



TanZamBo CAPACITY BUILDING FOR HIV PREVENTION RESEARCH NETWORK



Tropical Diseases Research Center in HIV Prevention Research

**TanZamBo Annual Meeting
23rd – 24th August 2012
Tanzania**

Dr Modest Mulenga - Director - TDRC



LOCATION of TDRC

6TH & 7TH FLOORS of NDOLA CENTRAL
HOSPITAL

Broadway Road

PO BOX 71769 NDOLA, ZAMBIA

Fax/phone: 26 02 620737

Email: tdrc@tdrc.org.zm

tdrc@zamtel.zm

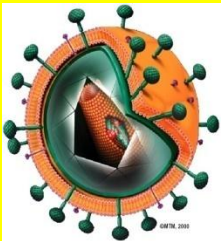


BACKGROUND

- Established in 1975 by the World Health Assembly under UN resolution 27.52
- This resolution recognized the need for research in member states in order to control major tropical diseases
- The initiative was to be funded and coordinated by UNDP/WB/WHO Special Programme for Research and Training in Tropical Diseases
- Thus TDRC became one of 3 regional Centres for research in Tropical Diseases. TDRC was meant for the African region. Others were set up in Thailand and Brazil

- In 1981 TDRC became a national research institute by an Act of Parliament and was named The Tropical Diseases Research Centre
- Since then Government of Zambia has been funding the Centre mainly for its operations while funds for research have been coming from external sources such the WHO/(TDR), USAID, EDCTP, CDC, NIH, World Population Council, IAEA, Sight and Life, CIDA, SIDA, DANIDA, Global Fund, Boston University, Duke University, Institute of Tropical Medicine (ITM), Pfizer, e.t.c

The Era of Human Immunodeficiency Virus



In the mid 1980s HIV was identified as a emerging health problem and by 1990 the epidemic had become a major health crisis. TB has a serious problem accompanying HIV infection

Enormous public health consequences have resulted from an interaction between HIV and TB, and now *P. falciparum* malaria has been added to this picture.



GOAL, VISION, OBJECTIVES

Goal:

To conduct research in diseases of public health importance and related conditions in Zambia and the region in order to contribute to their prevention and control.

Vision:

To be a ***Center of Excellence*** in the promotion of health in Zambia and the region through research

