

## CURRICULUM VITAE

### PERSONAL DETAILS

Names: Prof. Elizabeth Kokwaro  
Cell phone: 0722-668321  
Nationality: Kenyan  
Marital status: Married  
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### Educational Background

Dates	Institution	Field of study	Degree
1990	University of Florida, Gainesville, U.S.A	Sterile Insect Techniques	Certificate
1972-1975	University of Nairobi	Entomology	Ph.D.
1969-1972	University of Nairobi	Botany & Zoology	B.Sc.

### EMPLOYMENT

#### A. International Centre of Insect Physiology and Ecology (icipe)

1. Research Scientist (June 1978-Dec.1991)
2. Head of Cell Biology Research Unit (CRU) (1984-1988)
3. Head of Histology and Ultrastructure Laboratory (1991)
4. Scientific Officer (October 1976-May 1978)
5. Experimental Officer (Dec. 1975-Sept. 1976)

#### B. University teaching

1. **Associate Professor, Kenyatta University**  
Department of Zoological Sciences
2. **Senior Lecturer, Kenyatta University**  
Department of Zoology

### UNDERGRADUATE COURSES

1. Introduction to Histology
2. Cell Biology and Systemic Histology
3. Entomology
4. Molecular Biology and Biochemistry
5. Integrated Pest and Vector Management
6. Invertebrate Zoology
7. Applied Entomology (University of Nairobi, 2003)

8. Arthropod Biology
9. Biology Methods
10. Veterinary and wildlife disease vectors
11. Medical Entomology
12. Cell Biology
13. Histology

### **POSTGRADUATE COURSES**

1. Comparative Morphology and Classification of Insects
2. Insect Physiology
3. Laboratory Methods in Parasitology
4. Applied Medical Entomology
5. Physiology and Behaviour of Medical Arthropods
6. Pests of Crops and Trees
7. Arthropod Vectors of Medical and Veterinary Importance
8. Insect Functional Morphology
9. Crop Pests and Beneficial Insects (University of Nairobi, 2003)
10. Pest Management (University of Nairobi, 2003)
11. Pesticide Chemistry and Application (University of Nairobi, 2003)
12. Techniques in Medical Entomology
13. Insect Physiology and Biochemistry

### **RESEARCH ACTIVITIES, SUPERVISION OF STUDENTS**

#### **PH. D STUDENTS**

##### **ii) SUCCESSFUL COMPLETION (6 GRADUATED)**

1. **Mr. Ong'amo G. O. (Reg. No. I84/15666/05): 2009 (Kenyatta University) (Ph.D-Agricultural Entomology).**  
Diversity, Ecology and Population dynamics of Lepidoptera stem-borers in Kenya.
2. **Dr. Ohaga Spala (Reg. No. I 84/9503/04): 2008 (Kenyatta University) (Ph.D-Medical /VeterinaryEntomology)**  
Optimization of semio-chemicals for savanna tsetse control through 'push', 'pull' and 'push-pull' tactics
3. **Dr. Sylvance Okeyo Okoth (Reg. No. C82/7030/03): 2007 (Kenyatta University)**  
The dynamics and epidemiology of Rhodesian sleeping sickness in the Allopatric populations of *Glossina pallidipes* in Kenya.
4. **Dr. Zipporah N. Njagu-1998 (Kenyatta University)**  
Role of monitor lizard *Varanus niloticus* Laurenti in the epidemiology of trypanosomiasis along the shores of Lake Victoria, Kenya.

5. **Dr. Dorcas Bawo –1992 (River State University of Science and Technology, Port Harcourt, Nigeria)**  
The role of sensory receptors in mating and oviposition behaviour of *Maruca testulalis* (Geyer) (Lepidoptera: Pyralidae)
6. **Dr. Marcelian Njau–1990 (Dar es Salaam)** The neuroendocrine regulation of larval development in the maize stem borer *Busseola fusca* (Fuller) (Lepidoptera)

### M.SC STUDENTS

#### SUCCESSFUL COMPLETION (21 GRADUATED)

1. **Ong’ute Hillary (Reg. I56/22522/2011)** Pollination provision and guttation production in sweet melon (*Cucumis melo* L.) grown under field and greenhouse conditions. (M. Sc.)
2. **Mweresa, Gungu Nixon (Reg. No.I56/CE/22431/2010) (M. Sc. Parasitology) 2016**  
Evaluation of *Bacillus thuringiensis var israelensis* and *Bacillus sphaericus* briquets as *Anopheles* mosquito larvicides in Western Kenya. 2016
3. **Juma, Victor (Reg. No. I56/CE/12139/07) (M.Sc. Agricultural Entomology) 2015**  
Management of tomato (*Lycopersicon esculatum* Mill) pests using insecticide treated insect proof nets and effect on natural enemies and yield in Kenya.
4. **Ameka, Caleb (Reg. No.I56/15393/08) (M. Sc. Medical Entomology) 2015**  
Effects of insect growth regulator Pyriproxyfen on population of dragonfly nymphs and predation efficiency on *Anopheles* mosquitoes at Mahanga, Vihiga County.
5. **Mukanda Makokha Martin (Reg. No. I56/CE/10955/06) (M.Sc. Parasitology): 2014**  
Effects of insecticide treated nets on prevalence of malaria among pregnant women in Bumula Division, Bungoma South District
6. **Onyango A. Shirley (Reg. No. I56/12266/09) (M.Sc. Medical Entomology): 2013**  
Comparative Evaluation of the effectiveness of adult mosquito sampling methods in three ecological habitats in South Coast, Kenya
7. **Okello, Samwel Arum (Reg. No.I56/10607/06) (M.Sc. Medical Entomology):2011**  
Resting and colonization behavior of malaria vectors during rainy and dry season in semi-arid ecosystem of Baringo District
8. **Mutunga, Lucy Mumo (Reg.No.I56/1062/06) (M.Sc. Medical Entomology) 2011**  
Evaluation of the impact of microbial larvicides on population dynamics of *Anopheles* Mosquitoes in Mwea, Kenya
9. **Olanga Everlyn Adhiambo (Reg. No.I56/10829/06) (M.Sc. Medical Entomology): 2010**  
Efficacy of synthetic odour blends and human emanations on host seeking behavior of *Anopheles gambiae* mosquitoes.

10. **Mr. Odhiambo M. T. Ojera (Reg. No. I56/13040/05) (M.Sc.-Medical Entomology):**  
2010 Evaluation of polyene based long lasting treated bed nets on the population density of indoor resting *Anopheles* mosquitoes in Kanyaboli, Western Kenya.
11. **Abonyo Esther Adhiambo (Reg. No. I56/13770/05): 2010**  
Effects of *Metarhizium anisopliae* application on the diversity of plants and selected insect species associated with *Odontotermes* termite mounds at Mpala Research Centre-Laikipia District, Kenya.
12. **Mr. Oluoch John (Reg. No.I56/7728/02) (M.Sc.-Parasitology):2009**  
Evaluation of malaria infection in relation to age, residence and diagnosis of patients attending Kipsamoite dispensary, Nandi North District , Kenya
13. **Ngugi, Michael Kahato (Reg. No.I56/13492/05): (M.Sc.-Medical Entomology):2009**  
Effects of cow dung and selected medicinal plants on *Anopheles* species as a strategy for malaria vector control in Ahero rice irrigation scheme, Kenya.
14. **Cheruiyot, Edimon Kipkemoi (Reg. No. SES/PGB/02/2000): 2008**  
**(Moi University)**  
Abundance, distribution and host-preference of honey bees, *Apis mellifera adansonii* (L.) in Embomos South West Mau Forest
15. **Mr. Kiptoo Samwel Kemboi (Reg. No. I56/7448/02): (M.Sc.-Medical Entomology): 2008**  
Community – based malaria vector surveillance in Rusinga Island, western Kenya.
16. **Mrs. Ondiba Isabella Moraa (Reg. No.E54/7394/02): (M.Sc.-Medical Entomology): 2006**  
Effects of long-term use of insecticide treated bed-nets on species composition and knock-down resistance in malaria vectors, western Kenya.
17. **Mr. Ong'amo, G.O. (Reg. No. I56/7430/03): (M.Sc.-Agricultural Entomology):2005**  
Assessment of stem-borer distribution relative to diversity of wild host grasses in main maize and sorghum growing zones in climatic zones in Kenya.
18. **Mr. Tobias Omufwoko (Reg. No. I57/7197/01): (Master of Public Health & Epidemiology):2004**  
Factors influencing the work performance of community health workers in primary Healthcare in Matayos Division in Busia District, Kenya.
19. **Mr. Samuel Muiruri (Reg. No. I56/7177/01): (M.Sc.-Medical Entomology): 2004**  
Determination of predator feeding preference on immature stages of *Anopheles* mosquitoes.

