

CURRICULUM VITAE

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UNIVERSITY EDUCATION

1976-1979: Doctor of Philosophy, University of London (Wye College)

1973-1976: Bachelor of Science in Agriculture, University of Nairobi.

TEACHING EXPERIENCE

1976: I was briefly employed in the Department of Animal Production as a demonstrator after completion of my BSc. (Agric.) programme.

1980: On completion of my Ph.D, I joined the Department of Animal Production as a lecturer.

1985: I was promoted to Senior Lecturer

May 1992: I was promoted to Associate Professor a post I hold to date.

ADMINISTRATIVE EXPERIENCE:

1. From July, 1986 to September 1992. Chairman of the Department. Coordinate all teaching and research activities in the Department of Animal Production and administrative duties.
2. Have chaired the Research Committee of the National Council for Science and Technology.

OTHER PROFESSIONAL DUTIES

- I have served as external examiner for several universities within and beyond East Africa.
- I have been involved in the deliberations of the A.S.K. International Show Cattle Subcommittee.
- I have availed myself on several occasions for consultation by farmers on their problems in animal production and especially lately related to rabbit production.

- I have availed myself for refereeing scientific papers for the East African Agriculture and Forestry Journal.
- I have served as member of the National Council of Science and Technology and Chair of the Research Committee.
- I am currently serving as a member of a Task Force charged with spearheading promotion of rabbit production under the Ministry responsible for livestock production.

RESEARCH INTERESTS:

Main research interests are in animal production with emphasis on ruminant nutrition.

The specific areas are:

1. Beef cattle production systems
2. Evaluation of feed resources for ruminants
3. Dairy goat production systems in smallholder farms.
4. Camel and goat production systems in semi-arid lands environments
5. Studies on camel mineral nutrition status, feed and non-feed sources of minerals and effects of mineral supplementation on milk production and calf performance.
6. Rabbit production systems.

- I have supervised several MSc and PhD students.
- I am currently supervising 3 PhD and 4 MSc students' research projects.

MAJOR CONSULTANCIES

- Part of the team that prepared the document on Livestock Development Programme, Kenya funded by the EEC. The team made proposals for livestock development particularly for the ASAL areas in Kenya.
- Team Leader for a study on the land use trends in the Transmara Region of Narok District funded by the GTZ. The team made proposals for the adjustments in the research thrust for the second phase of the Transmara Livestock Project on the basis of the changes in land use during the first phase of the project.
- Member of ODA/KARI Mission to identify and prioritise smallholders dairy production research needs.
- Participated as the Livestock Production Specialist in a Project Progress Review of the GTZ-funded Integrated Food Security Programme at Wamba (Samburu District).
- Part of a team that reviewed cattle production systems research and development in Kenya on behalf of KARI.

Below is a list of my publications:

PhD Thesis and Publications in Refereed Journals

1. Wanyoike, M.M., (1979), Beef Production: Studies on feed intake and on the use of a feed additive. Ph.D. Thesis, Wye College University of London.
2. Wanyoike, M.M. and W. Holmes, (1979). Utilization of Monensin as a Feed Additive for Beef Cattle, *Animal Production* 28:146.
3. Wanyoike, M.M. and W. Holmes, (1981). The effects of Winter Nutrition on Subsequent Liveweight Performance and Intake of Herbage by Beef Cattle. *J. Agriculture Science Camb.* 97:221.
4. Wanyoike, M.M. and w. Holmes, (1981). A comparison of Indirect Methods of Estimating Feed Intake on Pasture, *Grass and Forage Science.* 36:221.
5. Kayongo, S.B., Wanyoike, M.M. and H. Kayongo-Male. (1984). Red Maasai sheep: Effect of Pre- and Post-partum Concentrate Supplementation on Performance. *International Goat and Sheep Research.* 2:283.
6. Kayongo, S.B., Wanyoike, M.M., and H. Kayongo-Male. (1984). The effects of Pre- and Post-partum Concentrate Supplementation on Productivity of Small East African Goats Grazed on Range. *Bull. Animal Health Production Afr.* 32:31.
7. Karachi, M.K., and Wanyoike, M.M. (1986). The Effect of Concentrate Supplementation on Growth of Steers Grazing Natural Pastures. *Bull. Animal Health Production. Afr.* 34:109.
8. Wanyoike, M.M., A.H. Mehesha, A.N. Said. P.N. Karau (1988). Influence of Nitrogen Supplementation Voluntary Intake and Liveweight Performance of Wether Sheep on Wheat Straw Diet. *Bull. Anim. Hlth./ Prod. Afr.* 37(4).

