

# AUGUSTINE ABIOYE AYANTUNDE

MAILING ADDRESS: ILRI, 01 BP 1496 Ouagadougou 01, Burkina Faso; email:  
[a.ayantunde@cgiar.org](mailto:a.ayantunde@cgiar.org); Tel: +226 25333310 (office);

## EDUCATIONAL BACKGROUND

- **Ph.D.**, University of Wageningen, The Netherlands. November 1994 to December 1998. Specialisation: Ruminant nutrition/Range management.
- **MSc.** (with distinction), University of Wageningen, The Netherlands. September 1992 to January 1994. Specialisation: Tropical animal production.
- **BSc.**, Obafemi Awolowo University, Ile-Ife, Nigeria. September 1984 to June 1989. Major: Animal Science.

## WORK EXPERIENCE

- **Principal scientist**, Livestock systems and environment, July 2015 till present, with International Livestock Research Institute (ILRI), based in Ouagadougou, Burkina Faso. My tasks include:
  - Participatory testing and evaluation of livestock-related options for sustainable agricultural intensification in West Africa.
  - Participatory research on animal feeding systems to improve meat and milk output and the cycling of nutrients in crop-livestock farming systems.
  - Evaluation and monitoring of natural resource use in pastoral and agro-pastoral systems.
  - Lead proposal development and resource mobilization.
  - Management of different bilateral projects
  - Supervision of staff (postdocs, local staff and PhD students).
- **Senior animal scientist**, January 2010 till June 2015, with International Livestock Research Institute (ILRI), based at ICRISAT station in Bamako, Mali. Due to the security and political problem in Mali, I relocated to Ouagadougou, Burkina Faso, where ILRI now has its regional office. My tasks include the following:
  - Participatory research on animal feeding systems to improve meat and milk output and the cycling of nutrients in crop-livestock farming systems.

- Participatory research to improve feed production from diverse sources and improve the natural resource base.
  - Evaluation and monitoring of natural resource use in pastoral and agro-pastoral systems.
  - Participatory design, testing and monitoring of on-farm livestock related interventions to enhance adaptive capacity of smallholder farmers to climate change.
  - Analysis of local institutions governing natural resource management.
  - Management of different bilateral projects
  - Supervision of staff (postdocs, NRS and PhD students)
  - Contribute to proposal development and resource mobilization.
- **Animal scientist**, September 2003 to December 2009, International Livestock research Institute (ILRI), based at ICRISAT Niamey, Niger (Sept 2003 to Dec 2007) and ICRISAT Bamako, Mali (Jan 2008 to Dec 2009). My tasks include the following:
    - Evaluation of feed resources in West African Sahel.
    - Participatory testing and evaluation of livestock-related options for sustainable agricultural intensification in West Africa.
    - Evaluation and monitoring of natural resource use in pastoral and agro-pastoral systems.
    - Assessment of vulnerability of pastoral and agro-pastoral systems
    - Participatory analysis of pastoral and agro-pastoral systems including adaptation to climate change.
    - Documentation of indigenous ecological knowledge.
    - Supervision of NRS and students

Under the above research activities, I have supervised and co-supervised many MSc students, 3 PhD students, and 2 postdoctoral fellows.

In terms of **project management**, I have coordinated a number of projects and presently responsible a number of on-going of three projects.

- Lead Principal investigator, Feed the Future Sustainable Intensification Innovation Lab sub-award on “Sustainable intensification through better integration of crop and livestock production systems for improved food security and environmental benefits in Sahelian

zone of Burkina Faso”; October 2015 – September 2019. The project is being implemented in Burkina Faso.

- Project leader, “Realizing the full biomass potential of mixed crop-livestock systems in rapidly changing Sahelian agro-ecological landscapes” (CRP WLE competitive grant); January 2015 – December 2016. The project covers Burkina Faso and Niger.
- ILRI Focal person for the project, “Building climate smart farming systems through integrated water storage and crop-livestock interventions” (IWMI-led CCAFS project). January 2015 to December 2018. The project covers Burkina Faso and Mali.
- ILRI Focal person for the project, “Managing water and food systems in the Volta - Niger basins” (IWMI-led project funded by EC-IFAD). August 2014 to December 2016. The project covers Burkina Faso and Ghana.
- ILRI focal person for the USAID Feed the Future Africa RISING project in West Africa led by IITA. June 2012 to December 2016. The project covers Ghana and Mali.
- Project leader, CGIAR Challenge Program on Water and Food project on integrated management of rainwater in crop-livestock agro-ecosystems of Volta basin (October 2010 – Dec 2013; Grant amount: 1.25 million USD). The project covered the Volta basin of Burkina Faso and Ghana.
- ILRI principal investigator for the Farming systems projects being funded by Australian Aid (AusAID) in partnership with West and Central Africa Council for Agricultural Research and Development (CORAF) (April 2011 – December 2013). The farming system projects are four and activities were carried out in Benin, Burkina Faso, Cameroon, Ghana, Niger, Mali and Senegal.
- Outcome leader on natural resource management for Global Environment Facility – African Development Bank funded project on Sustainable management of globally significant endemic ruminant livestock of West Africa (2008 - 20013; GEF grant for the project: 10 million USD). The project concerns mixed crop-livestock systems in sub-humid zone of Gambia, Guinea, Mali and Senegal.
- Project coordinator, CGIAR Systemwide Livestock Programme (SLP) funded project on reducing vulnerability of pastoral and agro-pastoral systems to climate change in East and West Africa (2007 – 2009; Grant amount: 350,000 USD). The project activities were carried out in Niger and Kenya.

