

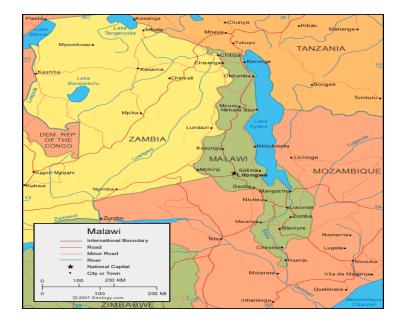
Visit report	
Country visited	Malawi
Institution visited	Kamuzu Central Hospital, Lilongwe
Date of visit	April 2023
Team members	Tamsin Greenwell
	Nikesh Thiruchelvam
	Suzie Venn

Scoping visit

Background

In sub-Saharan Africa the prevalence of urinary incontinence (UI) is difficult to assess because of the wide variation in data collection, resulting from patients hiding their condition due to the stigma associated with incontinence in many communities. Whilst much of the literature from low- or low middle-income countries focuses on UI from pelvic floor fistula, recent evidence demonstrates that non-fistulous stress, urgency and mixed UI are highly prevalent in sub-Saharan Africa. Urinary incontinence has significant social and emotional consequences, with a high proportion of women in African countries reporting relationship problems, depression and suicidal ideation. There is poor understanding of the perceived aetiology of incontinence in sub-Saharan Africa (SSA), which may, in part, act as a barrier for women to seek medical advice. Innovative solutions have been found to manage the large number of obstetric fistulas that are prevalent across Africa, but a lack of capacity of specialists trained to treat women with UI means that more doctors, medical officers and better resource prioritization will be required to help the, as yet unquantified, number of women with non-fistulous leakage.

Malawi is a presidential republic in South-Eastern Africa with an area of 118,000 square kilometres. It has a population of 19 million, most of whom live in rural communities. Average life expectancy is 60 for men and 64 for women. 43% of the population are under 14 years of age; infant mortality is 35 per 1,000 live births.



Malawi has central hospitals, regional and private facilities. The public sector offers free health services and medicines, while non-government organisations and private doctors offer services and medicines for fees. Health insurance schemes have been established since 2000. At least 70% of the population access free healthcare funded and provided by the Government through ministry of Health. There are four tertiary referral hospitals, the biggest of which are in the capital Lilongwe at Kamuzu Central Hospital (KCH), and in Blantyre, the commercial capital. Malawi has just 60 specialist surgeons, mostly general and orthopaedic. Of the two urologists working under the Ministry of Health, one is based at KCH, the other at Zomba central hospital. A considerable proportion of the urological surgery in Malawi is open (not key-hole, minimally invasive surgery), and mainly done by general surgeons. Malawi has one of the lowest per-capita/doctor ratios in the world at 0.000025 doctors per 1,000 people (2012).

KCH is a 1,200-bed tertiary hospital catering for central and northern Malawi. Apart from urology, the department of surgery at KCH offers general, orthopaedic, plastic, paediatric, neurosurgery and ENT services. The College of Surgeons of East Central and Southern Africa (COSECSA) has accredited the hospital to offer specialist fellowship training programs in urology, plus other specialties such as general, paediatric and orthopaedic surgery.

KCH serves as a national urology referral centre. The top five urological conditions include benign prostate enlargement, urethral strictures, bladder cancer, paediatric urology and prostate cancer. The urology service has 20 beds and is led by Dr Charles Mabedi, who returned to Lilongwe in January 2020, after a 2-year fellowship in the UK.

The Obstetric and Gynaecology department at KCH has 4 teams, all of which provide obstetric cover but also divide into the 4 gynaecology sub-speciality areas of endometriosis, infertility, urogynaecology and gynaecological oncology.. There are 4 consultants. Because of the volume of complex deliveries referred to the hospital there has been little opportunity to develop female pelvic healthcare. The sub-speciality of urogynaecology involves both urology and gynaecology consultants working in partnership.