20. . **Mohamed Hassan Mohamud (Reg. No. I56/8022/93): (M.Sc.-Agricultural Entomology):1997** Survival and development of the stem borer *Chilo partellus* (Swinhoe) (Lepidoptera: Pyralidae) on selected wild gramineous plants.
21. **Musyoki Joseph (Reg. No I 56/7573/97): (M.Sc.-Veterinary Entomology):1997** *In vitro* feeding of *Rhipicephalus appendiculatus* (Neumann) and its application in the reproduction of *Theileria parva* (Theiler) sporozoites stabilates.

### **ON-GOING M.SC. & PH.D.SUPERVISION**

1. **Shirley, Onyango (Reg. I84/39140/2017)** Impact of mixed irrigation on *Plasmodium falciparum* and vector genetic diversity and competence in Western Kenya. **(Ph.D)**
2. **Dunia Mayaka (I84EA/38093/2017)**
3. **Naomi Nyambura Riithi (Reg.I56/37163/2016 )**Developing a tool for application of *Metarhium anisopliae* on wild adult *Glossina fuscipes fuscipes* in Manga and Magare, Lake Victoria Western Kenya. **(M.Sc.)**
4. **Ngugi, Peter Muchiri (Reg. No. I56/CE/14154/2009)** Management of water melon (*Citrullus anatus* Thunb) pests using insecticide treated insect-proof nets and effect on yield in Kenya. **(M.Sc.)**
5. **Njogu Simon (Reg. I56/CE/2253/2011)** The potential of selected hedge plants in maintaining pollinators in the agricultural landscape in Nairobi County. **(M. Sc.)**
6. **Munywoki, Nzioki (Reg. No.I56/22795/11) (M. Sc. Applied Entomology)** Insecticide resistance monitoring in malaria vectors along the coastal Kenya. **(M. Sc.)**
7. **Mbwiria Eliud (I56/CE/23951/12) (M. Sc. Applied Entomology)** Potential of *Metarhizium anisopliae* and parasitoids for the management of fruit flies on Chilis in the open field in Kilifi County, Kenya. **(M. Sc.)**

### **PUBLICATIONS**

1. Satoshi Satoshi Hiroyoshi, **Elizabeth Kokwaro**, Sai Mettupalli, Takayuki Mitsunaga, Shigemi Yagi, Gadi V.P. Reddy (2019) Effects of the juvenile hormone mimic NC-184 on the development of the reproductive organs and mating behaviour of nymphs of the desert locust, *Schistocerca gregaria* (Orthoptera: Acrididae) Eur. J. Entomol. 116: 477-485
2. Ong'ute H.W, **E.D. Kokwaro**, M. Kasina (2019) Comparing Honey bees and Stingless bee's pollination in greenhouse sweet . Intern. J. of Ent. Res. Vol.4; Issue 1: 62-64

3. Mikhali, C. A., **Kokwaro E.** and Ndenga B. (2018) Effects of Insect Growth Regulator Pyriproxyfen on Dragonfly Nymphs as Predators of *Anopheles* Mosquitoes at Mahanga, Vihiga County, Kenya. Egerton J. Sci.& Technol.Vol. 16: 130-142 ISSN No. 2073 – 8277
4. J.O. Nyamuni, **E. Kokwaro**, J. Ouma, T.V Ambundo (2015) Evaluation of Malaria Infection In Relation to Age and Residential Area in Nandi County, Kenya. E. Afr. Med. J. Vol. 92, No. 3
5. Mikhali, C. A., **Kokwaro E.** and Ndenga B. (2018) Effects of Insect Growth Regulator Pyriproxyfen on Dragonfly Nymphs as Predators of *Anopheles* Mosquitoes at Mahanga, Vihiga County, Kenya. Egerton J. Sci.& Technol.Vol. 16: 130-142 ISSN No. 2073 – 8277
6. J.O Nyamuni, **E. Kokwaro**, J. Ouma, T.V Ambundo (2015) Evaluation of Malaria Infection In Relation to Age and Residential Area in Nandi County, Kenya. E. Af. Med. J. Vol 92, No. 3
7. M. T. O. Odhiambo, O. Skovmand, J. M. Vulule, 1 and **E. D. Kokwaro** (2013) Evaluation of Polyethylene-Based Long Lasting Treated Bed) Net Netprotect on *Anopheles* Mosquitoes, Malaria Incidence, and Net Longevity in Western Kenya. Trop.Med. & Intern.Health 14, SUPPL.2: 30-97
8. Shirley A. Onyango, Uriel Kitron, Peter Mungai Eric M. Muchiri, **Elizabeth Kokwaro** Charles H. King, Francis M. Mutuku (2013) Monitoring malaria vector control interventions: Effectiveness of five different adult mosquito sampling methods. Med. Entomol. 50(5): 1140-1151
9. Samuel Muiruri, Joseph Mwangangi, John Carlson, Ephantus Kabiru, **Elizabeth Kokwaro**, John Githure, Charles Mbogo & John Beier (2013) Effect of predation on *Anopheles* larvae by five sympatric insect families in coastal Kenya. J. Vector Borne Dis. 50, pp. 45–5
10. Samuel Muiruri, Joseph Mwangangi, John Carlson, Ephantus Kabiru, **Elizabeth Kokwaro**, John Githure, Charles Mbogo & John Beier (2013) Effect of predation on *Anopheles* larvae by five sympatric insect families in coastal Kenya. J. Vector Borne Dis. 50, pp. 45–50
11. Evelyn A Olang, Michael N Okall, Phoebe A. Mbadi, **Elizabeth D. Kokwaro**, Wolfgang R. Mukabana (2010) Efficacy of synthetic odour blends and emanations on host seeking behavior of *Anopheles gambiae* mosquitoes. Malaria Journal, 9: 6
12. M. T. O. Odhiambo, O. Skovmand, J. M. Vulule, 1 and **E. D. Kokwaro** (2013) Evaluation of Polyethylene-Based Long Lasting Treated Bed) Net Netprotect on *Anopheles* Mosquitoes, Malaria Incidence, and Net Longevity in Western Kenya. Journ. of Trop. Medicine Volume
13. Shirley A. Onyango, Uriel Kitron, Peter Mungai, Eric M. Muchiri, **Elizabeth Kokwaro** Charles H. King, Francis M. Mutuku (2013) Monitoring malaria vector control interventions: Effectiveness of five different adult mosquito sampling methods. Med. Ent.
14. Samuel Muiruri, Joseph Mwangangi, John Carlson, Ephantus Kabiru, **Elizabeth Kokwaro**, John Githure, Charles Mbogo & John Beier (2013) Effect of predation on *Anopheles* larvae by five sympatric insect families in coastal Kenya. J. Vector Borne Dis. 50, pp. 45–50
15. **Kokwaro, E. D.**, Aseka, E., Ogingo, D. and Ong'amo, G. (2012) Mollusc shells of Lake Victoria species diversity, abundance and the potential for community livelihood. Proc. 1<sup>st</sup> National Sc. Technol. and Innovation Conference