- Principal Investigator, USAID Linkage program research on participatory conflict management for improved livestock productivity and sustainable natural resource use in West Africa (2004 – 2005; Grant amount: 100,000 USD). The project activities were carried out in Niger.
- **Independent Consultant**, September 2000 to August 2003. I conducted consultancy for International Livestock Research Institute (ILRI), Addis Ababa, Ethiopia and for a charitable Christian organization in Eindhoven, The Netherlands. Consultancy activities included editorial review of scientific papers, leadership training, preparation of training manuals, and counseling.
- **Postdoctoral Fellow**, March 1999 to June 2000, with Institute for Animal Science and Health (ID-Lelystad), P.O. Box 65, 8200 AB Lelystad, The Netherlands. I worked on the development of animal module of model on nutrient management in mixed crop-livestock production systems in the tropics. This was within a North-South project on nutrient monitoring in African farming systems (NUTMON). I also conducted a desk study on the fertilizer value of animal manure and contributed to the group research report.
- **Graduate Fellow**, November 1994 to November 1997, with International Livestock Research Institute (ILRI), B.P. 12404, Niamey, Niger Republic. I carried out research on the influence of grazing regimes on nutrition of cattle in Sahelian rangelands, the short-term effects of grazing by cattle on vegetation, monitored the feeding behaviour of cattle and conducted survey on the indigenous grazing management. I also contributed to the annual research report and journal articles of the institute.
- **Field assistant (Zootechnic)**, December 1990 to August 1992, with West African Dwarf Goat project, Department of Animal Science, Obafemi Awolowo University, Ile-Ife, Nigeria. I conducted survey on goat nutrition in project villages, collected and analysed samples of feeds fed to goats, participated in the ecto-parasitic treatment of goats and browse survey, and contributed to the project reports.

## **PUBLICATIONS**

### **Theses**

Ayantunde, A.A. 1998. Influence of grazing regimes on cattle nutrition and performance and vegetation dynamics in Sahelian rangelands. *Ph.D Thesis*, University of Wageningen, Wageningen, The Netherlands.

Ayantunde, A.A. 1994. Design and validation of a simulation model for small ruminants in smallholder livestock systems. *MSc. Thesis*, Agricultural University, Wageningen, The Netherlands.

Ayantunde, A.A. 1989. The effect of replacing *Leucaena leucocephala* with palm leaves on feed intake and digestibility by West African dwarf goats. *BSc. Thesis*, Department of Animal Science, Obafemi Awolowo University, Ile-Ife, Nigeria.

### **Refereed journals**

Amole, T.A and Ayantunde, A.A. 2016. Assessment of existing and potential feed resources for improving livestock productivity in Niger. *International Journal of Agricultural Research* 11:40-55.

Umutoni, C., Ayantunde, A., Turner, M. and Sawadogo, G.J. 2016. Community Participation in Decentralized Management of Natural Resources in the Southern Region of Mali. *Environment and Natural Resources Research*; Vol. 6 (2).

Amole, T.A and Ayantunde, A.A. 2016. Improving livestock productivity: Assessment of feed resources and livestock management practices in Sudan-Savanna zones of West Africa. *African Journal of Agricultural Research* 11 (5):422-440.

Turner, M.D., Butt, B., Singh, A., Brottem, L., Ayantunde, A. and Gerard, B. 2016. Variation in vegetation cover and livestock mobility needs in Sahelian West Africa. *Journal of Land Use Science* 11 (1):76-95. DOI 10.1080/1747423X.2014.965280

Panyan, E.K., Karbo, N., Avornyo, F.K., Ayantunde, A., Kizito, F., and Tengan, K.2015. Rainwater management and soil improvement techniques in maize soy bean intercrop. *African Journal of Applied Research* 2 (2):6-18.

Ayantunde, A.A., Turner, M.D. and Kalilou, A. 2015. Participatory analysis of vulnerability to drought in three agro-pastoral communities in the West African Sahel. *Pastoralism: Research, Policy and Practice*, 5:13. DOI 10.1186/s13570-015-0033-x.

