


# CURRICULUM VITAE

	<b>1. PERSONAL INFORMATION</b>	
	NAME:	Prof. Michael Muita Gicheru
	DATE OF BIRTH:	26 <sup>th</sup> August 1960
	MARITAL STATUS:	Married
	ADDRESS:	Department of Zoological Sciences
		Kenyatta University
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LANGUAGES: English, Kiswahili and Kikuyu

NATIONALITY: Kenyan

SEX: Male

PLACE OF BIRTH: Murang'a

## 2. ACADEMIC QUALIFICATION

### a) UNIVERSITY EDUCATION

- |            |  |
|------------|--|
| 1984 -1988 | Bachelor of Veterinary Medicine (BVM) - <b>University of Nairobi</b>   |
| 1989-1990  | Master of Veterinary Public health/ Immunology- <b>University of Nairobi</b><br><b>Thesis entitled</b> "A partial comparative study of physical characteristics of thermostable antigens of hydatid cyst fluid (intermediate stage of of <i>Echinococcus granulosus</i> ) and fluid from cyst of <i>Taenia hydatigena</i> ( <i>cysticercus tenuicollis</i> )". |

1999-2002                      Doctor of philosophy (PhD) - Immunology - **Kenyatta University**,  
entitled “Vervet monkey model for Leishmaniasis: Characterization,  
protective immunity and Vaccination against *Leishmania major*  
infection”.

**b) PROFESSIONAL COURSES**

- i. Ethical and Responsible conduct of Research, Training Workshop, Kenyatta university, **27<sup>th</sup> to 28<sup>th</sup> March 2014**
- ii. Health Sciences Center, Financial conflict of interest training (HSC104-002) for Non - **University of New Mexico, USA** investigators only, **16<sup>th</sup> October 2013**
- iii. Regional Workshop on immunobiology of Major tropical parasitic Diseases held at Institute of Primate Research. **March 7-18, 2011**
- iv. Next generation sequencing at applied Biosystems- part of Life Technologies, **ILRI 1<sup>st</sup> November 2011**
- v. Basic security in the field- staff safety, health and welfare, **United Nations, Department of safety and security, , June 2008**
- vi. Advanced security in the field. **United nations Department of safety and security July 2008**
- vii. Formulation of standards for Undergraduate Animal health and Veterinary related courses, a workshop organized by Kenya Veterinary board Technical committee on veterinary Education Quality Assurance, KCB Training College Karen Nairobi, **4-5<sup>th</sup> November 2010**
- viii. International Training workshop on Ethical considerations and Biomedical use of Non human primates for Research in Tropical diseases. Institute of Primate Research, National museums of Kenya. **18<sup>th</sup>-27<sup>th</sup> June 2007**
- ix. The Africa programme for health Innovation-APHE-East Africa Regional Workshop, 18<sup>th</sup>-20<sup>th</sup> May 2005. .The National Institute of Medical Research: NIMR, Dar es salaam, Tanzania **18<sup>th</sup>-20<sup>th</sup> May 2005**
- x. Fourth Workshop on South-South Collaboration and Application of Molecular Biology Techniques In Tropical Diseases. **Accra (Ghana) 17-21<sup>st</sup> august 2004**
- xi. Primate in research: health monitoring and legal aspect, National museums of Kenya, **Nairobi , Kenya. 11<sup>th</sup> April 2002.**
- xii. Advanced course in immunology , Vaccinology and Biotechnology. **13 September-27 October, 2001** Lausanne, Switzerland.- **World Health Organization- Tropical disease research programme**
- xiii. World Health Organization- Tropical disease research programme, Good Laboratory practice (GLP) Training of Trainers Workshop. **23-27 April 2001**, Panafric hotel, Nairobi, Kenya

- xiv. Professional Skills for Scientist. Preconference workshop of the 5<sup>th</sup> society of Neuroscientist of Africa, **International conference, Nairobi, Kenya, 21-22 April 2001**
- xv. Course in Tropical Insect Ecology ,organized between Swedish agricultural university, Kenyatta University and **ICIFE, 23 January-11Feb. 1999**
- xvi. An International ICRO/UNESCO Training Course on the Biochemistry of Parasitic Protozoa. Department of Biochemistry, University of Nairobi. **10<sup>th</sup>-26<sup>th</sup> August 1992**

### **3. FELLOWSHIPS AND SCHOLARSHIPS**

- i. Vanderbilt University, **USA**  
Research Fellow, Tissue culture techniques as applied in HIV research 1996
- ii. Duke University, **USA**  
Research fellow, Immunology of Retroviruses, 1997
- iii. University of Pennsylvania, School of veterinary medicine, 1999-2000 **USA, Visiting** Research Fellow, Immunology of Leishmaniasis
- iv.
- v. WHO/TDR PhD scholarship, scholarship for my PhD training 1998
- vi. **Supervision of John Khamala Ong'onda I56/CE/5717/2003**  
A study on determination of existence, distribution of stromal derived Factor-1 in Kenya population. **The grant was awarded by Association of African Universities, HIV/ AIDS project. Small grant for students Research Project, Accra- North Ghana.** This is a small grant for student awarded to my student Mr. John Khamala Ngonda with my support in **April 2007. The amount awarded is 1000 US\$**
- vii. **Supervision of Joel O. Khobondo I56/10999/2004**  
To evaluate the utility of HIV IgA ELISA in diagnosis and assessment of progression of HIV/AIDS in children less than 18 months. **The grant was awarded by Association of African Universities, HIV/ AIDS project. Small grant for students Research Project, Accra- North Ghana.** This is a small grant for student awarded to my student Mr Khobondo Joel Onyanyango with my support in **April 2007. The amount awarded is 1000 US\$**

### **4. EMPLOYMENT HISTORY/ WORK EXPERIENCE**

#### **4.1 Employment History**

**Current position: Chairman** Department of Zoological sciences-2012 to Date

**Chairman** Department of Zoological sciences-2010- 2012

**Senior Lecturer** (Immunology and veterinary Public health) in the Department of Zoological Sciences, Kenyatta University, **2007 to date**

### **Previous positions**

- i. **Acting Chairman** Department of zoological sciences- **Dec 2009 to Feb 2010,**
- ii. Zoological sciences **Departmental examination Coordinator** 2007-2010
- iii. Biological sciences **Departmental Timetabler** 2005- 2007
- iv. **Lecturer** In the department of Zoological sciences Kenyatta university, 2005-2007-
- v. **Part time lecturer** Department of Zoological sciences, Kenyatta university, **2001-2005-**
- vi. **Senior Research Scientist**, Institute of Primate Research (IPR), National Museums of Kenya, 2002- 2005
- vii. Research scientist **IPR**, National museums of Kenya 1991-2002
- viii. **Research scientist** Kenya trypanosomiasis Research Institute( KETRI), 1990-1991