16. Ameka, C., **Kokwaro, E.D.** and Ndenga, B. (2012) Efficacy of the *Anopheles gambiae* predator dragonfly nymphs in the management of malaria. Proc. 1<sup>st</sup> National Sc. Technol. and Innovation Conference
17. **Kokwaro, E. D.**, Gicheru, M. Okoth, S. Kariuki, F. and Ogingo, D. (2011) Improving food security and human health through integration of organic manure and medicinal plants into rice paddies in Ahero. Proc. 4<sup>th</sup> NCST Conference. KICC
18. Evelyn A Olanga, Michael N Okall, Phoebe A. Mbadi, **Elizabeth D. Kokwaro**, Wolfgang R. Mukabana (2010) Efficacy of synthetic odour blends and emanations on host seeking behavior of *Anopheles gambiae* mosquitoes. Malaria Journal
19. Arum, S.O., **Kokwaro, E.D.**, & MULWA, F. (2010) Diversity and colonization of permanent and semi-permanent breeding habitats by *Anopheles* mosquitoes in a semi-arid ecosystem of Baringo district in Kenya. 2<sup>nd</sup> RUFORUM Biennial Meeting. Entebbe
20. Odhiambo, O., Skovmad, O., Vulule, L., Odeny, L., Mulaya, N., **Kokwaro, E. D.** (2009) Two years experience with a long lasting, insecticidal bednet, Netprotect: impact on malaria, bioefficacy and net quality Trop. Med. & Intern. Health 14, SUPPL.2: 30-97
21. **Kokwaro, E.D.**, Ndawula, L. (2008) Communities to make money from Mollusc Shells. VicRes Newsletter No.5:7-10
22. Ong'amo, G.O., LE Ru, B.P., Moyal, P., Calatayud, P.A., Le Gall, P., Ogol, K.P.O., **Kokwaro, E.D.**, Capdeville-Dulac, C., and Silvain, J.F. (2008) Host-plant diversity of *Sesamia calamistis* Hampson (Lepidoptera: Noctuidae): Cytochrome b gene sequence reveal local genetic differentiation J. experimentalis et Applicata 128: 154-161
23. **Kokwaro, E. D.**, Okoth, S. O., Kiragu, J. M. and Murila, G. A. (2007) Influence of Socio-Economic and Cultural Activities on Vector-Host Interaction and Risk of Rhodesian Sleeping Sickness at Busia and Nguruman Areas of Kenya. Trends in Applied Sciences Research 2 (1):28-38
24. S.O. Ohaga, **E.D. Kokwaro**, I.O. Ndiege, A. Hassanali and R. K. Saini (2007) Livestock farmers' perception and epidemiology of bovine trypanosomosis in Kwale District, Kenya. Preventive Veterinary Medicine 80:24-33
25. O. S. Okoth., **E.D. Kokwaro**, J.M. Kiragu and G.A. Murila (2007) Diurnal Activity of Allopatric Populations of *Glossina pallidipes* and Hosts and their Implications on Risk of Transmission of Sleeping Sickness in Kenya. J. of Entomology 4 (1):20-32
26. Okoth, S.O, **Kokwaro, E.D.**, Kiragu, J.M., and Murila, G.A. (2007) *Glossina pallidipes* and Host Interactions: Implications of Host Preference on Transmission Risk of Rhodesian Sleeping Sickness in Kenya. Trends in Applied Sciences Research 2 (5): 386-394
27. **Kokwaro, E.D.** (2006) Virus particles in male accessory reproductive glands of tsetse, *Glossina morsitans morsitans* Westwood (Diptera: Glossinidae) and associated tissue changes: Intern. Tropical Insect Science Vol.26, No.4, 266-272

28. Okoth, S.O., **Kokwaro , E.D.**, Kiragu, J.M. and Murila,G.A.(2006) Susceptibility and Transmission Capacity of Subpopulations of *Glossina pallidipes* to Human Infective *Trypanosoma brucei* rhodesiense. Trends in Medical Research 1(1):75-85
29. S.O. Ohaga, **E.D. Kokwaro**, I.O. Ndiege, A. Hassanali and R. K. Saini (2006) Preliminary evaluation of repellents and baits in ‘push-pull’ tactic for tsetse and trypanosomosis suppression. ICIPE Biennial Scientific Report 2004-2005 pp. 130-132
30. Moraa, I., Kamau, L., Bayoh, N., Gimnig, J., **Kokwaro, E.D.**, Vulule, J., HAWLEY, W. and WALKER, E. (2005) Elevated KDR frequency in *Anopheles gambiae* in western Kenya. Amer. J. Trop. Med. & Hygiene Vol.75, No.6, 915
31. Okoth, S.O., **Kokwaro, E.D.** and Kiragu, J.M. (2004) Transmission dynamics and epidemiology of rhodesian sleeping sickness in the allopatric populations of *Glossina pallidipes* in Kenya. Proc. of the 6<sup>th</sup> Annual Eastern Africa Network for trypanosomosis.
32. Mohammed, H.M; Khan, Z. R; Overholt, W. A. and **Kokwaro, E.D.** (2004) Behaviour and Biology of *Chilo partellus* (Lepidoptera. Pyralidae) on maize and wild gramineous plants. Intern. Tropical Insect Science 24 :287-297)
33. **Kokwaro E. D.** (2003) Virus Particles in male accessory reproductive glands of tsetse *Glossina morsitans morsitans* and associated tissue changes. Ultrastructural study. Integrated Pest and Vector Management (IPVM) in the Tropics. Perspective and Future Strategies.pp.21
34. Musyoki, J. M., Osir, E., Kiara, H. K. and **Kokwaro, E. D.** (2003) Comparative infectivity to cattle of *Theileria parva* stabilates prepared from ticks fed *In vitro* and those fed on cattle. Experimental and Applied Acarology Vol.32:51-67
35. Njagu, Z., Mihok, S., **Kokwaro, E. D.** and Verloo, D. (1999) Isolation of *Trypanosoma brucei* from monitor lizard (*Varanus niloticus*) in an endemic focus of rhodesian sleeping sickness in Kenya. *Acta Tropica*, **72**, 137-148.
36. Kaaya, G.P., Seshu Reddy, K.V., **Kokwaro, E.D.** and Munyinyi, D. M. (1993) Pathogenicity of *Beauveria bassiana*, *Metarhizium anisopliae*, *Serratia marcescens* to the banana weevil, *Cosmopolites sordidus*. *Biocontrol Science and Technology*, **3**, 177-178.
37. Adhiambo- OduoL, J. **Kokwaro, E.D.**, Miguda, E. and Muruli, L. (1993). The role of an Interdisciplinary network for Research in Reproductive health in Kenya. *Workshop proceedings*
38. Miguda, E., Muruli, L. **Kokwaro, E. D.** and Adhiambo- Oduol, J. (1993) The role of a Reproductive Health Consultative Group. Workshop Proceedings.
39. Rogo, L. M., **Kokwaro, E.D.**, Mutinga, M.J. and Khamala, C.P.M. (1992) Differentiation of vector species of phlebotominae (Diptera: Pyschodidae) in Kenya by chorionic sculpturing of the eggs. *Journ. Medical Entomology*, **29 (6): 1042-1044.**
40. Kaaya, G.P., **Kokwaro, E.D.** and Murithi, J.K. (1991) Mortalities and lesions in adult *Glossina morsitans morsitans* experimentally-infected with the entomogenous fungi, *Beaveria bassiana* and *Metarhizium anisopliae*. *Discovery and Innovation* Vol. 3, No. 3, 55-60.