9. Karachi, M.K. and M.M. Wanyoike (1990). Response of Growing Boran steers to Monensin supplementation- Research Note. East African Agricultural & Forestry Journal 54:221.
10. Mutetikka, D.B., M.M. Wanyoike and A.B. Carles (1990). The Effect of Level of Supplementation to Diets of Rhodes Grass (*Chloris gayana*) Hay, Maize (*Zea Mays*) Leaves and Sweet Potato (*Ipomea batatas*) Vines on Performance of Weaner Rabbits. Journal of Applied Rabbit Research 13:179.
11. Kanui, T.I., Mwendia, C., Aulie, A. and Wanyoike, M. (1991) Effects of temperature on growth, food uptake and retention time of juvenile Nile crocodiles (*Crocodylus niloticus*). Comparative Biochemistry and Physiology, 99A (1991): 453-456.
12. Ruvuna, F., J.F. Taylor, M. Okeyo, M.M. Wanyoike and C. Ahuya (1992). Effect of Breed and Castration on slaughter weight and carcass composition of goats. Journal of Small Ruminants Research 7: 175.
13. Rutagwenda T. and Wanyoike M. M. (1992). Seasonal changes in livestock diets in a semi-arid environment in Northern Kenya. www.fao.org/wairdocs/ILRI/x5519Bx5519b.htm
14. Kariuki J. N., Wanyoike M. M. and Abate A. (1993). Rumen dry matter degradability of Napier grass. Bull. Anim. Prod. Afric. 41:239-244
15. Okeyo, A.M., Ahuya, C.O. and Wanyoike, M.M. 1998. Carcass Tissue distribution and characteristics of small E.A. and Galla Goats and their F1 crosses to Toggenburgh and Anglo-Nubian. Indian Journal of Animal Science 71(9): 868.
- 16.** Noor, I.M., Wanyoike, M.M., Wakhungu, J.W. and Wahome, R.G., 1998. The state of health in Somali and Borana camel herds in Moyale District, Kenya. The Kenya veterinarian 23:155-158. – **1998**
- 17.** Noor, I.M., Wanyoike, M.M., Wakhungu, J.W. and Wahome, R.G., 1998. Assessment of pastoral camel production system in Moyale district. The Kenya veterinarian 23:155-158. - **1998**

18. Gachuiiri, C.K., R.G. Wahome, P.N. Mbugua, M.M. Wanyoike, J.M.Z. Kamau and S.J.M. Munyua. 1998. Performance of dairy animals under two zero grazing systems in Kiambu and Nyandarua districts. *The Kenya Veterinarian* 23:180-182 – **1998**
19. Kinuthia, M.N., J.W. Wakhungu, M.M. Wanyoike and C.K. Gachuiiri. 1998. Milk production performance of dairy goat crosses on smallholdings in central Kenya. *The Kenya Veterinarian* 23:196-198. – **1998**
20. Gachuiiri, C.K., R.G. Wahome, P.N. Mbugua, M.M. Wanyoike, J.M.Z. Kamau and S.J.M. Munyua. 1998. Performance of dairy animals under two zero grazing systems in Kiambu and Nyandarua districts. *The Kenya Veterinarian* 23:180-182 – **1998**
21. Gachuiiri, C.K., R.G. Wahome, P.N. Mbugua, M.M. Wanyoike, J.M.Z. Kamau and S.J.M. Munyua. 1998. Performance of dairy animals under two zero grazing systems in Kiambu and Nyandarua districts. *The Kenya Veterinarian* 23:180-182 - **1998**
22. Osolo, K.N., Kinuthia J. N., Gachuiiri C. K., Okeyo A. M., Wanyoike and M. Okomo (2001). Plant species abundance and forage selection by goats in the semi-arid lands of East-Central Kenya. www.fao.org/wairdocs/ilri/x5473b/x5473b21.htm
23. M.M. Wanyoike and R.G. Wahome, (2004). Research and Development of Cattle Production Systems. *In: Cattle Production in Kenya-Strategies for planning and implementation, K.A.R.I., Nairobi. ISBN: 9966-879-57-9, pp85-133*
24. S.G. Kuria, M.M. Wanyoike, C.K. Gachuiiri sand R.G. Wahome, (2004). Indigenous camel mineral supplementation knowledge and practices on Manyatta based camel herds by the Rendille pastoralists of Marsabit district, Kenya. *Livestock Research for Rural Development* 16 (7) 2004.
25. Kuria S. G., R.G. Wahome, C.K. Gachuiiri and M.M. Wanyoike, (2004). Evaluation of forages as mineral sources for camels in Western Marsabit, Kenya. *South African Journal of Animal Science* 2004, 34 (3):180-188.