## **4.2 Work Experience**

### **4.2.1 Teaching Experience**

#### **a) Undergraduate courses**

- i. Fundamental Immunology- Dept Zoological sciences
- ii. Advanced Immunology- Dept Zoological sciences
- iii. Applied immunology- Dept Zoological sciences
- iv. Immunology I- Dept of Nursing sciences, KU
- v. Immunology II- **Dept of Nursing sciences, KU**
- vi. Immunology - **Dept of nursing Sciences, KU**
- vii. Experimental animal science- **Department of Biochemistry and Biotechnology, KU**

#### **b) Post graduate courses**

- i. Reproductive Immunology- Dept of Zoological sciences
- ii. Clinical Immunology- Dept of Zoological sciences
- iii. Immunochemical techniques- Dept of Zoological sciences
- iv. Immunohaematology- Dept of Zoological sciences
- v. Cellular Immunology- Dept of Zoological sciences
- vi. Immunochemistry- Dept of Zoological sciences
- vii. Immunology of parasitic and infectious diseases- Dept of Zoological sciences

### **Parttime Teaching**

Mount Kenya University

2010- Laboratory animal science- **Department of pharmacy**

### **4.2.3 Research Experience**

- i. **1992-2002.** World Health Organization (WHO)/ Tropical Disease Research Programme. Supported Research- Immunology of parasitic diseases especially the protective mechanisms involved in leishmaniasis and Malaria (**Research publications indicated**)
- ii. Immunology of retroviruses with biases of Simian immunodeficiency virus (SIV) in their natural host (African Green monkeys). (**Research publications indicated**)
- iii. **1996-2014** Project aimed at understanding HIV diversity in different geographical communities of Kenya and understanding host and virus related factors associated with HIV susceptibility and transmission (**Research publications indicated**)
- iv. **2007-2012** Food security and human health (**Research publications indicated**)
- v. **2012- date:** Tungiasis and HIV (**Research publications indicated**)

### **5. ADMINISTRATIVE RESPONSIBILITIES**

- i. **Chairman** Department of Zoological sciences, **KU**- Oct 2012 to date
- ii. **Chairman** Department of Zoological sciences, **KU**- Oct 2010 to Oct 2012
- iii. **Ag Dean SPAS** **January 2011**
- iv. **Examination coordinator**, Dept of zoological sciences, **KU**, 2007-2010
- v. **Departmental time tabler**, Dept of Biological sciences, **KU** 2005-2006
- vi. **Ag Director Institute of primate research** **May 2003 to December 2003**
- vii. **Chairman**, Kenyatta University Animal Care and Use Committee- **April 2008 to date**,
- viii. **Member** , Kenyatta University Farm Technical Committee **2013 to date**
- ix. Member, School of Pure and Applied Sciences committee on grants and scholarship, **2006-2010**
- x. **Member, Kenyatta University Institute of Research Review Board, 2013 to date**
- xi. **Secretary**, Animal Care and Use Committee (ACUC), Institute of Primate Research, **2002-2005**.
- xii. Secretary to Institutional Scientific Ethical Review Committee (ISERC), Institute of Primate Research **2002 -2005**

- xiii. **Chairman** Editorial committee IPR Biennial Report, Institute of Primate Research
- xiv. Head of Leishmania program, Institute of Primate Research, **1977 -2005**

## 6. POST GRADUATE SUPERVISION

### i. Completed Ph .D supervision

S/No	Name/R eg. No	Supervisors	Year of graduation	Degree	Thesis Title
1	Mutiso J. Muli	<b>Prof MichaelGicheru</b> Dr EvansTaracha	2013	<b>PhD Immunology</b>	Evaluation of crude Leishamia donovani antigen Co-administered with TH1 adjuvants as potential vaccine for leishmaniasis in vervet monkey model
2	Wilfred E Injera	<b>Prof Michael Gicheru</b> Prof. Ephantus Kabiru Dr John I Githure	2013	<b>Ph D Immunology</b>	Characterization of anti-mosquito immune responses in BALB/c mice immunized with plasmid containing anopheles gambiae mucin 1( AgMUC1) gene

### ii. Completed MSC supervision

S/No	Name/R eg. No	Supervisors	Year of graduation	Degree	Thesis Title
1	Mohamed M. Dakane 156/913 3/2000	<b>Prof. M. M. Gicheru,</b> Prof. D.A Maalim	2007	Master of Public Health and Epidemiology	Utilization of Health Services by settled and Nomadic Groups in Wajir District Kenya
2	Teresia Nyawira Kiananu	<b>Prof. M.M Gicheru,</b> Dr. Z. Ng'ang'a, Dr. H. Ozwara.	2007	MSc Immunology	Charaterization of immuniological responses of Baboons Infected with <u>Plasmodium Knowlesi</u>
3	Munyao James Muli E54/738 9/2002	<b>Prof. M. M. Gicheru,</b> Prof. A. Ng'anga, Dr. H. Ozwara	2008	MSc Immunology	Transfection and Characterization of Plasmodium Knowlesi Malaria Parasites Genetically modified to Express Host Interferon Gamma (IFN - $\gamma$ ) in Baboon (P