41. **Kokwaro, E.D.**, Otieno, L.H. and Chintawi, M. (1991) Salivary glands of the tsetse *Glossina pallidipes* Austen infected with *Trypanosoma brucei* and virus particles: ultrastructural study. *Insect Sci. Application* Vol. 12, Nos. 5/6, pp. 661-669.
42. **Kokwaro, E.D.**, Mramba, N. and Chintawi, M. (1990) Ultrastructural changes in Salivary Glands of the Tsetse *Glossina morsitans morsitans* Westwood infected with Virus and Rickettsia-like organisms. *J. Invertebrate Pathology* Vol. 56, 337-346.
43. Maina, J.N., Maloiy, G.M.O., Njogu, E.K. and **Kokwaro, E.D.** (1989) Scanning electron microscope study of the morphology of the reptilian lung: The savannah monitor lizard *Varanus exanthematicus* and Pan cake tortoise *Melacocherus tornieri*. *The Anatomical Record* 224:514-522
44. **Kokwaro, E.D.** and Muriithi, J.K. (1988) Ultrastructural characteristics of the ejaculatory duct of the male tsetse, *Glossina morsitans morsitans* Westwood. *Insect Sci. Application* Vol. 9, No. 14 pp. 475-482.
45. **Kokwaro, E.D.**, Okotkotber, B.M., Odhiambo, T.R. and Muriithi, J.K. (1987) Biochemical and immunochemical evidence for the origin of the spermatophore material in *Glossina morsitans morsitans* Westwood. *Experientia* Vol. 43, pp 448-451
46. **Kokwaro, E.D.** (1986) Spermatogenesis in the tsetse *Glossina morsitans morsitans* Westwood. *Development, Growth and Differentiation* Vol. 28
47. **Kokwaro, E.D.** (1986) Developmental changes in the ejaculatory duct of male tsetse *Glossina morsitans morsitans* Westwood. Proc. 11<sup>th</sup> International Congress on Electron Microscopy, Kyoto Japan.
48. Irungu, L., Mutinga, M.J and **Kokwaro, E.D.** (1986) Chorionic sculpturing of eggs of some Kenyan Phlebotomine sandflies. *Insect Sci. Application* Vol. 7, No 1 pp. 45-48.
49. Waladde, S.M., Kahoro, H.M., **Kokwaro, E.D.** and Chintawi, M. (1985) Responses of *Chilo partellus* to material obtained from susceptible and resistant maize cultivars: electrophysiology and behavior. *Insect Sci. Application* Vol 6, No 3 pp. 341-347
50. **Kokwaro, E.D.** and Otieno, L.H. (1984) Ultrastructural observations of tsetse salivary glands infected with *Trypanosoma brucei* and virus-like particles. 3<sup>rd</sup> Intern. Congress on Cell Biology (ICCB)
51. Waladde, S.M., **Kokwaro, E.D.**, Galun, R. and Chintawi, M. (1984) Tibial campaniform sensilla of *Glossina morsitans* J. *Insect Physiology* Vol. 3 No. 9, pp. 751-755
52. Waladde, S.M., **Kokwaro, E.D.** and Chintawi, M. (1984) Antennal responses to physical and chemical stimuli among the Pyralidae *Chilo partellus*, *Maruca testulalis* and *Eldana saccharina*. Proc. VII International Congress of Entomology
53. **Kokwaro, E.D.** (1983) Sperm development in *Glossina morsitans morsitans* Westwood. *Adv. Invert. Rep.* Vol 3 Edited by Wolf Engels and Dirk f. Went

- 54. Kokwaro, E.D. (1983)** Egg chamber development in the ovarioles of the flesh fly, *Sarcophaga tibialis* Macquart (Diptera: Sarcophagidae) during the first reproductive cycle. Insect Sci. Application Vol. 4, No. 3 pp.247-252
- 55. Kokwaro, E.D. (1983)** Oocyte development in the adult fleshfly, *Sarcophaga tibialis* Macquart (Diptera:Sarcophagidae) during the first reproductive cycle. Insect Sci. Application Vol. 4, pp.241-246
- 56. Odhiambo, T. R., Kokwaro, E.D. and Sequeira, L.M. (1983)** Histochemical and ultrastructural studies of the male accessory reproductive glands and spermatophore of the tsetse, *Glossina morsitans morsitans* Westwood. Insect Sci. Application Vol. No.3, pp. 227-236

### **PRESENTATION OF PAPERS AT ACADEMIC AND PROFESSIONAL CONFERENCES**

1. Kokwaro Elizabeth, Michael Kahato, Oging'o Dalmas & Gicheru Michael (2015) Intermittent Irrigation and Cow dung as an Alternative Strategy for Rice Production in Ahero Irrigation Scheme, Kenya.
2. **Kokwaro, E.**, Boera P. & Kariuki, F. (2013) Nutrient Analysis of Fish and Fisheries Wastes for Value Addition into Aqua Feeds
3. Daniel Munywoki, Joseph Mwangangi, **Elizabeth Kokwaro** & Charles Mbogo (2013) Insecticide resistance monitoring in malaria vectors in Kilifi County, a long the coastal Kenya
4. **Kokwaro, E.D.**, Aseka, E., Ogingo, D. and Ong'amo, G. (2012) Lake Victoria mollusc shells: species diversity, abundance, distribution and the potential for community livelihood in Kenya
5. Improving Food Security and Human health through Integration of Organic Manure and Medicinal Plants into Rice Paddies in Ahero. 3<sup>rd</sup>-6<sup>th</sup> May 2011
6. Utilization of freshwater molluscan shells in sustainable community livelihood around Lake Victoria. Aquaculture Workshop. 5-8 July, 2009, Arusha.
7. Mollusc shells as a potential source of livelihood for the riparian communities along L. Victoria. 1st Kenyatta University Conference. 28-30<sup>th</sup> April, 2009, Nairobi, Kenya.
8. Value addition to Lake Victoria mollusc shells for sustainable community livelihood around the basin. BIO-EARN/VICRES Scientific Conference. 24-26<sup>th</sup> November, 2008
9. Improving food security and human health through integration of livestock, medicinal plants and water management to combat mosquito vectors in Ahero rice paddies.

Commission for Higher Education Research (CHE) Dissemination Workshop 26<sup>th</sup>-31<sup>st</sup> August, 2008, Mombasa, Kenya.

10. Value-addition to fresh water mollusc shells in sustainable community Livelihood around Lake Victoria Basin. 5th VicRes Annual Forum, 19-25<sup>th</sup> May 2008, Arusha, Tanzania.
11. Networking and linkages: Sharing Information. Gender Training Workshop, Kenya School of Monetary Studies. 20-22<sup>nd</sup> February, 2008
12. Utilization of Lake Victoria mollusc shells in ornamentation. 4th VicRes Annual Forum, 19-25<sup>th</sup> May 2007, Jinja, Uganda.
13. Utilization of freshwater molluscan shells in sustainable community livelihood around Lake Victoria. 3<sup>rd</sup> VicRes Annual General Meeting, 1-3 May, 2006, Kisumu.
14. Virus particles in the male accessory reproductive glands of *Glossina morsitans morsitans* and associated tissue changes: Ultrastructural study. 15<sup>TH</sup> Bi-annual Congress of the Association of Insect Scientists (AAIS), ICIPE, Duduville. 9<sup>th</sup>-13<sup>th</sup> June 2003
15. Comparative infectivity to cattle by *Theileria parva* stabilates prepared from ticks fed *in vitro* and those fed on cattle. 15<sup>TH</sup> Bi-annual Congress of the Association of Insect Scientists (AAIS), ICIPE, Duduville. 9<sup>th</sup>-13<sup>th</sup> June 2003
16. *In vitro* feeding of *Rhipicephalus appendiculatus* nymphs and its application in the production of *Theileria parva* stabilates. 2<sup>nd</sup> African Acarology Symposium, Novel Approaches to Tick and Mite management in the new Millennium, ICIPE, Duduville, 3<sup>rd</sup> – 7<sup>th</sup> Dec. 2001.
17. Reproduction in tsetse flies. IFIAS planning workshop for Women in Science and Development. Toronto, Canada, March 19<sup>th</sup> – 21<sup>st</sup> 1991
18. Salivary glands of the Tsetse, *Glossina morsitans* and *G. pallidipes* Infected with trypanosomes, virus and rickettsia- like organisms. Symposium on Insect Pest and Sustainable food Production in Africa. Lusaka, Zambia. 4<sup>th</sup> – 8<sup>th</sup> December, 1989.
19. Mortalities and lesions caused by *Beauveria bassiana* and *Metarhizium anisopliae* infections on adult Tsetse, *Glossina morsitans*. International Study workshop on Tsetse population and behaviour 6<sup>th</sup>-11<sup>th</sup> August 1989, ICIPE, Dudu Ville.
20. Developmental changes in the ejaculatory duct of male Tsetse, *G. morsitans*. International Congress on Electron microscopy. 31<sup>st</sup> Sept.- 7<sup>th</sup> Oct. 1986.
21. Ultrastructural observations on Tsetse salivary glands infected with *Trypanosoma brucei* and virus-like particles. Third International Conference on Cell Biology, August 26<sup>th</sup> – 31<sup>st</sup> 1984, Tokyo Japan.
22. Spermatogenesis in Tsetse. 3rd International Symposium of Invertebrate Reproduction, August 22<sup>nd</sup> – 27<sup>th</sup> 1983, Tubingen, West Germany.