Charles Mabedi is the one of two Urological Surgeons in Malawi serving a population of 17 million working at Kamuzu Central Hospital. Urolink has been supporting Charles since he returned from training in the UK to develop urological services. Charles returned proficient in endoscopic surgery, which had not been widely available in SSA meaning previously men required open prostate and stone surgery, and since his return there have been visits from Urolink teams to help him develop urethral stricture surgery, PCNL (complex stone surgery) and paediatric urology. This support and mentorship will continue.

The O&G department consists of 4 consultants who plan to subspecialise into the four gynaecological subspecialties of gynaecological oncology, endometriosis, subfertility and urogynaecology. Priscilla Phiri-Mwanza is one of these gynaecologists who plans to develop female urology (urogynaecology), the first in East Africa. Ennet Chipungu is a gynaecologist working in the Freedom from Fistula Hospital, Bwaila Hospital, Lilongwe. The aim of developing this partnership is to foster relationships, train and empower these individuals to promote the care of female urology and for these medical leaders to train the Malawian doctors of the future.

Meetings

The team met with Charles, Pricilla and Ennet to assess the possibility of developing urogynaecology in Lilongwe.





Photo showing the team at KCH and visiting Freedom from Fistula Hospital

The Urolink team wish to run a series of workshops and visits to KCH to provide valuable training to the staff there. It also proposes providing the necessary equipment along with mentorship and support to the local faculty.

Project Objectives

Objective 1: Upskilling of Consultants in UI management

Objective 2: Acquire a Urodynamic machine

Objective 3: Management of complex UI

Objective 4: Trainee fellowships

Objective 1 – Upskilling of the urology and gynaecology consultants at KCH to assess and manage female incontinence.

Suzie Venn, Nikesh Thiruchelvam and Tamsin Greenwell, UK urologists will be visiting Malawi once a year with virtual contact throughout the year to develop this partnership; this has the full support of the hospital director at KCH. With virtual contact throughout the year, we plan to perform our first workshop in February 2024. This workshop will consist of lectures, assessment and diagnostics and surgical procedures in female and reconstructive urology.

Objective 2 – Acquiring a Urodynamics machine for KCH – complete but needs transporting and training of the team

There is currently no Urodynamic equipment in SSA. This is essential for the assessment of more complex incontinence. It may be possible to acquire a second-hand machine in the UK or request a donation from the Urodynamic companies. There is also a need for disposable items for the machine. We also aim to recruit a UK Medical Physicist to assist with machine selection and teaching of urodynamics.

Objective 3 – Assisting with the management of complex incontinence associated with obstetric fistulas.

<u>Freedom From Fistula</u> provides an outstanding service to women with obstetric fistulas in Malawi. They have expert local surgeons, and the treatment includes surgery to close the fistula, but also rehabilitation of these unfortunate ladies into their communities. They have identified a need to help with a small number who are incurable and may need urinary diversion or further discussion of their management. The Medical Director of the Unit will

attend the workshop to increase her skills. We aim to assist them with further training in performing urinary diversion when all more conservative treatment options have failed.

Objective 4 – Trainee Fellowships

There is a large amount of evidence of benefit to both the NHS and overseas health facilities from bi-directional visits from trainees. Exposure of UK trainees to LMIC healthcare improves the health and well-being locally, and expands the trainee's horizons. Friendships between trainees can have lasting benefits to both countries. With specific training requirements, Malawian doctors may be benefited by financial support short visits to specialist centres in the UK

Anticipated Benefits and Outcomes

The expected benefits and outcomes of this project are:

- a) At the end of the initial workshop, the Malawi surgeons should be confident in assessing and treating female urinary incontinence.
- b) A year-on-year increase in the number of female incontinence procedures performed at KCH. This will be evidenced by an audit of theatre records.
- c) Development of a local training programme to train local Urologists and gynaecologists in female Urology and Urogynaecology.
- d) Opportunities for UK trainees to visit and experience global healthcare.

Suzie Venn Consultant Urological Surgeon, UHSussex Chair Urolink May 2023