4	Teresia Njeri Maina 156/571 9/2003	<b>Prof. M. M. Gicheru,</b> Prof. Z. Ng'ang'a	2008	MSc Immunology	Performance of Dynabled Technique Compared to Facs Techniques in Enumeration of CD4+ T Cells in HIV Positive Patients attending Mbagathi Hospital, Nairobi.
5	Nyaribo Alex Tinega 156/CE/ 10145/2 004	<b>Prof. M. M. Gicheru,</b> Dr. S. Graham, Dr. R. Pelle	2008	MSc Immunology	Evaluation of Immune Responses of Recombinant Theileria Parva 2 Antigen Fused with a cell penetrating Peptide from Human Immunodeficiency Virus -1
6	Benadine M. Bukachi 156/108 95/2004	<b>Prof. M. M. Gicheru,</b> Prof. Z. Ng'anga, Dr. S.Khamadi	2008	MSc Immunology	Determination of the Existence and Distribution of CCR5-A-32 Mutation on HIV - 1 Chemokine Co- Receptor 5 (CCR5) in a Sampled Population from Kenya
7	Johnson Gitahi	<b>Prof. M.M. Gicheru,</b> Dr. Jackson Ombui	2008	MSc Immunology	Detection of <i>Bacillus Cereus</i> enterotoxin genes in food by multiplex polymerase chain reaction.
8	Domitila Wangui Kimani 156/572 9/2003	<b>Prof. M. M. Gicheru,</b> Prof.Z. Ng'anga, Dr. S. Khamadi	2008	MSc Immunology	Identification of Potential Epitopes for the Design of HIV - I Vaccine in Kenya
9	Jane Nyambura Mugwe 156/ICE/ 101444/ 2004	<b>Prof. M.M. Gicheru,</b> Prof. Z. Ng'ang'a	2009	MSc Immunology	The effects of Antiretroviral Drugs on CD4 cells and Viral Load in HIV Positive Patients attending Nakuru General Hospital, Kenya.
10	Mutiso Joshua Muli 156/108 91/2004	<b>Prof. M. M. Gicheru,</b> Dr. Thomas Kariuki	2009	MSc Immunology	Evaluation of Bacille Casmette Guerin, Montanide Isa 720 and Aluminium Hydroxide as Adjuvants for Leishmania Vaccine in Balb/C Mice.
11	Ng'ong'a Gabriel Otieno 156/101 43/2004	<b>Prof. M. M. Gicheru,</b> Dr. M Oduor, Dr. J. Vulule	2009	MSc Immunology	Effects of ABO/Rhesus Blood Group Phenotypes on Immunosurveillance to <i>Plasmodium Falciparum</i> Malaria in Children in Kisumu Town, Kenya
12	Mustafa Barasa 156/109 86/2004	<b>Prof. M. M. Gicheru,</b> Dr. H.Ozwara	2009	MSc Immunology	Characterization of Placental Malaria in Olive Baboons ( <i>Papio Anubis</i> ) Infected with <i>Plasmodium Knowlesi</i> H strain.
13	Ngugi Michael Kahato 156/134 92/2005	<b>Prof. M. M. Gicheru,</b> Prof. E. Kokwaro	2009	MSc Medical Entomology	Effects of Cow dung and selected Medicinal Plants on <i>Anopheles</i> Species as a strategy for Malaria Vector Control in Ahero Rice Irrigation Scheme, Kenya

14	Kimutai Albert I56/124 15/2004	<b>Prof. M. M. Gicheru,</b> Dr. W.K Tonui	2009	MSc Immuniol ogy	Evaluation of the Adjuvancity of Artemisinin with soluble Leishmania Major Antigens in Balb/ C Mice.
15	John Khamala Ong'ond a I56/CE/ 5717/20 03	<b>Prof. M. M. Gicheru,</b> Dr. S. Khamadi	2009	MSc Immuniol ogy	The distribution of Stromal derived factor - 1 mutation in Kenyan Population
16	Teresia Wambui Ngonjo I56/130 43/2005	<b>Prof. M. M. Gicheru,</b> Dr. C. Mwandawiro	2009	MSc Applid Parasitol ogy	Impact and factor associated with gastro-Intestinal parasitic infections among pupils in Thika District, Kenya.
17	Patrick Simiyu Were I56/109 0/2004	<b>Prof. M. M. Gicheru,</b> Dr. Hasting Ozwara	2009	MSc Applied parasitol ogy	Evaluation of selected Medicinal plants for Chemotherapeutic activities on Plasmodium Knowlesi and Plasmodium Berghei.
18	Ngari Pauline Kathugu I57/025 4/2003	<b>Prof. M. M. Gicheru,</b> Dr. Lucy Kamau	2009	Master of Public Health and Epidemiol ogy	Factors associated with water borne diseases among pupils in Kiganjo Location Nyeri District, Kenya.
19	Kagendo J. Francis I57/025 4/2003	<b>Prof. M. M. Gicheru,</b> Prof. E. Kabiru	2009	Master of Public Health and Epidemiol ogy	The role of traditional birth attendant's training in prevention of mother to child HIV transmission" programme in Tharaka District, Kenya.
20	Benuel Nyagaka I56/130 47/2005	<b>Prof. M. M. Gicheru,</b> Prof. Z. Ng'anga	2010	MSc Immunol ogy	Genetic diversity of HIV-I based on Gag region among Antenatal clinic attendees in North-Rift Valley, Kenya.
21	Mutua Patrick Mbuvi I56/CE/ 10986/2 006	<b>Prof. M. M. Gicheru,</b> Dr. Stephen G. Kiama	2010	MSc Immunol ogy	Comparative In Vitro Study of quantitative and qualitative characteristics of free surface Respiratory Macrophages in the Duck and the Rabbit
22	Bosire Erick Maosa I56/106 30/2006	<b>Prof. M. M. Gicheru,</b> Samoel Khamadi	2010	MSc Immunol ogy	Establishment of reference ranges of CD3, CD4 and CD8 Lymphocyte subsets among Healthy Kenyans
23	Nyamwamu Lydia Bonareri I56/124	<b>Prof. M. M. Gicheru,</b> R. Sharma	2010	MSc Immunol ogy	Evaluation of Immunochromatographic strip test for rapid diagnosis of Antenatal Women Syphilis in Eldoret, Kenya



	16/2004				
24	Annah Hoka Indetie I56/573 3/2003	<b>Prof. M. M. Gicheru,</b> Prof. Z. Ng'anga	2010	MSc Immunology	Milk progesterone levels as indicators of reproductive deficiencies among dairy cows at Kari and Manera farms in Nakuru District, Kenya.
25	Isaiah Otieno Obara I56/106 29/2006	<b>Prof. M. M. Gicheru,</b> Dr. Morris Agaba, Prof. Stephen Kemp.	2010	MSc Immunology	Association between Genotypes at Polymorphisms in the Trypanotolerance candidate gene, Arhgap 15 and the Pathophysiology of Trypanosomiasis associated anaemia.
26	Mwia Agatha Nzou I57/772 5/2002	<b>Prof. M. M. Gicheru,</b> Dr. J.A Simbauni	2010	Master of Public Health and Epidemiology	Demographic characteristics and effects of II-health of employees in Public and Private Sectors: A case of Post bank and Unilever Kenya Limited.
27	Jonathan N. Mwangi I57/657 8/2003	<b>Prof. M. M. Gicheru,</b> Prof. E. W. Kabiru	2010	Master of Public Health	Factors influencing prevention of Mother to Child HIV transmission program in Nakuru District, Kenya
28	Muthini Victor Sumbi I57/OL/1014/2004	<b>Prof. M. M. Gicheru</b> Dr. Joyce Mwaniki	2010	Master of Public Health	Assessment of factor influencing adherence to Antiretroviral therapy at Nyeri Provincial Hospital in Central Kenya.
29	Joseph W. Muita I56/752 9/2002	<b>Prof. M. M. Gicheru,</b> Dr. Evan Mathenge, Dr. Kiambo Njagi	2010	MSc Applied parasitology	Evaluation of Laboratory diagnosis of malaria of government Health facilities in selected epidemic prone District in Northern and Southern Rift Valley Kenya.
30	Ndombi E. Makuto I56/108 92/2004	<b>Prof. M. M. Gicheru,</b> Dr. Pauline Mwinzi	2011	MSc Immunology	Cytokine (IL-5, IL-10, IL-13 AND IFN- $\gamma$ ) Profiles of School Children infected by Schistosoma Mansoni upon multiple treatments with Praziquantel.
31	Florence Wanjiru Gitahi I57/111 33/2004	<b>Prof. M. M. Gicheru,</b> Dr. Wilson A. P Otengah	2011	Master of Public Health	HIV and AIDS knowledge, attitude, practice and its effects on performance of ministry of livestock development staff in Nairobi Kenya.
32	Adungo Fedinand Onyaka sit I56/106	<b>Prof. M. M. Gicheru,</b> Dr. Samoel A. Khamadi	2011	MSc Immunology	Genotyping of Human Immunodeficiency Virus Type - 1 in relation to antiretroviral drug resistance in Western Province, Kenya.