23. Spermatogenesis in pupal instar of *Glossina morsitans*. 5<sup>th</sup> International Symposium on Spermatology (ISS). August 25<sup>th</sup>- 29<sup>th</sup>, 1982, Fujiyoshida, Japan.
24. The functional morphology of the male accessory reproductive glands. The Sapporo Conference on the Ultrastructure and Functioning of Insect cells, August 3-6 1982, Sapporo, Japan.
25. The functional morphology of the male accessory reproductive glands is tsetse *G.morsitans*. Inauguration of the Association of African Insect Scientists. 5<sup>th</sup> - 7<sup>th</sup> Dec. 1978, Nairobi.
26. Insect Pests. Fourth All African Conference of Business and Professional Women. 1978, Nairobi

### **CONFERENCES/ SEMINARS/WORKSHOPS ATTENDED**

1. Kenya Tsetse Trypanosomiasis Council (KENTTEC)/FAO Tsetse and Trypanosomiasis Atlas Development Workshop 29 Nov-1<sup>st</sup> December 2017, Jacaranda Hotel, Nairobi
2. Tsetse and Trypanosomiasis Stakeholders Workshop on Development of Tsetse and African Animal Trypanosomiasis (AAT) Atlas in Kenya. Kenya Institute Curriculum Development 23<sup>rd</sup> February, 2017
3. Regional Conference of the International Network of Women Engineers and Scientists (INWES). Kenya School of Monetary Studies. 19-21 Nov. 2013. Nairobi
4. National Council for Science and Technology 3<sup>rd</sup>-6<sup>th</sup> May 2012, KICC, Nairobi
5. Workshop on Monitoring and Evaluation. 18-20 May 2011, KCB Leadership Centre, Karen. Nairobi
6. National Council for Science and Technology 3<sup>rd</sup>-6<sup>th</sup> May 2011, KICC, Nairobi
7. The First Kenyatta University Conference 28-30<sup>th</sup> April, 2009, Nairobi, Kenya.
8. BIO-EARN/VicRes Scientific Conference 24-26<sup>th</sup> November, 2008, Kampala, Uganda.
9. Commission for Higher Education Research Dissemination Workshop 26<sup>th</sup>-31<sup>st</sup> August, 2008- Mombasa, Kenya.
10. Fifth VicRes Annual Forum 19 -25<sup>th</sup> May 2008, Arusha, Tanzania
11. VicRes Planning Workshop March 2008. Jinja, Uganda
12. Fourth VicRes Annual Forum 19 -25<sup>th</sup> May 2007, Jinja, Uganda
13. VicRes Aquaculture Cluster Seminar, 30<sup>th</sup> Aug.-1st September, 2006, Jinja, Uganda.
14. Third VicRes Annual General Meeting, 1-3 May, 2006, Kisumu.

15. Third VicRes Harmonization Workshop (2005) AICAD Centre, Jomo Kenyatta University of Agriculture and Technology (JKUAT) Juja, Kenya.
16. Leadership Workshop for African Women and Engineering 16-20 August, 2004, Nairobi  
5<sup>th</sup> Bi-annual Congress of the Association of Insect Scientists (AAIS) ICIPE Duduville  
9<sup>th</sup> – 13<sup>th</sup> June, 2003
17. Moi University School of Environmental Studies Curriculum Review Workshop 24-27 August 2000 Genevieve Hotel, Nakuru.
18. Women in Scientific, Education and Development. 15<sup>th</sup> November, 2002, Safari Park Hotel, Nairobi.
19. 4<sup>th</sup> African Acarology symposium. Novel Approaches to Tick and Mite management in the new Millennium. 3-7 December 2001, ICIPE
20. A pan African Workshop on Women in Engineering and Science. Nairobi, Kenya, 29<sup>th</sup> November – 4<sup>th</sup> December 1999
21. Neem Awareness Workshop, ICIPE Mbita Point Research and Training Centre, 24<sup>th</sup> November 1994]
22. ICIPE Annual Research Conference, 9<sup>th</sup> – 12<sup>th</sup> May 1994, ICIPE, Duduville
23. UNIFEM/Gender, Science Development (GSD) Planning workshop on Science and Technology for the World Conference on Women, 28<sup>th</sup> February- 1<sup>st</sup> March 1993, ICIPE, Duduville
24. Organized and participated in a workshop on "The Role of an Interdisciplinary Network for Research in Reproductive Health in Kenya". Nairobi, 20<sup>th</sup> August, 1993
25. Organized and participated in Workshop on, "Defining the Role of a Reproductive Health Consultative Group (RHECONS)" Nairobi, 20<sup>th</sup> October, 1993
26. International Symposium on Women in Science and Technology Development and Transfer, Bangkok, Thailand, 13-20 July 1992
27. IFIAS Planning workshop for Women in Science and Development. Toronto, Canada, March 19-21, 1991.
28. International symposium on integrated management of ticks in Africa. Duduville, Nairobi 26<sup>th</sup> August-1<sup>st</sup> September 1990.
29. Symposium on insect pest and sustainable food production in Africa .Lusaka, Zambia 4<sup>th</sup> - 8<sup>th</sup> December 1989.

30. International Study Workshop on Tsetse Population and Behaviour. Duduville, Nairobi 6<sup>th</sup>-11<sup>th</sup> August 1989.
31. 2<sup>nd</sup> International Conference on Tropical Entomology, Duduville. Nairobi. 31<sup>st</sup> July-4<sup>th</sup> August 1989.
32. 11<sup>th</sup> International Congress on Electron Microscopy. Kyoto, Japan. August 31<sup>st</sup> – September 7<sup>th</sup> 1986.
33. 5<sup>th</sup> International Symposium on Spermatology (ISS) Fujiyoshida, Japan, August 26<sup>th</sup>-29<sup>th</sup> 1988
34. The 7<sup>th</sup> International Congress of Protozoology, Nairobi, 22<sup>nd</sup> -29<sup>th</sup> June.
35. 3<sup>rd</sup> International conference on Cell Biology. Tokyo. Japan. Aug 26<sup>th</sup>-31<sup>st</sup> Aug 1984.
36. 3<sup>rd</sup> International Symposium of Invertebrate Reproduction. Tubingen, West Germany. 2<sup>nd</sup>-27<sup>th</sup> August 1983.
37. The Sapporo Conference on the Ultrastructure and Functioning of Insect Cells. Sapporo, Japan. August 3<sup>rd</sup>-6<sup>th</sup> 1982.
38. Inauguration of the Association of African Insect Scientists, Nairobi. 5<sup>th</sup>-7<sup>th</sup> September 1978.
39. Fourth All African Conference of Business and Professional Women. Nairobi, 1978.

### **Participation in development of the Department of Zoology**

1. Chairman Appraisal and Recruitment Committee –Academic and Senior Technical Staff (2006/2009, 2011/2011, 2012/2013)
2. Chairman Undergraduate Studies Committee, Zoology Department (1995/1996;
3. 2001/2002; 2002/2003)
4. Member of Disciplinary Committee
5. Member of Poultry Keeping Committee
6. Member of Departmental Booklet/ Brochure Committee
7. Member of Apiculture and Sericulture Committee
8. Member of Departmental Equipment and Chemicals Committee (2002/2003/2004)
9. Member of Departmental Research Funding, Consultancy and Linkage Group (2003/2004)
10. Member of the Planning Committee, 5<sup>th</sup> Annual Postgraduate Scientific Conference,

11. Zoology Department 2006/2007
12. Secretary, Planning Committee of the 4<sup>th</sup> Annual Postgraduate Scientific Conference,
13. Zoology Department
14. Member of Examination Committee (2005/2006, 2006/2007, 2008/2009, 2010/2012, 2012/2013)
15. Chairman of Curriculum Review Committee
16. Head of Entomology Programme
17. Acting Chairperson, Department of Zoology (1996)