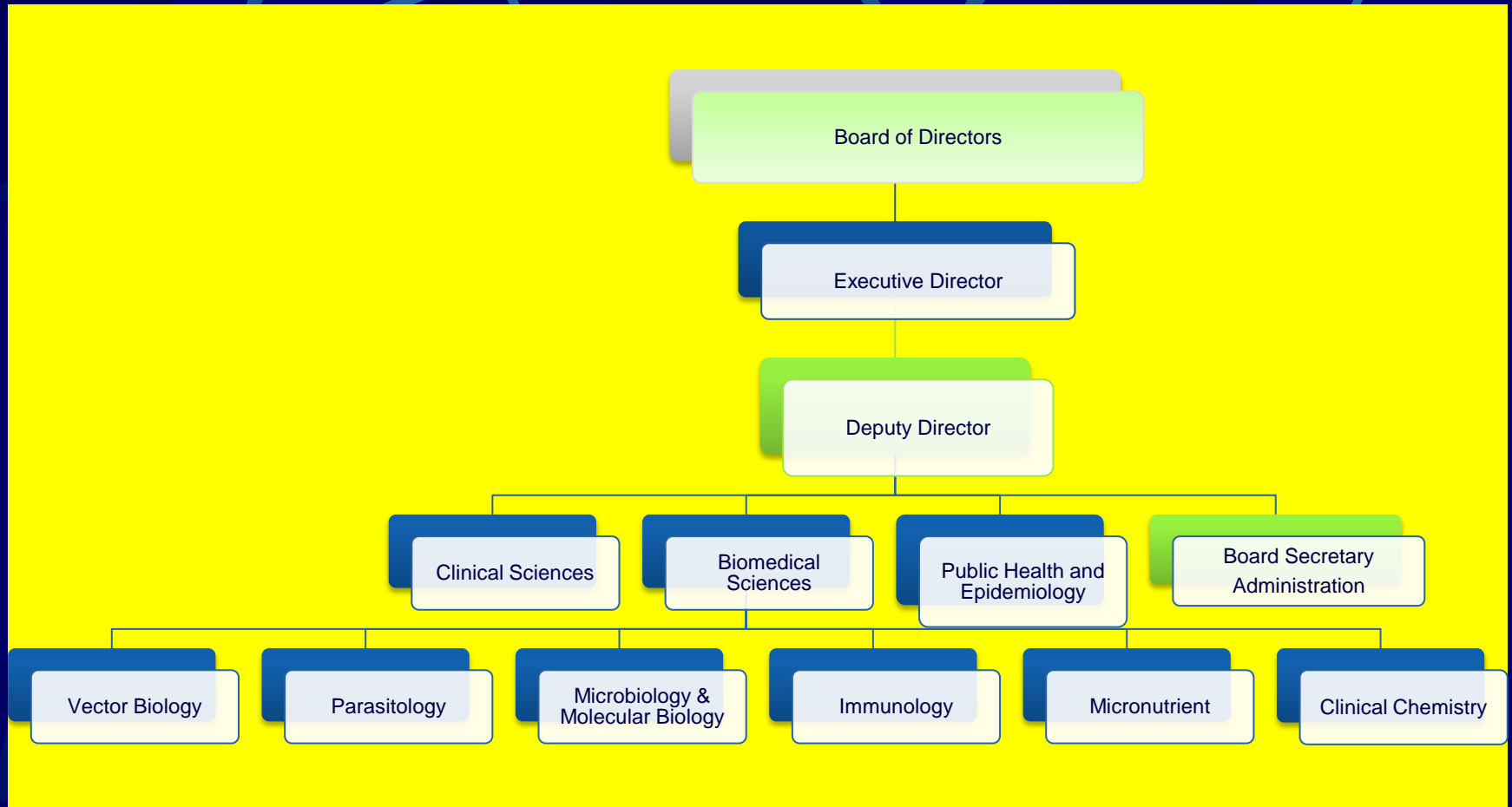
MISSION STATEMENT

To contribute to the social-economic development of Zambia through targeted research and product development, leading to effective prevention and control of diseases

OBJECTIVES:

- To conduct research in diseases of public health importance in Zambia and the region in line with defined priorities of the Ministry of Health
- To develop and evaluate tools, technologies and strategies for the prevention and control of diseases and related conditions.
- To collect and disseminate scientific information including the publication of scientific reports, journals and other such documents and literature relating to the work of the Center.
- To serve as an international research and training center in African

Tropical Diseases Research Centre Organizational Chart



TYPES OF RESEARCH

- DRUG AND VACCINE SAFETY & EFFICACY STUDIES
- EPIDEMIOLOGICAL STUDIES
- OPERATIONAL AND HEALTH SYSTEMS RESEARCH
- BEHAVIOURAL STUDIES
- BIOMEDICAL BASIC SCIENCES
- OTHER SCIENTIFIC ACTIVITIES

DRUG SAFETY & EFFICACY STUDIES

- **ANTI-MALARIAL DRUGS:**

Develop new ways of utilizing existing and new drugs, and technologies in malaria prevention and control

- **ANTI-HIV THERAPY:**

- Test new drugs in adults and children to delay onset of HIV/AIDS and prevent infection

- HERBAL MEDICATIONS

Identify and evaluate the efficacy of herbal medicines used in the treatment of malaria, HIV and opportunistic infections

- HIV/MALARIA COINFECTION

Study of malaria as a disease in HIV infection (implications for treatment)

- HIV/SCHISTOSOMIASIS COINFEECTION

Study interactions and treatment outcomes

- NEGLECTED DISESAES such as
Trypanosomiasis Bringing back into focus

BEHAVIOURAL SCIENCES

- Multiple Concurrent Partnerships and related factors driving the HIV infection in Zambia
- Transactional sex as a factor in HIV transmission
- Factors associated with ART compliance (Retention and Adherence)

EPIDEMIOLOGICAL STUDIES

- Supervise ANC Sentinel Surveillance of HIV infection in the Northern part of the country
- Study Risk factors for HIV spread eg in MARPs
- National Demographic Health Surveys which includes HIV
- We plan to develop a detailed register of people on ART in the study areas looking a patterns of discordance in couples