	03/2006				
33	Joel O. Khobondo 156/10999/2004	<b>Prof. M. M. Gicheru,</b> Dr. Khamadi	2011	MSc Immunology	Prevalence of Pediatric HIV and AIDS in Nairobi and its Implications for Prevention of Mother to Child Transmission
34	Martin J Muriuki 156/11255/2004	<b>Prof. M. M. Gicheru,</b> Dr. Khamadi	2011	MSc Immunology	HIV -1 Subtypes and Coreceptor usage in population from Northern Kenya.
35	Namu J. samuel	<b>Prof M.M. Gicheru</b> Prof.Zipporah nganga	2011	MSC Immunology	The antiretroviral drugs toxicity and immune status of HIV patients attending Runyenjes comprehensive care centre, Embu, Kenya
36	Muriuki B, Mukami	<b>Prof. M. M. Gicheru,</b> Dr. Khamadi	2012	MSC Immunology	Prevalence of hepatitis B and C viral co-infection among HIV-1 infected persons in Nairobi, Kenya
37	Irene W. Mutheca	<b>Prof. M. M. Gicheru,</b> Dr. Khamadi	2012	MSC Immunology	Genetic polymorphism of interleukin-1 receptor antagonist (IL1 RA) gene among HIV infected and Non-Infected individuals in Nairobi
38	Kanyi Henry Muriuki	<b>Prof. M. M. Gicheru,</b> Dr. Jane wanyiri	2012	MSC Immunology	Immune responses to cryptosporidium species in HIV/AIDS infected adults attending Kenyatta national Hospital, Nairobi, Kenya
39	Peter N. Ondari	<b>Prof Michael Gicheru</b> Prof. Zipporah Nganga	2012	MPHE	Assessment of Knowledge on factors contributing to highland malaria outbreak in Gucha District and available preventive and control measures Food safety knowledge and practices among actors in beef chain with reference to Rift Valley fever outbreak in maragua District, Kenya
40	Peter M. kioko	<b>Prof Gicheru M.M.</b> Dr Kitala	2012	MPH	Evaluation of malaria transmission intensity using antibody responses to <i>Plasmodium falciparum</i> merozoite surface protein-119 after vector control in Western Kenya
41	Shehu S. Awandu	<b>Prof M.M. Gicheru,</b> Dr Simon Kariuki	2012	MSC Immunology	Seasonal variation in infections of Anopheles Gambiae Mosquitoes with plasmodium oocysts and its effect on Highland malaria in Kisii Town and its surroundings
42	Orucho v. Obino	Dr Lucy kamau <b>Prof. M.M.Gicheru</b>	2013	MSC Applied Parasitology	Utilization of knowledge on prevention of mother to child transmission of HIV among pregnant women attending selected health facilities in Embu District
43	Simon K. Kiura	Dr Okello Agina <b>Prof Gicheru M.M.</b>	2013	MPH	Impact of child malnutrition on IgG antibody response to <i>Plasmodium Falciparum</i> infections at Ishiara Hospital
44	Mungiria J. Nthinga	<b>Prof Gicheru M.M.</b> Dr David Mburu Dr mburugu M. P	2014	MSC Immunology	

					Embu Country, Kenya
45	Joycelyne Ndinda Muinde	<b>Prof Gicheru M.M.</b> Dr Hezron Wesonga	2014	<b>MSC Immunology</b>	Efficacy of convectional and modified contagious bovine pleuropneumonia T <sub>1</sub> 44 vaccines sixteen months post vaccination
46	Samuel G. kiige	<b>Prof . Gicheru M. M.</b> Dr. Dr Anjili C	2014	<b>MSC Immunology</b>	Disease Progression and immune response in F <sub>1</sub> cross-breed between BALB/c and Swiss albino mice infected with <i>Leishmania major</i>

**iii. Ongoing Supervision**

- a) John Mathenge- reg no. PhD
- b) Benedict Mwenji reg No I84/15149/2004.- PD
- c) Rose munene reg no I84/25375/2011. - PhD
- d) Jane mugwe Reg no. PhD
- e) Elizabeth Ambani Reg no. p97/11066/08- PhD.
- f) Elephas munene Reg No. I56/CE/11326/2004 - MSC
- g) Muloro reg no I56/22804/2011- MSC
- h) Kipsang Bett MSC
- i) Mwangi Jamleck Ndungu reg no I56/Ce/10952/2006- MSc
- j) Omoyundo Mulati reg no. P150/20960/2010- MSC
- k) Jane Karegi reg no. I56/12271/2009-- MSc
- l) Paul Ndungu Reg no. I56/CE/14166/2009- MSc
- m) Njuguna Jeniffer Reg no. I56/CE/21212/2010
- n) Dinah kwamboka reg no. I 56/ CE/ 11988/2007- MSC
- o) Rachel mwangi mbaire Reg no. I56/CE/1170/2007
- p) Peter Leposo MSc Reg no. I56/10623/06- MSc
- q) Otieno Domic Odula Reg. I56/ CE/11508/2008 -MSc
- r) Chris Mbae Reg no. I56/CE/12418/2004- MSc
- s) Lutere Lucy Mwari Reg no. I56/CE/22008/2010 t) Njuki Justin reg no. I56/Ce/14159/09- MSc
- u) Miriam L. okiyo Reg no. I56/11500/04- MSc
- v) Rose Chemtai Ngetich reg no. I56/14155/09- MSc