**Participation in development of Faculty/School of Pure and Applied Sciences**

- a. Chairman School of Pure and Applied Sciences Strategic Planning Committee 2011-2012/14.
- b. Department of Zoology representative to the School of Pure and Applied Sciences Board of
- c. Undergraduate Studies Committee (2000-2003)

**Membership to Boards at Kenyatta University**

1. Member of the Quality Assurance Board (2006/2008/2009 2009/2010)
2. Member of the Teaching Practice /Assessment Board (2007/2008/2009, 2010/2011, 2012/2013, 2014)
3. Member of Kenyatta University Gender and Affirmative Action Board (2007/2008, 2009/2010, 2011/2012, 2012/2013, 2014,2016, 2017,2018)
4. Member of Kenyatta University Institutional Animal and Care Use Committee (2008/2009)
5. Member of Editorial Board of the East African Journal of Life Sciences and Physical Sciences (2007/2008)
6. Member of the Vice-Chancellor's Committee on Review of Training Policy for Assistant
  - a. Lecturers (2006/2007)
7. Member of the Vice-Chancellor's Motivation Award Committee (2006/2007)
8. Member of the Ad hoc Committee on Disposal of Obsolete Items-Central Stores and Departments

## **Convening, Co-ordinating and Management of Conferences**

- i. “The role of an Interdisciplinary Network for Research in Reproductive Health in Kenya, Nairobi, 20<sup>th</sup> Aug. 1993
- ii. “Defining the Role of a Reproductive Health Consultative Group (RHECONS)”. Nairobi, 20<sup>th</sup> Oct. 1993.

## **MANUSCRIPTS IN PREPARATION**

**Kokwaro, E.D.**, Gicheru, M., Okoth, S. Management of *Anopheles arabiensis* using cow dung and medicinal plants in Ahero Rice Scheme, Kenya

## **PAPERS IN CONFERENCE PROCEEDINGS**

1. **Kokwaro, E. D.**, Aseka, E., Ogingo, D. and Ong’amo, G. Mollusc shells of Lake Victoria species diversity, abundance and the potential for community livelihood. Proc. 1<sup>st</sup> National Sc. Technol. and Innovation Conference (2012)
2. Ameka, C., **Kokwaro, E.D.** and Ndenga, B. Efficacy of the *Anopheles gambiae* predator dragonfly nymphs in the management of malaria. Proc. 1<sup>st</sup> National Sc. Technol. and Innovation Conference (2012)
3. **Kokwaro, E. D.**, Gicheru, M. Okoth, S. Kariuki, F. and Ogingo, D. (2011) Improving food security and human health through integration of organic manure and medicinal plants into rice paddies in Ahero. Proc. 4<sup>th</sup> NCST Conference.KICC

## **NATIONAL/ INTERNATIONAL RECOGNITION**

### **ACADEMIC LEADERSHIP**

#### **EXTERNAL EXAMINER FOR UNIVERSITIES**

1. **2016, 2017, 2018:** External Examiner for B.Sc. and M.Sc. degree programmes, **University of Nairobi**, Departments of Plant Science and Crop Protection.
2. **2010, 2011, 2012, 2013, and 2014:** External Examiner, for M.Sc. programmes, **Egerton University**, Department of Zoology.
3. **2010, 2011 and 2012, 2013, 2014:** External Examiner, for B.Sc. degree programmes, **Egerton University**, Department of Zoology.
4. **2010, 2011, 2012, 2013, 2014:** External Examiner for B.Sc. degree programmes, **Maasai Mara University**, Departments of Biological Sciences.



5. **2009, 2010 and 2011:** External Examiner for B.Sc. Biology, **Kenya Polytechnic University College**, Department of Electrical & Electronic Engineering,
6. **2007, 2008, 2009, 2010, 2011, 2012, 2013, 2014:** External Examiner for M.Sc. Entomology, **Jomo Kenyatta University of Agriculture and Technology (JKUAT)**, Department of Zoology.
7. **2007, 2008, 2009, 2010, 2012, 2013, 2014:** External Examiner for B.Sc. degree programmes, **Jomo Kenyatta University of Agriculture and Technology (JKUAT)** Department of Zoology.
8. **2006, 2007 and 2008:** External Examiner for M.Sc. Entomology programme, **University of Nairobi**, Department of Zoology.
9. **2004, 2005 and 2006:** External Examiner for B.Sc. degree programmes, **University of Nairobi**, Department of Zoology.
10. **2000, 2001, 2002, 2003, 2004 and 2005:** External Examiner for M.Phil. degree programme, **Moi University**, School of Environmental Studies (SES), Division of **Biological Sciences**.
11. **2003, 2004 and 2005:** External Examiner for B.Sc. degree programmes, **Moi University**, Department of Fisheries.

#### **EXTERNAL EXAMINER OF THESES**

- Benta Atieno Obare, Reg. No. SSBX/06720P/2012: Efficacy of Selected Kenyan Plant Extracts against *Biomphalaria pfeifferi*, larval Stages of mosquitoes and *Schistosoma mansoni* (Ph.D. The Nairobi Technical University, **2017**)
2. Busula Obukosia Annette, Reg. No. I56/76478/2009 Experimental infection of malaria mosquitoes with the entomopathogenic fungus *Beauveria bassiana* under field conditions. (M.Sc., UoN, **2012**)
  3. Euphemia Ruth Mwale, Reg. No. I56/71144/09(**2012**) Assessment of Malaria Transmission Levels in Western Province after Increased use of ITNS". (M.Sc, UoN)
  - 4. Odhiambo Nyasembe Vincent (2012)** Identification of kairomones mediating host plant attraction of the malaria vector *Anopheles gambiae* (M.Sc, UoN)
  - 5. Robert Patrick Napoleon (2010)** The determinants of usage of intermittent preventive therapy and insecticide-treated bed nets in pregnancy in Juba, Southern Sudan. (M. Sc. JKUAT)
  - 6. Njoroge L. Ndung'u (2009)** The use of mosquito magnet trap as an alternative surveillance tool for outdoor mosquito populations in Kenya (M.Sc., JKUAT)

- 7. Barasa O. Sheila (2009)** Impact of mosquito-proofing houses upon mosquito entry as well as investment and motivation by householders (M.Sc. UoN)
- 8. Were, Pamella (2008)** Potency of using crude endod, *Phytolacca dodecandria*, extracts to control mosquito immature stages, in the shores and small water bodies in Lake Victoria (D. Phil., Moi University)
- 9. Odinga, C. Akinyi (2008)** Macro-invertebrates as bio-indicators of Water Quality in River Sosiani (M.Phil. Moi University)
- 10. Makamure, Sipiwe (2007)** Teratogenicity of whole pulp and paper mill effluents on endemic *Xenopus laevis* in River Nzoia, Kenya (M.Phil. Moi University)
- 11. Gichohi William Ngatho (2006)** Evaluation of Adaptation to climatic regimes, host habitat preferences and performance potentials of Trichogrammatid egg parasitoid species for commercial production as bio-control agent in Kenya (M.Phil, Moi University)
- 12. Mr. Tsuma Jembe (2006)** Distribution patterns and genetic diversity of *Oreochromis niloticus* and *Oreochromis esculentus* in Lake Victoria (D.Phil. Moi Univesity)
- 13. Ndede Isaac (2005)** A Risk Factor in Orally Acquired Helminthes in Cosmopolitan Cities in Kenya. (M.Phil, School of Environmental Studies, Moi University)
- 14. Stephen Odhiambo (2005)** Ecology and population dynamics of *Anopheles gambiae* (Diptera: Culicidae) in relation to land cover types at a western Kenya highland (D.Phil. School of Environmental Studies, Moi University)
- 15. Cherop Leah (2004)** Suitability of On-farm Formulated, Commercial pig pellet and wheat Bran on Growth and Economic Performance of Nile Tilapia, *Oreochromis niloticus* in fertilized Earthen ponds (M.Phil, School of Environmental Studies, Moi University)
- 16. Njoka Wangai Stephen (2004)** The biology and impact of Neochetina weevils on water hyacinth, *Eichhornia crassipes* (Martius) Solms-Laubach (Pontederiaceae) in L. Victoria basin, Kenya (Ph.D).
- 17. Mobagi Dinah (2003).** Understorey vegetation diversity and soil nutrient status in exotic and indigenous forest plantations of Lambwe, Semi-arid Region, Western (M.Phil., Moi university).
- 18. Wilfred O. Odadi (2003)** Cattle foraging behaviour: Effects of seasons and large mammalian herbivores in Acacia Savanna, Laikipia, Kenya.
- 19. Ogwang Vincent Odhiambo (2002).** Investigation of bacteriological quality of smoked fish from Winam gulf of L. Victoria, Kenya (M.Phil., Moi University).

