The hospital tends to do 1,500 to 2,000 deliveries each year. No advertising is done—the referrals spread by word of mouth for the most part, except for official ones that come from Lilongwe Central if they are backed up there. At Nkhoma, they reserve the really difficult cases for the visiting teams, which so far have been coming once a year.
Provenance of clients: From the area, as well as from Mozambique. As mentioned above, many referrals are now coming from Lilongwe Central Hospital.
Typical client profile: Young (about 15) and married at an early age. The belief that women must have their first baby at home gets in the way of coming to the facility to deliver. Often the women arrive too late.
Assessment and screening process:
• A clinical exam is done to determine the position and size of the fistula and its degree of complication.
• Exams under anaesthesia are performed for cases that would be difficult to examine otherwise.
• Since the laboratory is not equipped for cultures, clients are not routinely screened for other infections or complications. Occasionally a urine exam under microscopy is performed.

Post-operative care:
• Clients usually stay for 14 days, until the catheter comes out.
• Bladder training is not routinely done.
• Clients are counselled on coming back to hospital to deliver in the future. No specific counselling on family planning or HIV is done, but no restrictions against doing so are in place.

Rehabilitation/reintegration: No information known.

Community outreach: Antenatal care is “talked up” at the community level; 80 kwacha ($1 USD) is the cost for visits during the entire antenatal care period, but no one is turned away who cannot pay. In this area, there is not a strong culture of antenatal care visits, so nurses go into communities. HIV/AIDS is very stigmatized.

Support at the policy level: None known. One provider noted that it would be helpful if the Ministry of Education crafted a clear message on the problems of early marriage and childbearing.

Estimated fully-loaded cost per procedure: Not known.

Resources:
• Dr. Ter Haar has organized a fistula fund (supported by an American organization) so fistula clients do not pay.
• A variety of church organizations.
• Two doctors are supported through the Dutch Reformed Church.
• The Government of Malawi pays all salaries, except for doctors; visiting teams of doctors pay all of their own costs.

Barriers:
• Large number of clients.
• May be hard for Dr. Ter Haar to keep up if numbers keep rising.
• At a community level, there is much work to be done on HIV/AIDS.

Key Contacts
The needs assessment team is deeply grateful to the following individuals in Malawi for their assistance with this project:

UNFPA Country Office
Dr. Charlotte Gardiner, Country Representative, and staff

EngenderHealth
Ms. Deliwe Malema, Country Programme Manager

Ministry of Health
Ms. Jane Namasasu

Machinga District Hospital
Mr. Chisutu, Clinical Officer, and nursing staff
Ms. Beata Zuzu

Maiwathu Hospital
Dr. Francis Sungani and nursing staff

Mulanje Mission Hospital
Dr. Sue Makin and nursing staff

Nkhoma Mission Hospital
Medical and nursing staff
Dr. Ter Haar (communication via e-mail)
Dr. Krueger
Mr. Vincent Usiwa, Clinical Officer

Queen Elizabeth Central Hospital
Dr. Ibrahim Idana and staff
Dr. Rijken (communication via e-mail)

Safe Motherhood Project (DFID)
Ms. Hannah Ashwood-Smith, Health Planner

Zomba Central Hospital
Dr. Austin Mnthambala and medical and nursing staff