## **7 CONFERENCES/SEMINARS/ WORKSHOPS**

### **a) Participation in Workshops/ conferences**

- i. **Michael Gicheru**, Epidemiological aspects of HIV/AIDS. **Kenyatta University, 3<sup>rd</sup> August, 2006.** HIV and AIDS Awareness Workshop
- ii. **Michael M. Gicheru**, Overview of HIV and AIDS. HIV and AIDS mainstreaming workshop. **4<sup>th</sup> April, 2007** Utalii Hotel, Nairobi. School of Pure and applied Sciences, Kenyatta University.
- iii. **Michael M. Gicheru**. HIV and AIDS pandemic. Workshop for mainstreaming of HIV/AIDS in the faculty of Science Programmes. **Jomo Kenyatta university of of Agriculture and technology 24<sup>th</sup> April 2007**

- iv. **Michael M. Gicheru Overview of HIV and AIDS.** Workshop for mainstreaming of HIV/AIDS in the faculty of Engineering. **Jomo Kenyatta university of Agriculture and technology 26<sup>th</sup> April 2007**
- v. **Michael Gicheru.** Mainstreaming of HIV and AIDS in University curriculum. School of Pure and Applied Sciences, Kenyatta university, One day workshop **17<sup>th</sup> November 2007 AVU hall Kenyatta university**
- vi. **Michael Gicheru.** Teaching of Animal Health in Kenyatta university. Formulation of standards for Undergraduate Animal health and Veterinary related courses, a workshop organized by Kenya Veterinary board Technical committee on veterinary Education Quality Assurance, KCB Training College Karen Nairobi, **4-5<sup>th</sup> November 2010**
- vii. **Michael Gicheru.** Immunobiology of leishmaniasis. Workshop on immunobiology of Major tropical parasitic Diseases held at institute of primate research. **March 7-18, 2011**
- viii. **Michael Gicheru.** Next generation sequencing at applied Biosystems- part of Life Technologies, **ILRI 1<sup>st</sup> November 2011**
- ix. **Michael Gicheru,** World day of Immunology , Kenya Society of immunology, Kenya University Students Business Centre **2<sup>th</sup> April 2012**
- x. **Michael Gicheru,** Ist KSI symposium. Immunology in East Africa, **KEMRI 24<sup>th</sup>-25<sup>th</sup> May 2012**

#### **b) Presentation of papers at academic and professional conferences/ exhibitions**

- i. Mwangi, E., **Gicheru, M.M.** and Stevenson, P. (1991). Studies of trypanosomiasis and helminthiasis in sheep and goats in Ngurumani, South West Kenya. Ninth Scientific workshop: Small ruminant collaborative Research Support Programme (SR-CRSP), Kenya.
- ii. **Gicheru, M.M.** and Olobo, J.O., (1994). Visceral leishmaniasis in vervet monkeys: Immunological responses during asymptomatic infection 2nd. African immunology conference of the federation of African Immunological Society (FAIS).PP. 31
  - a. **Nairobi, Kenya.**
- iii. **Gicheru, M.M.** Olobo, J.o and Anjili ,C. (1997) Heterologous protection by Leishmania donovani for Leishmania Major infections in vervet monkey model.
  - 3<sup>rd</sup> Federation of African Immunological Society Congress (FAIS)
  - 9<sup>th</sup> Biennial South African immunology Society Congress (SAIS)
  - 4<sup>th</sup> South African Society for Free Radical Research Congress (SASFRR)
  - Allergy Society of South African Symposium (AllSa).
  - 9-13<sup>th</sup> March 1997; Arthurs Seat Hotel, Cape Town, South Africa.**

- iv. **Michael M. Gicheru** , Moses Otsyula , Vineet N. KewalRamani , Paul Spearman , David C. Montefiori (1998). Characterization of neutralizing antibody in African green monkeys naturally infected with Simian immunodeficiency virus ( SIVagm). 19<sup>th</sup> African Health Sciences Congress incorporating 16<sup>th</sup> Annual Joint Scientific Conference With Symposium on Africa Health Priorities of the 21<sup>st</sup> Century. 14 -18 April 1988 Arusha International Conference Centre( AICC), Arusha **Tanzania**.
  
- v. **Michael Gicheru** , Moses otsyula. Paul Spearman, Barney Graham David Montefiori (1988). African green monkeys: Neutralizing antibody responses in African green monkeys naturally infected with Simianimmunodeficiency virus (SIVagm) 2<sup>nd</sup> National HIV/AIDS/STD conference. **28<sup>th</sup>-30<sup>th</sup> Oct. 1988. Nairobi Kenya**.
  
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- xvii. **Gicheru M M**, and Farah I O, Role of non human primates in Biomedical Research. Fourth Workshop on South-South Collaboration and Application of molecular Biology Techniques in Tropical Diseases. Accra , Ghana: **17<sup>th</sup>-21<sup>st</sup> August 2004**.
- xviii. Machariah C, Bourdichon A, and **Gicheru MM** , Efficacy of Trypan, adiminazene based drug as antileishmania agent. 25<sup>th</sup> African Health Sciences Congress. **October 4-8<sup>th</sup> 2004**, Intercontinental Hotel, Nairobi, Kenya. Abstract No.B/043/04
- xix. Jane N, Mugwe, **Michael Gicheru**, Zipporah Nganga.. The effects of antiretroviral drugs on CD4 cells and viral loads in HIV positive patients attending Nakuru General hospitals, Kenya. Reproductive health and HIV/AIDS international conference., **10<sup>th</sup>-12<sup>th</sup> April 2007**, Kenya institute of Education, Nairobi
- xx. Muli, J.M., Macharia, J.C., Kariuki, T.M. and **Gicheru, M.M.** . Evaluation of Clamette Guerin, Montanide incomplete aseptic and aluminium hydroxide as adjuvants for leishmania vaccine in BALB/c mice. Moving research to wealth creation. **1st Kenyatta University Research conference**,. **28<sup>th</sup> -30<sup>th</sup> April 2009**.