**20. Omondi Reuben (2002).**Distribution and abundance of Copepod and Cladocera in Lake Victoria Kenya.

**21. Boera Priscillah (2001)** The impact of human activities on the epibenthic community in protected and unprotected marine areas at the Kenya Coast (M. Phil. Moi University).

**22. Munga, S. Adhiambo (2001)** Effects of water Hyacinth, *Eichhornia crassipes* on diversity and abundance of aquatic macro-invertebrates, especially disease vectors in Winam Gulf, L. Victoria, Kenya (M. Phil., Moi University).

**23. Chimkod, V. B. (1994)** Studies on some aspects of morphology and histophysiology of ovaries of the termite queen *Odontotermes abesus* (Termitidae: Isoptera) (PhD. Karnatak University, India).

1. Christine L. Wanjala Reg. No. I84/20200/12 (2018) for Ph.D. Residual Effects of Insecticide-based Malaria Control Interventions on Malaria vectors and the Status of Insecticide Resistance in Western Kenya.

2.Namukoye Everlyne Samita Reg. No.A99/27698/14 (2017) Population Dynamics and Management of Vectors of Maize Lethal Necrosis disease causing viruses in Bomet County of Kenya'

3.Likhayo Paddy Wamalwa Reg. No.I84/5006/2004 (2016) Evaluation of postharvest technologies for effective integrated management of the larger grain borer and maize weevil in stored maize in Kenya. (P.hD,)

4. Mwiru Francis Gilbert Reg. No.I56EA/2357/2013 (2017) Assessment of human-olive baboon (*Papio anubis*) conflicts in farms around the Mgori forest reserve, Singida Tanzania. (M.Sc. K.U)

5. Mary Mwari Quantai, Reg. No.I84/25951/2013 (2016) Suitability of hedgerow planting system in managing bees (Hymenoptera: Apoidae)'pollinators in farmlands of Kenya. (M.Sc. K.U)

6. Gacheri Virginia Kithinji, Reg. No.I56/CE/22781/2010 (2016) Efficiency of coloured agronets in the management of tomato (*Lycopersian esculentum*) pests in Kenya. (M.Sc. K.U)

7. Achieng'a Florence Carolyn-Reg. No.I56/CE/511494/2008 (2016) Use of insect proof nets for the management of arthropod pests of tomato, *Solanum lycopersicum* ul. in Nairobi County, Kenya". (M.Sc. K.U)

8. Othim Stephen T. Omburo- Reg. No. AI46/23316/12 (2015) Population Dynamics of amaranth

lepidopteran leaf webbers and the role of indigenous parasitoids in their control in Nairobi County, Kenya. (M.Sc. KU)

9. Machani Araka Onchangwa's msc. thesis entitled, "determination of selected drought tolerant grass species that could be used as trap plants for *Chilo partellus* (swinhoe) in Kisumu County, Kenya (2016) (M.Sc. K.U)

10. Nahashion, C.K. Reg. No. I56/CE/11158/07 (2014) Effects of seasonality and production systems on diversity and infestation levels of arthropod pests of *Dolichos lablab* in Meru Central and Yatta Counties, (M.Sc.)

11. Pauline Mbinya Mueke (2013) Comparing various insect pest incidences and yields of tomatoes grown in high tunnel and those grown in open field in Kirinyaga County, Kenya

12. Kiatoko Nkoba, Reg. No. (2012) Studies on the distribution, behavioural biology, rearing and pollination efficiency of five stingless bee species (Apidae: Melliponinae) in Kakamega forest, Kenya (Ph.D.)

13. Amanuel Tamiru Abamo, Reg. No. I84f/11060/2008 (2012) Stem borer oviposition induced volatile semiochemicals in maize and their effects on the behavior of parasitoids. (Ph.D.)

14. Shehu Shagari Awandu, Reg. No. I56/10622/2006 (2012) Estimation of malaria transmission intensity using antibody responses to *Plasmodium falciparum* merozoite surface protein-1 after vector control in western Kenya (M.Sc. Immunology)

15. Odhiambo Chiawo's David Reg. No. I56/5001/03 (2012) Composition and floral resources of bees and butterflies in Kenya Muhaka forest and surrounding farmlands, Kwale County, Kenya (M.Sc. K.U)

**16. Ndenga Bryson Alberto (2011)** Ecological characterization of *Anopheles* larval habitats and their distribution in Western Kenya highlands. (Ph.D., K.U)

**17. Olanga Everlyn Adhiambo (2010)** Efficacy of synthetic odour blends and human emanations on host seeking behavior of *Anopheles gambiae* mosquitoes. (M.Sc.)

**18. Mr. Odhiambo M. T. Ojera (2010)** Evaluation of polyene based long lasting treated bed nets on the population density of indoor resting *Anopheles* mosquitoes in Kanyaboli, Western Kenya. (M.Sc.)

**19. Mutua Patrick (2010)** Comparative in vitro study of quantitative and qualitative characteristics of free surface respiratory macrophages in the duck and the rabbit (M.Sc. Immunology)

**20. Mr. Oluoch John (2010)** Evaluation of malaria infection in relation to age, residence and diagnosis of patients attending Kipsamoite dispensary, Nandi North District, Kenya (M.Sc.)

**21. Ngugi, Michael Kahato (2009)** Effects of cow dung and selected medicinal plants on

*Anopheles* species as a strategy for malaria vector control in Ahero rice irrigation scheme, Kenya (M.Sc.).

22. **Ngatho (2009)** Evaluation of adaptation to climatic regimes, host habitat preference and performance potentials of trichogrammatid egg parasitoid species for commercial production as a biocontrol agent in Kenya". (M.Sc.)

23. Maina Patrick Kariuki (2009) Impact of landuse on the distribution and diversity of Plant & Microbiol. Sci)

24. **Mr. Kiptoo Samwel Kemboi (2008)** Community – based malaria vector surveillance in Rusinga Island, Western Kenya (M.Sc. Medical Entomology). (M.Sc.)

25. **Lize Apondi Ojowi (2008)** Barriers to safe obstetric practices in prevention of mother to child HIV transmission (PMTCT): case of HIV positive mothers in a PMTCT project in Kibera (M. P.H.)

26. **Ohaga Spala (2008)** Optimization of semio-chemicals for savanna tsetse control through ‘push’, ‘pull’ and ‘push-pull’ tactics (Ph.D.)

27. **Abudo Mamo Qido (2007)** A study of socio-medical factors associated with the prevalence of Brucellosis among the nomads in Maikona of Marsabit District, Kenya (M.P.H.)

28. **Okoth Sylvance Okeyo (2006)** Transimission dynamics and epidemiology of Rhodesian sleeping sickness in allopatric populations of *Glossina pallidipes* of Kenya. (Ph.D.)

29. **Isabella Moraa Ondiba (2006)** Effects of Long-term use of insecticide treated bednets on species composition in malaria vectors, and knockdown resistance in Western Kenya. (M.Sc.)

30. **Burugu Marion Warigia (2004)** Expression of the *Glossina* proteolytic lectin (GPL) gene in tsetse flies and other haematophagous arthropods (M.Sc.)

31. **Mr. Kane Cherif Mohamed (2004)** Cross-stage physiological effects of the desert locust, *Schistocerca gregaria*, aggregation pheromones on their behaviour and susceptibility to control agents (Ph.D).

32. **Mr. Tobias M Omufwoko (2004)** Factors influencing the work performance of community health workers in primary health care in Matayos Division, Busia District, Kenya (M.P.H.E.).

33. **Millicent Ambetsa (2002)**. The influence of prenatal care on pregnancy outcome in a rural area in Kitui district (M.P.H.E.).

