

Malawi HIV Quality Assurance Program

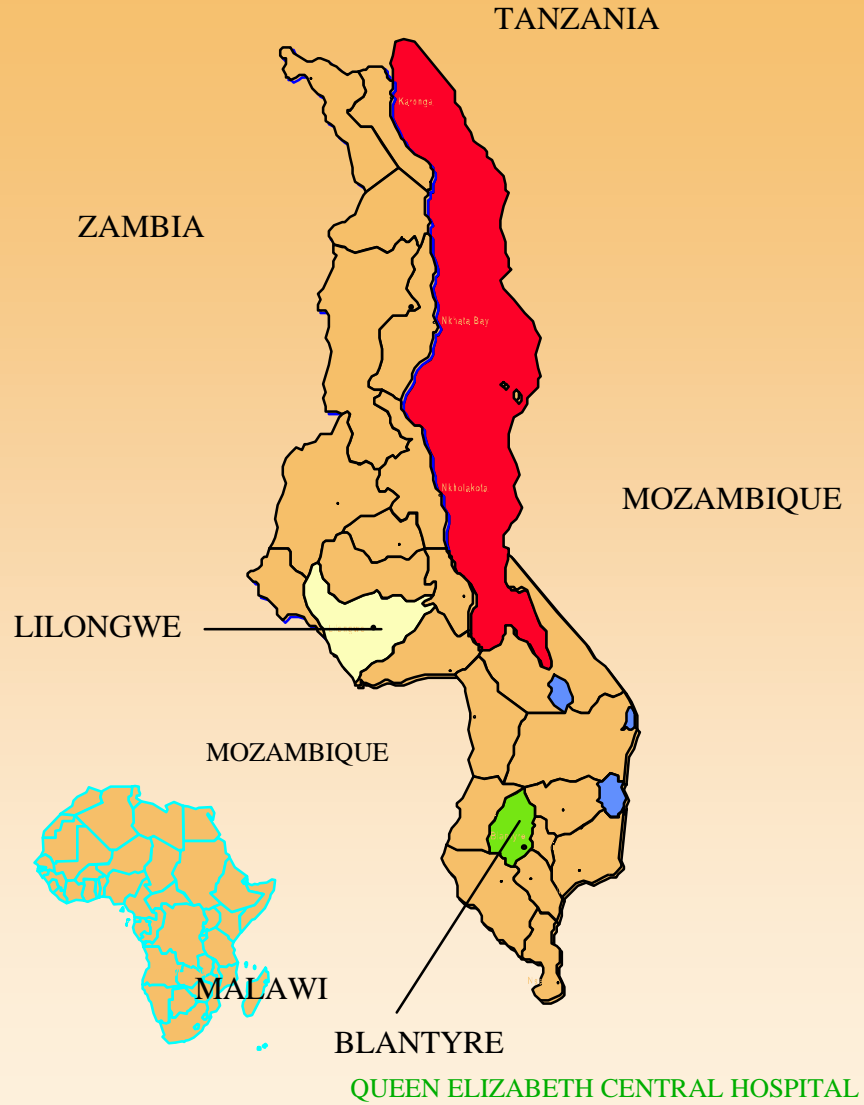
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Structure of Presentation

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Map of Malawi



Malawi Demographics

Number of Sites

Total Area: 118,484 Sq. Km.

Demography

Population: **9,800,000.**

Distribution

Rural Population: **86%**

Urban Population: **14%**

City: Blantyre

Population: **782,266**

Pop. Growth Rate: **3%**

Economy : Agriculture.

Life Expectancy: **39.3 years**

Adult HIV Prevalence: **16% estimated**

HOSPITALS

Government: **27**

Private: **28**

HIV TESTING SITES.

Total: **62**

Government: **29**

Private Hospitals: **28**

Estate Clinic: **2**

Military/Police: **2**

Project Clinic: **1**

Project Objectives

- Set up National HIV reference laboratory.
- Evaluate HIV test kits before they are introduced in the country.
- Implement quality assurance program.
- Expand quality assurance to other blood borne pathogens.

Program Description

- Collaboration between Queen Elizabeth Central Hospital, Lilongwe Central Hospital and Germany Technical Cooperation (GTZ).
- Introduction of new testing techniques
- Seven years duration

Types of samples

- Serum samples.
- Lyophilized samples.

Panel Selection and Lyophilization Procedure

1. Identify 20 pints of blood .
2. Test the sera using available HIV test kits and Western blot.
3. Inactivate the serum specimens.
4. Select a panel of 20 samples

Panel Selection and Lyophilization Procedure continued.....

5. Test the panel with available kits in the hospitals.
6. Aliquot the sera into micro vials.
7. Keep samples in deep freezer ready for lyophilizing

Panel Selection and Lyophilization Procedure continued.....

8. Assemble the lyophilizer and start lyophilizing

Information Management

- Filing
- Data entry
- Data analysis
- Data for decision making

Reporting of results

- Medical Officer
- Laboratory
- Mail
- Follow-up

How is the program sustained?

- Donor dependent
- Dependence on one laboratory technician

Past Challenges

Staff

- Ministry of Health & Population assigned a laboratory technician for 30% of his working time.

Room

- Laboratory and office space provided at Queen Elizabeth Central Hospital.

Partial funds

- Contribution to cost of quality control follow-up training.

Future Challenges

To ensure the high-quality, expansion and sustainability of national reference laboratory functions including quality assurance, it is necessary to:

- Integrate the project into the national laboratory structure
- Create dedicated positions for National HIV reference laboratory staff
- Provide recruited staff with skills, budget and powers to improve testing quality nationwide