Research Approval and Regulatory Process

Scientific and
Technical
Committee

- **Comprising senior scientists**
- **Scrutinizes scientific relevance and rigor of research proposals**

Independent
Ethics Review
Committee

- **Comprising various members coming from outside TDRC (Review ethical**
- **Reviews proposals from TDRC and other institutions recognized by TDRC**

Pharmaceutical
Regulatory
Authority

- **A Ministry of Health Statutory Board to regulates drug use in the country**
- **Approves importation of study products and Approves trials on new products or new indication of existing ones.**
- **Receives progress reports of Serious Adverse events on ongoing clinical trials**

Ministry of Health
(NEC)

- **Gives final Approval after being satisfied with prior approvals**
- **National Ethics Committee (NEC)**



Research facilities at TDRC

- Until 10 years ago, the TDRC had over 200 workers, it has been reduced to 96 core staff. The rest are hired depending on the size of the research programme.
- The Laboratories at TDRC are reference for the Northern Regional of Zambia including Parasitology, Immunology, Haematology, Clinical Chemistry, Nutrition, Molecular Biology and Vector biology.
- A new reference TB laboratory with modern equipment has just been built with funds by the CDC. A new malaria laboratory is being constructed with funds from the Global Fund.
- There is an outpatient clinic and an admission ward comprising 30 beds for clinical trials
- There is a new Local Area Network and a wireless network funded by the CDC.
- We have now received funds to start developing a new site outside Ndola Central Hospital



INTERNATIONAL AND LOCAL LINKS

WHO, SIDA, Institute of Tropical Medicine (Belgium), Center for International Health at the Boston University School of Public Health, Botswana Harvard AIDS institute, EDCTP, MMV, African Malaria Network Trust, Sight and Life, LSTMH, IAEA, KCMC, Family Health International, National Malaria Control Center, UTH-virology lab, CSO, All Provincial Health Directorates (especially the Northern part of Zambia)



Hosting of Meetings

- Project Initiation Meeting in Lusaka, Zambia from 16 -17th June 2011, opened by the PS-MOH
- Meeting attended by the three African Participating countries (TANZAMBO), MacGill University of Canada and Harvard University of the USA



Graduate Training

- One TDRC scientist is on a 2-years MSc degree course at Kilimanjaro University. Commenced in Sept. 2011

Short Term Training

- Four scientists trained in GCP standards of the International Conference on Harmonization, and standards for Good GCLP at BHP in 2011.
- One scientist trained in M&E for HIV/AIDS programs in Pretoria in March 2012
- Three scientists were trained on testing for HDR next week at BHP
- TDRC had one facilitator on this HDR training Workshop
- We had four scientists who participated in the Biostatistics course at BHP

Mediating HIV Prevention Research: June 20-21, 2012 - Johannesburg, South Africa

- A workshop organized by the organizations below for the media personnel – Role of the media in HIV prevention. Attended by Dr Handema



- **Current workshop on Ethics attended by our Ethics Committee members. Dr Ngulube and Mr Njunju**

• **Developmental Activities**

TDRC is striving to establish a Centre in a new location. Some construction work has started.

A New Reference Laboratory for TB is in operation

A new Reference Laboratory for Parasitology is under construction

Participate in competitive grant applications for capacity strengthening in order to create a critical mass of young scientists

Opportunities

- The TDRC is stable environment and has potential of attracting additional funding for research from other agencies, e.g., EDCTP, WHO, MIM-TDR, MMV, Pharmaceutical industry e.g. Pfizer Inc., CDC, EU, Global Fund for malaria HIV/AIDS and TB etc.
- Continued Collaboration with higher learning institutions
- A number of young scientists have joined the institution forming a pool of scientists awaiting post-graduate training.
- As an established research institution, TDRC stands in a better competitive position to respond to the growing demand for African research institutions to carry out clinical trials of the highest GCP/GLP standard.
- Situated in a region that has a large study populations for targeted health problems



Staff and Infrastructure



The background is a solid dark blue. It features several large, overlapping triangles in a slightly lighter shade of blue. Overlaid on these triangles are numerous thin, light blue lines that crisscross the entire frame in various directions, creating a complex geometric pattern.

**Thank You for Your Time
and Attention**