34. **Frank Odhiambo (2004)** Effect of insecticide - treated bednets on malaria specific morbidity in childhood in Asembo Rarieda Division, Bondo District, Western Kenya (M.P.H.E.).

35. **Patricia W. Karuru (2004)** Factors predisposing adolescents to HIV/AIDS in selected

secondary schools of Kiambu district, Kenya (M.P.H.E.).

**36. Eliud Maundu (1998)** Control of the black bean aphids, *Aphis fabae* Scop. (Homoptera Aphidae)

on French beans using Neem-based pesticides in Dkneya (M.Sc. Agric. Entomology). (M.Sc.)

**37. Joseph Musyoki (1998)** *In vitro* feeding of *Rhipicephalus appendiculatus* (Neuman) and its Application in the production of *Theileria prava* (Theiler) sporozoit stabilates (M.Sc. Parasitology).

**38. Mohamed Hassan Mohamud (1997)** Survival and development of the stemborer *Chilo partellus* (Swinhoe) (Lep: Pyralidae) on selected gramineous plants (M.Sc.)

**39. Solomon Kimani (1997)** Analysis of volatile phytochemicals from wild host plant *Pennisetum purpureum* (K)Schumach of *Chilo partellus*) (M.Sc., Chemistry).

**40. Esther Kioko (1994).** Biosystematic studies of the graminaceous stemborers, *Chilo partells* (Swinhoe) and *Chilo orichalcociliellus* (Strand) (Lep: Pyralidae) (M.Sc. Agric. Entomology).

**41. Zipporah Ng'ang'a (1997)** The role of the monitor lizard, *Varanus niloticus* (Laurenti) in the Epidemiology of Trypanosomosis along the shores of L. Victoria, Kenya (Ph.D, Immuno-Parasitology).

**42. Jemimah Simbauni (1996)** Studies on some reproductive physiological aspects of the Kenyan fruit bat, *Eidolon helvum* (Megachiroptera) (Ph.D, Physiology).

**43. Sita Fra Kutua (1996)** Behavioural responses of *Rhipicephalus appendiculatus* Neumann and *R. evertsi* Neuman (Acari: Ixodidae) to host and non-host semiochemicals (Ph.D.).

**44. Samuel K. Mbogo (1995)** Induction of resistance to *Rhipicephalus appendiculatus*. Neumann in New Zealand white rabbits through immunization with commercial moulting hormones and tick-derived haemolymph (Ph.D, Immunology).

## MANUSCRIPTS REVIEWED FOR PROFESSIONAL JOURNALS

### Insect Science and its Application as enlisted below:

#### a.) 2006

1. Surface ultrastructure of the egg chorion of eri silkworm, *Samia ricini* (Donovani) (Lepidoptera: Saturniidae) by Vineet kumar *et al.*
2. Cytostructural changes during spermatogenesis in uzifly *Exorista sorbillus* (Diptera: Tachnidae)

#### (b) 2003

1. Histological aspects of *Locusta migratoria* treated by D-isoascobic acid by Elsayed, G

**(c) 1996**

1. The ecology and pest status of the maize ear borer, *Mussidae nigrivenella Rogonot* (Lepidoptera: Pyralidae) in the Republic of Benin by Sculthess *et al.*
2. The potential value of stem borer resistance in the management of *Busseola fusca* (Lepidoptera: Noctuidae) populations in sorghum by Van den Berg and M. C. Van Der Westhuizen.
3. Intraspecific competition among larvae of the larger grain borer, *Prostephanus truncatus* (Horn) (Coleoptera: Bostrichidae) within maize grains by Kwame, A. Vowotor *et al.*
4. Growth and development of *Terefrisoma nigrescens* Lewis (Lepidoptera: Histeridae) under different humidity regimes by Richard Oussou *et al.*
5. Sustainable cassava pest management in Ghana: The case of cassava green mite *Mononychellus tanajoa* Bondar (Acari: Tetranychidae) by A. R. Cudjoe *et al.*
6. Aquatic weed problems in west Africa and the use of insects in integrated control programme by G. Van de Klashorst *et al.*
7. Morphology of the spermatophore of *Acanthoplus speiseri* Brancsik (Orthoptera:Tettigonidae.): a pest of grain crops in Zambia

**Vetting Modules for Kenyatta University Institute for Open Learning**

1. Water-borne diseases
2. Vector-borne diseases
3. Introduction to Cell Biology

**Being invited as a member of an Editorial Board**

Member of the Research Board of Advisors of the American Biographical Institute (ABI) (2001-2006)

**RESERCH GRANTS AWARDED**

**1.2011-2012:** (NCST) Value addition of fish and fisheries wastes/by-products into aquafeed for tilapia and catfish (**Principal Investigator**)

**2. 2007-2011:** Commission for Higher Education (CHE) Improving food security and human health through integration of livestock, medicinal plants and water management to combat mosquito vectors in Ahero rice paddies, Commission for Higher Education, (CHE/NCST) (**Principal Investigator**)

**3. 2005-2009:** (VicRes) Utilization of Freshwater Molluscan shells in Sustainable Community Livelihood around Lake Victoria, Lake Victoria Research Initiative (**Principal Investigator**)

**4. 1997:** Behavioural characteristics of the desert locust *Schistocerca gregaria* reared in the laboratory, Japan International Research Centre for Agricultural Sciences (**JIRCAS**), (**Co-Investigator**)

**5. 1996-1997:** Survey and documentation of research in reproductive research in Kenya, The Population Council (**Chairman/ Principal Investigator**)

#### **Awards**

**1972-1975:** Received M.Sc. /Ph.D. Scholarship from Norwegian Academic Development (NORAD)

#### **MEMBERSHIP OF PROFESSIONAL BODIES**

1. Member of The Pan-Africa Mosquito Control Association (PAMCA)
2. Member of the African Association of Insect Scientists (AAIS) 1978 to date
3. Member of the Entomological Society of Kenya (ESK) 1993
4. Member of the African Association of Microbiologists 2002
5. Member of the Association of Acarologists (AKA)- 2000
6. Member of the African Forestry Research Network (AFORNET)- 2000
7. Member of the Interdisciplinary Network for Research in Reproductive Health (INNER-Health, 1993/94)
8. Member of the African Women in Science and Engineering (AWSE) 2001 to date.

#### **ACADEMIC LEADERSHIP**

##### **(a) Research leadership**

Chairman of the Interdisciplinary Network for Research in Reproductive health (INNER-health) 1993/94 (Under the auspices of the Population Council)

##### **(b) DEVELOPMENT OF PROGRAMMES/PROJECTS IN DEPARTMENT**

A collaborative project on behavioral characteristics of the desert locust *Schistocerca gregaria* reared in the Department of Zoology laboratory, Kenyatta University. Collaborators: Prof. S. Yagi, Dr. S. Nakamura and S. Hiroyoshi, icipe Visiting Scientists from Japan International Research Centre for Agricultural Sciences, JIRCAS 1997)

#### **OTHER ACADEMIC CONTRIBUTIONS**

1. Academic Advisor to 1<sup>st</sup> year students (1995/1996, 2001/2002, 2002/2003, 2003/2004) academic years
2. Academic Advisor to 4<sup>th</sup> year students (1997/1998, 1999/2000 academic year)
3. Supervision of undergraduate and Postgraduate Diploma Education (PGDE) students on teaching practice in different schools in Kenya (1993-2003, 2007-2009/ 2010, 2011, 2012, 2013,2014,2015, 2017).



## **EXAMINATION OF 4<sup>TH</sup> YEAR RESEARCH PROJECT REPORTS**

Gathuru, Simon Njoroge Reg. No. I90/0463/2014 Effects of Nitrogenous fertilizer on soil population of Entomopathogenic nematodes (2018)

Juliet Wangechi Wairathu Reg. No. I90/1440/2014: Effects of Colcochiline in beans breeding (*Phaseolus vulgaris*) in Kenya (2018)

Khadiagals M. Harlet Reg. No. I90/0489/2014: Assessment of Agroforestry practices in small holder farms in Kandara Murang'a county, Kenya (2018)