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- xxv. **Injera W.E., Gicheru, M.M.**, Kabiru, E.W., Githure, J.I. AgMuc1/IL-12cDNA Co Immunization Enhance Mosquitocidal Immune response. 1<sup>st</sup> KSI symposium-Immunology in East Africa. **KEMRI, Nairobi, Kenya, 24-25<sup>th</sup> May 2012**
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- xxviii. Namu, S.J., **Gicheru, M.M.**, Nganga, ZW. The antiretroviral drug toxicity and immune status of HIV patients attending Runyenjes comprehensive care centre, Embu, Kenya. 1<sup>st</sup> KSI symposium-Immunology in East Africa. **KEMRI, Nairobi, Kenya, 24-25<sup>th</sup> May 2012**
- xxix. **Gicheru Michael**, Bosire Eric and khamadi .Establishment of reference ranges of CD4, CD4 and CD8 lymphocytes subsets among Health kenyans, Abstract no. KSI048. 19<sup>th</sup> international Scientific conference, basic and Clinical research for improved health, **Southern Sun, Mayfair, Nairobi, Kenya. 11-13<sup>th</sup> September 2013**
- xxx. Joshua M. Mutiso, John C. macharia, Mustafa Barsa, Evan Tarcha, Alain Bourdichon and **Michael Gicheru.** Invitro and invivo antileishmanial efficacy of a combination therapy of diminazene and artesunate against Leishmania donovani in BALB/c mice, Abstract no. DDPP43. 19<sup>th</sup> international Scientific conference, basic and Clinical research for improved health, **Southern Sun, Mayfair, Nairobi, Kenya. 11-13<sup>th</sup> September 2013**

### c) Convening and coordinating conferences/ workshops

- i. **Michael Gicheru.** International Training workshop on Ethical considerations and Biomedical use of Non human primates for Research in Tropical diseases. Institute of Primate Research, National museums of Kenya. **18<sup>th</sup>-27<sup>th</sup> June 2007**
- ii. **Michael Gicheru.** Immunobiology of leishmaniasis. Workshop on immunobiology of Major tropical parasitic Diseases held at institute of primate research. **March 7-18, 2011**
- iii. **Michael Gicheru,** World day of Immunology , Kenya Society of immunology, Kenya University Students, Kenyatta University student Business Centre **2th April 2012**
- iv. **Michael Gicheru,** Ist Kenya Society for Immunology symposium. Immunology in East Africa, **KEMRI 24<sup>th</sup>-25<sup>th</sup> May 2012**

## **8.0 RESEARCH AND PUBLICATIONS**

### **a) Local journal/ Kenya**

- i. **Gicheru, M.M. (1990)** A partial comparative study of physical characteristics of thermostable antigens of hydatid cyst fluid (intermediate stage of of echinococcus granulosus ) and fluid from cyst of Taenia hydatigena (cysticercus tenuicollis). Msc Thesis; University of Nairobi.
- ii. **Gicheru, M. M.** Vervet monkey model for Leishmaniasis: Characterization, protective immunity and Vaccination against *Leishmania major* infection. Ph.D. Thesis Kenyatta University, **April, 2002.**
- iii. P Aloo-Obudho, **M.M. Gicheru**, P.O. Okemo, B.M. mwangi, P.K. Mbugwa, J.a. Simauni. 2005.Proceedings of 1<sup>st</sup> National Biological conference. **2-5<sup>th</sup> August 2005,** Department of Biological sciences, Kenyatta university.
- iv. Yole dorcas, S., Shamala Kenedy,T, KioKithome, **Gicheru M. M., (2007).** Studies on interaction of schistosoma mansoni and leishmania major in experimentally infected BALB/c mice.**African Journal of health sciences, 14:** 80-85
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### **b) International journals**



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2. **Gicheru, M.M.**, Olobo, J.O., Kariuki,T.M., Adhiambo, C., (1995). Visceral leishmaniasis in vervet monkeys: Immunological responses during asymptomatic infections. *Scand. J. Immunology*,41: 202 - 208
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5. **Gicheru, M.M.**, Olobo, J.O., and Anjili, C.O.(1997) Heterologous protection by *Leishmania donovani* for *Leishmania* Major infections in vervet monkey model., *Experimental Parasitology*. 85, 109-116
6. **Gicheru, M.M.**, Otsyula M, Spearman, P. Graham B.S, Miller C, Robison H.L. Haigwood , N. L., . Montefiori D.C (1999). Neutralizing antibody responses in African green monkeys infected with Simian immunodeficiency virus ( SIVagm) .**J. Med. Primatol** 28: 97-104
7. **Gicheru, M.M.**, Olobo, J.O., Anjili, C.O.,Orago,S.S., Modabber, F., Scott, P. (2001). Vervet monkeys Vaccinated with killed *Leishmania* major parasites and interleukin-12 developed a Type 1 immune responses but are not protected against challenge infection.**Infect and Immunity** 69: 245-251
8. Joseph O Olobo., **Michael M Gicheru**, Chris O Anjili, C. (2001). The African Green Monkeys (*Cercopithecus aethiops*) Model for cutaneous and visceral leishmaniasis: Review. *Trends in Parasitology*, 17: 588-592
9. Masina , S., **Gicheru, M.**, S., Demontz, S., Fasel, N. (2003) Protection against cutaneous leishmaniasis in out bred vervet monkey with the histone H1 antigen. **J. Infectious Dis.** 188: 1250 -1257
10. JC, Machariah, Bourdichon , AJ., **Gicheru MM**, (2004).Efficacy of Trypan@ A diminazene based Drug as antileishmania agent. **Acta Tropica**,92, 267-272
11. Nigel, D., **Gicheru, M.** (2005). Developing a simian model for Leishmaniasis: one man’s quest. *Veterinary Times*.35: 22-23