26. Kuria S.G., C.K. Gachuiiri, M.M. Wanyoike and R.G. Wahome, (2004). Effect of mineral supplementation on milk yield and calf growth of camels in Marsabit district, Kenya. *Journal of camel practice and Research* 11 (2):87-96.
27. Kuria S.G., M.M. Wanyoike, C.K. Gachuiiri and R.G. Wahome, (2005). Nutritive value of important range forage species for camels in the Rendille area of Marsabit district, Kenya. *Tropical and Subtropical Agro-Ecosystems* 5:14- 24 -2005.
28. Mwendia S. W., Wanyoike M. M., Wahome R. G. W. and Mwangi D. N. (2006). Farmers' perceptions on importance and constraints facing Napier grass production in Central Kenya. www.lrrd.org/lrrd18/11/mwen18160.htm
29. Kuria S. G., Wanyoike M. M., Gachuiiri C. K. G. and Wahome R. G. W. (2006). Effect of mineral supplementation on plasma minerals concentration of camels (*Camelus dromedaries*) in Kenya. *Int. J. Agric. Biol.* 8:168-171
30. Mwendia S. W., Wanyoike M. M., Wahome R. G. W. and Mwangi D. N. (2007). Effect of napier head smut disease on napier yields and disease coping strategies in farming systems in Central Kenya. www.lrrd.org/lrrd19/8/mwen19109.htm
31. Kuria S. G., R G. Wahome, C K. Gachuiiri, M M. Wanyoike and J N. Mwangi. (2007) Use of linear body measurements in estimating live weight of camel (*Camelus dromedaries*) in Kenya. *Journal of Camel Practice and Research* 14(1): 21-25
32. M Syomiti, M Wanyoike*, R G Wahome* and J K N Kuria 2010. *In sacco* probiotic properties of effective microorganisms (EM) in forage degradability. *Livestock Research for Rural Development* 22(1) 2010 (www.lrrd.org/lrrd22/1/syom22008.htm)
33. M Syomiti, M Wanyoike*, R G Wahome* and J K N Kuria 2011. The status of maize stover utilization as feed for livestock in Kiambu and Thika districts of Kenya: Constraints and Opportunities. *SA Journal of Animal Science* 4(1): 8-13.

Publications in Scientific Workshops Proceedings

1. Kayongo, S.B., Wanyoike, M.M., and H. Kayongo-Male. (1984). The effects of Pre- and Post-partum Concentrate Supplementation on Productivity of Small East African Goats Grazed on Range. *Bull. Animal Health Production Afr.* 32:31.
2. Okeyo, M.A., Wanyoike, M.M., Gichuru W. Ruvuna F., Cartwright, T., Wachira, J.D. (1985). Comparison of Edible Meat Yields Among Different Goat Breeds and Crosses. *Proceedings Small Ruminant CRSP workshop, Kenya.*
3. Okeyo, M.A., Kayongo-Male, H., Ruvuna, F., Wanyoike, M.M. Cartwright, T., and Lumiti (1985). Feeding and Behaviors Patterns of Different Goat Breeds at Ol Magogo. *Proceeding of Small Ruminant CRSP Workshop, Kenya.*
4. Abate, A., Kayongo-Male, H., Wanyoike, M.M. (1985). Fodder for High Potential Areas in Kenya. *Proceedings of a PANESA Workshop held in Nairobi, Kenya. 11-15 November, 1985.*
5. Okeyo, A.M., M. Wanyoike, F. Ruvuna, W.N. Gichuru, T.C. Cartwright and J.D. Wachira 1985. Comparison of edible meat yield among different goat breeds and crosses at Naivasha. *Proc. 4th SR-CRSP Kenya Workshop. Held at Kabete Nairobi, Kenya, pp. 78-82.*
6. A.N. Said and M. Wanyoike (1986). The Prospects of Utilizing Urea Treated Maize Stover by Smallholders in Kenya – What Other Feed Alternatives. Paper presented at the ARNAB Workshop on Utilization of agriculture By-products as Livestock Feeds in Africa held in Blantyre, Malawi in September, 1986.
7. Abate, A., M. Wanyoike and A.N. Said (1987). Milk Production Under Integrated Farming Systems in Kenya. *Proceedings of IDF Seminar Held in Nairobi, Kenya 9-13 March, 1987.*