12. Vincent Komo Njoroge, **Michael Muita Gicheru**, and Keneth Wtitu Kariuki (2008). Microbial causes of Gastroenteritis in Embul-Bul area of Ngong Division of Jajiado District Kenya, Kenya. *International Journal of pure and Applied science*, **1**: 82-88
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14. Genetic diversity of HIV-1 based on gag region among antenatal clinical attendees in North Rift Valley Kenya. **Gene bank accession EU163589-EU163704**
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16. James M. Munyao, **Michael M. Gicheru**, Zipporah W. Nganga, Esther Kagasi, Hastings S. Ozwara, (2008). Transfection of *Plasmodium knowlesi* in Baboon *Papio anubis* provides a new system for analyses of parasites expressed transgenes and host-parasite interface. **International Journal of integrated biology**, **2**: 100-108
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20. Eric M.O. Muok, Pauline N.M. Mwinzi, Carla I. Black, Jennifer M. Carter, Zipporah W. Nganga, **Michael M. Gicheru**, W. Evans Scor, Diana M.S. Karanja and Daniel G. Colley, (2009). Childhood coinfections with *Plasmodium falciparum* and *Schistosoma mansoni* result in lower percentages of activated T cell and regulatory memory cells than schistosomiasis only. *Am. J. Trop. Med. Hyg.*, **80**: 475-478
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22. Mutiso, J.M., Macharia, J.C., Kariuki, T.M., **Gicheru, M.M.** (2009). Montanide ISA 720 is more effective than BCG as an adjuvant for *Leishmania* Killed Vaccine in BALB/c mice. *International Journal of integrated Biology*, **7**: 107-116.
23. Lydia B Nyamwamu, **Michael M. Gicheru**, Rekha R. Sharma, Albert Kimtai, Willy K. Tonui, Peter Kamau Ngure (2009). Evaluation of the immunochromatographic Strip test for the rapid diagnosis of antenatal syphilis in women in Eldoret, Kenya. *Journal of Nanning Medical University*, **23**: 1-5
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28. Gabriel O. Ng'onga, Margaret Oduor, John Vulule, R. Manohar and **M. Gicheru Michael** (2010). Influence of ABO/Rh Blood group phenotypes on immunosurveillance to Plasmodium Falciparum malaria in children 1-10 years in Kisumu Town, Kenya. *Nature Conservators, India*, **22** (2) - 197-210
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37. Joshua M. Mutiso, John C. Macharia, Evans taracha, **Michael M. Gicheru ( 2012)**. Protection against visceral leishmaniasis in vervet monkey *Chlorocebus aethiops*: *Leishmania donovani* whole cell antigen delivered with adjuvants. *Journal of Biomedical research*, **26**: 1-7
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47. Joshua M. Mutiso, John C. macharia, Maria N. Kiiro, Peter M. Mucheru, Wycliffe N., Nkoba, Fredric C. Maloba, **Michael M. Gicheru** (2013). Leishmania parasites specific CD4 synergizes and correlates positively with CD8+ T cells in production of gamma interferon following immunization of vervet monkey (*Chlorocebus aethiops*) model, *Science parasitology*, **14**(1): 7-19
48. Wilfred E. Injera, Brian D. Foy, Ephantus W. wanjohi, **Michael M Gicheru**, John I. Githure, John C. Beier. 2013. Mosquitocidal immune response in BALB/c mice enhanced when *Anopheles gambiae* Mucin-cDNA is co-administered with interleukin-12 cDNA. *International Journal of Biology*, **5** (2): 46-56
49. Wilfred E. injera, **Michael M Gicheru**, Ephantus W. Kabiru E. W., John I. Githure, John C. Beier 2013. Immunopathological features developing in the mosquito midgut after feeding on *Anopheles gambiae* Mucin/ interleukin-13 cDNA immunized mice. *Internal journal of morphology*, **3**(10). 329-337
50. Kiige SG, Mutiso J.M., Laban, L.T., Khayeka-Wandabwa, Anjili CO., Ingonga J. **Gicheru M.M.** 2014. F1 cross-breed between susceptible BALB/c and resistant Swiss mice infected with *Leishmania major* exhibit an intermediate phenotype for lesion sizes and type 1 cytokines but show low level of total IgG antibodies. *Experimental immunology*, **79**: 283-291

#### a) Book Chapter

- i. Animal Models for Tropical Parasitic Diseases ( 2004) Chapter 9  
Idle O Farah, Maina Ngotho, Thomas Kariuki, Maamun Jeneby, Lawrence Irura, Naomi Maina, John Kagira, **Michael Gicheru**, and Jann Hau( **Book Chapter**)
- ii. Animal Models for Tropical Parasitic Diseases ( 2013) Chapter 9  
Idle O Farah, Maina Ngotho, Thomas Kariuki, Maamun Jeneby, Lawrence Irura, Naomi Maina, John Kagira, **Michael Gicheru**, and Jann Hau( **Book Chapter**)

**b) Networking and collaborations with external organization's**

- i. Prof. Jan Lagerlof, Dept of Ecology Swedish University of Agricultural Sciences, SLU- Joint post graduate field courses between SLU and KU, **2013 Ongoing**
- ii. Dr. Cristopher Anjili, Kenya Medical Research Institute, Kenya, Role of Reservoir hosts, vectors and Epidemiology of Leishmaniasis. **2012 ongoing**
- iii. Dr Hastings Ozwara Institute of Primate Research, Immunopathogenesis of malaria parasites species in animal models- Training of post graduate students, **2009 ongoing**
- iv. Kenya marine and Fisheries Research Institute (KEMFRI), Attachment and research opportunities, Coastal and marine resource management students, KEMFRI Scientist participating in teaching our student. **2012 to present**
- v. Prof. Joseph Olobo, Microbiology Department, Makerere University, Uganda, Non human primate model for Leishmaniasis, Thesis examination, External examination , **2011 to present**
- vi. Prof. Paul Ndegwa, School of Biological sciences, University of Nairobi, Area of Entomology , Thesis examination and External examination, **2010 to present.**
- vii. Dr. Annika Nordin, Department of Energy and Technology, Swedish University of Agricultural Sciences, Research and joint of Johson Nduhiu Gitahi,- a PhD student in KU, **2014 .**

**c) External/ Internal Research Grants**

- i. **2006/2007** -Training grant for holding an international workshop on use of non human primates in biomedical research from WHO/TDR, 30,000 \$ (1year)
- ii. **2007**-Improving Food security and Human Health through integration of Livestock, Medicinal plants and water management to combat mosquito vectors in Ahero Rice paddies. The grant was awarded by **Commission of Higher Education (CHE)** in **October 2007**. This joint Research Project between myself, Professor Kokwaro and Dr. Okoth of KARI-TRC. The amount warded is **3 Million Kenya shillings ( 3 years)**
- iii. **2009**-Testing the efficacy and safety of Cheetah/CFC by assign CD4 counts, Viral load, liver, renal and bone marrow functions using HIV infected baboons. National council for science and Technology awarded the grant in **June 2009**. This is joint research project

between myself, Prof. Nderitu, Dr Gikonyo of Kenyatta University and Dr G. Mwethera of Institute of Primate research and others. The amount awarded was Ksh. **2,336,700 (2 years)**