8. Kariuki, J.N., M.M. Wanyoike and A. Abate (1988). Effect of age on Yield, in Vitro Dry Matter Digestibility, Leaf; Stem Ratio and Percent Dry Matter of Two Napier Grass (*Pennisetum purpureum*) cultivars. Proceedings of Animal Production Society of Kenya (APSK) Regional Conference held in Nairobi, Kenya. 23-25 November, 1988.
9. Wanyoike, M.M., A.M. Okeyo, F. Ruvuna, C.O. Ahuya and T.C. Cartwright (1989). Comparative Carcass Yields and Components of Different Goat Breed Groups. Paper presented at the SR-CRSP/APSK Workshop held in Nairobi, Kenya. 22-23, February, 1989.
10. Nyakalo, S., M.S. Badamana and M. Wanyoike (1989). The Effect of Increasing Chicken Manure Levels in Supplemental Diets for Lactating Galla Goats on Milk Production. Paper presented at the SR-CRSP/APSK Workshop held in Nairobi, Kenya. 22-23 February 1989.
11. Onyango, T.A. and M.M. Wanyoike (1989). Sorghum and Millet: Their Potential as Forage crops. Paper presented at the National Workshop on Sorghum and Millet Food System in Kenya at the K.I.A. Conference Centre, Nairobi, 10th –12th April, 1989.
12. Badamana, M.S. and M.M. Wanyoike (1989). The Potential of Non-conventional Feeds in Dairy Units. Paper presented at the Kenya Veterinary Association Conference held at Muguga, Kenya on 19th-21st April, 1989.
13. Wanyoike, M.M., J.B. Ochuonyo and H. Cheruiyot (1989). State of the Art of Cattle Milk and Meat Production in Kenya. Paper presented at the Consultative Workshop on Collaborative Cattle Milk and Meat Research in East and Southern Africa held at Kadoma,. Zimbabwe 12th-15th June, 1989.
14. Abate, A, M.M. Wanyoike, M.S., Badamana and A.N. Abate (1989) towards Improving Animal Production in the Rangelands of Kenya. Paper presented at the XVIth International Grassland Congress, Nice France, 4th-11th 1989.

15. Nyakalo, S., M.S. Badamana and M.M. Wanyoike (1989). The effect of inclusion of poultry litter in a supplement on Diet Composition, Voluntary intake and digestibility in lactating Galla goats. Paper presented at the APSK symposium held at the Wildlife and fisheries Training Institute Naivasha 30th November – 1st December, 1989.
16. Nyakalo, S., M.S. Badamana and M.M. Wanyoike (1990). Milk production and kid performance of Galla Goats supplemented with Poultry waste. In the Proceedings of the 8th SR-CRSP Scientific Workshop, Nairobi, Kenya 7th –8th March, 1990.pp. 221-231.
17. Badamana, M.S., A.N. Said, M.M. Wanyoike and A. Abate (1990). Improving ruminant livestock production in sedentary smallholder farming systems in Kenya. Paper presented at the 1st Pan-Commonwealth Veterinary Conference held in Harare, Zimbabwe 10th-14th September, 1990.
18. Mwendia, C.M.T., M.M. Wanyoike and P.N. Mbugua (1990). Effect of Beta-carotene supplementation on the fertility of dairy cattle in Kenya. Paper presented at the Animal Production Society of Kenya symposium held from 1st-2nd November, 1990 at Egerton University, Njoro, Kenya.
19. Kayongo, S.B. and M.M. Wanyoike (1990). Recycling poultry waste as a supplement for ruminants. Paper presented at the 17th Annual Scientific meeting of the Tanzania Society of Animal Production held in Arusha, Tanzania, 25th-27th September, 1990.
20. Wanyoike, M.M. (1990). Milk production systems in Kenya. Paper presented at a Regional Workshop on Assessment of Animal Agriculture in sub-Saharan Africa, Eastern and Southern Africa November, 28th-0th, 1990, ILRAD, Nairobi, Kenya,
21. Nyakalo, S., M.S. Badamana and M.M. Wanyoike, (1991). Methods of measuring milk yield from Galla goats. In: Proceedings of the 9th SR-CRSP Scientific workshop held in Nairobi, Kenya, pp. 131-136.