- iv. **2010-** Vaccine development against visceral leishmaniasis in non-human primate model: use of high potential adjuvants. National council for science and Technology awarded the grant in **June 2010**. This joint Research Project between myself, Mr. Joshua Mutiso and Dr Evans Tharacha of Institute of Primate Research. The amount awarded was **2 million Kenya Shillings (2 years)**
- v. **2010-** Tungiasis as a risk factor for HIV and AIDS in economically disadvantaged communities in Muranga Noth and characterization of most immunodominant antigen in Tunga penetrans with potential for vaccine development” National council for science and Technology awarded the grant in **June 2010**. This joint Research Project between myself, Mr. Jamleck mwangi, Dr Hasting Ozwara of IPR and Dr Maree Muriuki of Muranga District Hospital The amount awarded was **1.3 million Kenya Shillings(2 years)**
- vi. **2011-** Improving food security and human health through integration of Livestock, medicinal plants and water management to combat mosquito ve3ctors in Ahero rice paddies. **Exit strategies**. National council for science and Technology awarded the grant in **May 2011**. This joint Research Project between myself, Professor E. Kokwaro and Dr S. Okoth KARI- TRC. The amount awarded was **1 million and 50 Kenya Shillings (1 year years)**

## ***9.0 RECOGNATION***

### ***9.1 External examiner appointment***

#### **a) Undergraduate and Post graduate examinations**

- i. **External examiner**, Department of Public Health Pharmacology & Toxicology, University of Nairobi , undergraduate and post graduate Examinations in the area of Public Health and Immunology, **2005/2006**
- ii. **External examiner**, Zoology department, Jomo Kenyatta University of Agriculture, Science and Technology , **2007- 2010**
- iii. **External examiner**, Zoology department, Jomo Kenyatta University of Agriculture, Science and Technology , **2012-2014**
- iv. **External examiner**, Nursing Sciences Department, Dendan Kamahi University College of Engineering and technology, Moderating HIV and AIDS Examinations in the college,**2009 to date**

- v. **External examiner**, Department of Human pathology, school of health sciences, University of Nairobi , Undergraduate and post graduate Immunology Examination, **2011 to date**
- vi. **External examiner**, Department of Public health Pharmacology and toxicology, University of Nairobi appointment **2012** to date

**b) Thesis examination**

Jomo Kenya university of Agriculture and Technology- **many thesis**  
 Nairobi University- **many thesis**  
 Egerton University- one thesis

**9.2 Referee/Reviewer of professional periodicals**

a) Reviewer of professional periodicals

- i. **June, 2006 - to date:** Appointed as member of the Editorial board of African Journal of Agricultural Research
- ii. **May 2007 - to date:** Appointed as member of the editorial board of of International Integrated Biology Journal
- iii. **2014-**Member of review Board Biomed Central Editorial

b) Referee

**2012-Reviewer of Grant Research proposal, JKUAT**

**2013 - Reviewer of Grants for mentored seed project research proposal, Kenyatta university**

**9.3 Awards**

- i. **1989** -MSc award, NORAD
- ii. **1999**- PhD Scholarship, WHO/ TDR
- iii. **2007-** A study on determination of existence, distribution of stromal derived Factor-1 in Kenya population. **The grant was awarded by Association of African Universities, HIV/ AIDS project. Small grant for students Research Project, Accra- North Ghana.** This is a small grant for student awarded to my student Mr.John Khamala Ngonda with my support in April 2007. **The amount awarded is 1000 US\$ (1year)**
- iv. **2007-**To evaluate the utility of HIV IgA ELISA in diagnosis and assessment of progression of HIV/AIDS in children less than 18 months. **The grant was awarded by Association of African Universities, HIV/ AIDS project. Small grant for students Research Project, Accra- North Ghana.** This is a small grant for student awarded to my student Mr Khobondo Joel Onyango with my support in April 2007. **The amount awarded is 1000 US\$ ( 1 year)**



- v. **2008**-Consultancy with FAO/UN on meat quality in Somalia for export market 5-30<sup>th</sup> August 2008. 8,000 US\$

#### ***9.4 Appointment to Boards***

- i. Member of Kenyatta University Research Review Board

#### ***9.5 Community Outreach***

- i. **2012 to date**-Secretary to Church Building committee, Deliverance Church Ruiru
- ii. **2011 to date**- Patron to , Kenyatta university Animal Health Club
- iii. **2011 to date**- Community sensitization on management and control of jigger infestations in primary schools in Muranga East District

#### ***9.6 Being invited to conference workshop as guest speaker/ trainer***

- i. **Prof Michael Gicheru- convener.** International Training workshop on Ethical considerations and Biomedical use of Non human primates for Research in Tropical diseases. Institute of Primate Research, National museums of Kenya. **18<sup>th</sup>-27<sup>th</sup> June 2007**
- ii. **Michael Gicheru.** Immunobiology of leishmaniasis. Workshop on immunobiology of Major tropical parasitic Diseases held at institute of primate research. **March 7-18, 2011**
- iii. **Michael Gicheru.** Training of trainers (TOT) workshop on HIV mainstreaming and integration and integration into curriculum. Business Services and students centre( BSCC), Kenyatta university, **21<sup>st</sup> -24<sup>th</sup> May 2013**

### ***10.0 ACADEMIC LEADERSHIP***

#### ***10.1 Initiating or leading research project***

**2010-** Tungiasis as a risk factor for HIV and AIDS in economically disadvantaged communities in Muranga Noth and characterization of most immunodominant antigen in Tunga penetrans with potential for vaccine development” **National council for science and Technology awarded the grant in June 2010.** The amount awarded was **1.3 million Kenya Shillings-** I am the team leader and initiated this project

#### ***10.2 Initiating new Academic Programmesin Department/Schools***

##### **a) Formulation new academic programme**

- i. BSC Animal Health- 2009
- ii. MSc. In Applied coastal and marine resource management programme- 2013

## **b) Review of academic Programme**

- i. BSc Animal health and production-2014
- ii. BSC in Coastal Marine Resource Management- 2014
- iii. BSC Biology 2014

### ***10.3 Developing programmes external to Kenyatta University***

2012-BSC Animal Health and production- Mount Kenya University

## ***11.0 OTHERS***

### ***11.1 Appointments***

- i. 2011 to date - Treasurer, Kenya society of Immunology (KSI)
- ii. 2010-2012- Member of Kenya Veterinary Board Education and quality assurance committee

### ***11.2. Contribution to University advancement***

- i. Record post Graduate supervision ( 50 MSc and 2 PhDs)
- ii. Member of Kenyatta university Farm Technical committee- **VC's appointment**
- iii. Chairman Kenyatta University -Animal care and use committee- **VC's appointment**
- iv. Chairman of a Department -4 years- **VC's appointment**
- v. Department Examination Coordinator 4years- **VC's appointment**
- vi. Published widely over 50 publications in peer reviewed journals
- vii. Patron Kenyatta University Animal Health club

### ***11.3 Membership of professional bodies***

- i. Kenya Society of Immunology
- ii. Kenya Veterinary Association
- iii. Member of Kenya Veterinary Board, Education and quality assurance committee

### ***11.4 Referees***

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