22. Wanyoike, M.M., (1991). Issues on Livestock Research with emphasis on Nutrition in sub-Saharan Africa. Paper presented at the 1991 Summer Institute for African Agricultural Research at the University of Wisconsin, Madison.
23. Kayongo, S.B., Wanyoike, M.M., Nyagah, P.N., Maitho, T.E. and Mbugua, P.N. (1991). The complementary role of caged layer waste as a nitrogen source in crop residues utilization. Proceedings of the PANESA/ARNAB joint workshop, Gaborone, Botswana, 4th-8th March, 1991.
24. Wanyoike, M.M., (1992). Animal Science Research in Africa. Paper presented at the 1992 Summer Institute for African Agricultural Research at the University of Wisconsin, Madison, U.S.A.
25. Okeyo, A.M., Inyangala, B.A.O., Githigia, S.M., Munyua, S.J.M., Wanyoike, M.M., Gachui, C.K. and Okomo M. (1994). Reproductive Performance and level of gastrointestinal parasite infestation in Goats on-farm and on-station at Machanga's, Embu, Kenya. Proceedings of the Third Biennial Conference on the African Small Ruminant Research Network, UICC Kampala, Uganda.
26. Osolo, N.K., Kinuthia, J.N., Gachui, C.K., Okeyo, A.M., Wanyoike, M.M. and Okomo, M. (1994). Species abundance, preference and nutritive value of goat diets in the semi-arid lands of East Central Kenya. Proceedings of the Third Biennial Conference on the African Small Ruminant Research Network, UICC Kampala Uganda 5th-9th December, 1994.
27. Mbugua, P.N., Gachui, C.K., Wahome R.G., Abate, A.A., Wanyoike, M.M., Munyua, S.J.M. and Kamau, J.M.Z. 1995. Development of feed supplementation strategies for improving productivity of dairy cattle in Kenya. – **Paper presented at the IAEA meeting, Rabat, Morocco**
28. Githigia, S.M., M.A. Okomo, B.O. Inyangala, M. Okeyo, M.M. Wanyoike, S.T. Munyua, S.M. Thamsborg and N.C. Kyvsgaard 1995. Economically impotent diseases of goats in a semi-arid area of Kenya. Proceedings of the 8th International Conference of Institutions of Tropical Veterinary Medicine, Berlin, Germany 25th-27th September, 1995 (Poster presentation).

29. Githigia, S.M., M.A. Okomo, B.O. Inyangala, M. Okeyo, M.M. Wanyoike, S.T. Munyua, S.M. Thamsborg and N.C. Kyvsgaard (1995). Proc. Of the 17thh Symposium of the Scandinavian Society of Parasitology, Finland 15-17th June, 1995. (Bulletin of the Scandinavian Society for Parasitology).
30. Okeyo, A.M., B.A.O. Inyangala, S.M. Githigia, S.J.M. Munyua, C.K. Gachuri, M.M. Wanyoike and M.A. Okomo, (1996). Genetic studies of Galla and E.A. Goats and their correlated growth and reproductive performance under different nutritional levels and Haemonchus challenge. Prof. 4th Biennial Conference of the East African Small Ruminant Research Network, 9-13th December, 1996. KEI Addis Ababa, Ethiopia.
31. Kinuthia, M.N., Wanyoike, M.M. , Gachuri, C.K. and Wakhungu, J.W. (1998). Milk production performance of dairy goat crosses on smallholder farms in Central Kenya. **In:** Proceedings of the Biennial Scientific Conference of the Faculty of Veterinary Medicine, University of Nairobi, Kenya. Pp 196-198.
32. M.M. Wanyoike, R.G. Wahome and S.G. Mbogoh, (2005). Issues constraining Production, processing and marketing of dairy and other livestock products. Paper presented at the “National Conference on Revitalising the Agricultural sector for Economic Growth” held at Safari Park Hotel – Nairobi, 20th – 24th February, 2005.
33. Serem, J., Mailu, S., Wanyoike, M.M., Mwanza, R., Gachuri, C.K., Borter D.K., Gathumbi, P. K., Karuri E.G., Kiarie N. and Lwoyero, J. Characterisation of rabbit production systems in Kenya. Proceedings of Annual Scientific Symposium of the Animal Production Society of Kenya held in Nyeri on 11th-13th April, 2012.

ACADEMIC REFEREES:

1. Prof. J- M. Gathuma

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2. Prof. P.N. Mbugua

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