Umutoni, C., Ayantunde, A., and Sawadogo, G.J. 2015. Evaluation of feed resources in mixed crop-livestock systems in Sudano-Sahelian zone of Mali in West Africa. *International Journal of Livestock Research*, 5 (8):27-36. DOI: 10.5455/ijlr.20150813090546.

Franklin, K.A., Ayantunde, A., Shaibu, M., Konlan, S. and Karbo, N. 2015. The effect of feed and

- health packages on the performance of village small ruminants in northern Ghana. *International Journal of Livestock Research*, 5 (7):91-98.
- Douxchamps, S., Ayantunde, A., Panyan, E.K., Ouattara, K., Kaboré, A. Karbo, N. and Sawadogo, B. 2015. Agricultural water management and livelihoods in the crop-livestock systems of the Volta Basin. *Water Resources and Rural Development* 6:92-104. DOI:10.1016/j.wrr.2014.10.001
- Ayantunde, A.A, Blummel, M., Grings, E. and Duncan, A.J. 2014. Price and quality of livestock feeds in suburban markets of West Africa's Sahel: Case study from Bamako, Mali. *Revue d'élevage et de médecine vétérinaire des pays tropicaux* 67 (1):13-21.
- Ayantunde, A.A., Asse, R., Said, M.Y. and Fall, A. 2014. Transhumance pastoralism, sustainable management of natural resources and endemic ruminant livestock in the sub-humid zone of West Africa. *Environment, Development and Sustainability* 16:1097-1117.
- Kizito, F., Panyan, E.K., Ayantunde, A., Bossio, D., Karbo, N., Avornyo, F.K. and Tengan. K. 2014. Water Balance Dynamics in Mixed Crop-Livestock Systems of Northern Ghana: Unraveling the Interactions between Farm-Level and Landscape Fluxes in the Face of Climate Change. *American Journal of Climate Change* 3:289-305.
- Turner, M.D., McPeak, J.G. and Ayantunde, A. 2014. The Role of Livestock Mobility in the Livelihood Strategies of Rural Peoples in Semi-Arid West Africa. *Human Ecology* 42:231-247.
- Sabine Douxchamps, S., Ayantunde, A. and Barron, J. 2014. Taking stock of forty years of agricultural water management interventions in smallholder systems of Burkina Faso. *Water Resources and Rural Development* 3:1-13.
- Pasternak, D., Ibrahim, A. and Ayantunde, A. 2012. Evaluation of five pearl millet varieties for yield and forage quality under two planting densities in the Sahel. *African Journal of Agricultural Research* Vol. 7(32), pp. 4526-4535, 21.
- Turner, M.D., Ayantunde, A.A., Patterson, K.P. and Patterson, E.D.2012. Conflict management, decentralization and agropastoralism in Niger. *World Development* 40 (4) 745-757.
- Ayantunde, A.A., de Leeuw, J., Turner, M.D and Said, M. 2011. Challenges of assessing the sustainability of (agro)pastoral systems. *Livestock Science* 139:30-43.
- Turner, M.D., Ayantunde, A.A., Patterson, K.P. and Patterson, E.D.2011. Changing access to resources, social identity, and farmer-herder conflict in Sahelian West Africa. *Journal of Developments Studies* 47 (2):183-206.

- Zaibet, L., Traore, S., Ayantunde, A., Marshall, K., Johnson, N. and Siegmund-Schultze, M. 2011. Livelihood strategy in endemic livestock production systems in sub-humid zone of West Africa: Trends, tradeoffs and implications. *Environment, Development and Sustainability* 13:87-105.
- Abdoukarim, B.E., M'Naouer, D. and Ayantunde, A. 2010. Morphological characterization and breeding system identification of local sheep breeds in Niger. *Advances in Animal Biosciences* 1:414-415.
- Ayantunde, A.A., Hiernaux, P., Briejer, M., Udo, H. and Tabo, R. 2009. Uses of local plant species by agro-pastoralists in South-western Niger. *Ethnobotany Research & Applications* 7: 53-66.
- Hiernaux, P.H.Y., Ayantunde, A., Kalilou, A., Mougin, E., Gerard, B., Baup, F., Grippa, M. and Djaby, B. 2009. Trends in productivity of crops, fallow and rangelands in Southwest Niger: Impact of land use, management and variable rainfall. *Journal of Hydrology* 375: 65-77.
- Ayantunde, A.A., Fernández-Rivera, S. and Dan-Gomma, A. 2008. Sheep fattening with groundnut haulms and millet bran in the West African Sahel. *Revue d'élevage et de médecine vétérinaire des pays tropicaux* 61 (3-4): 215-220.
- Ayantunde, A.A., Briejer, M., Hiernaux, P., Udo, H.M.J. and Tabo, R. 2008. Botanical knowledge and its differentiation by age, gender and ethnicity in South-western Niger. *Human Ecology* 36:881-889.
- Ayantunde, A.A., Fernández-Rivera, S., Hiernaux, P.H., and Tabo, R. 2008. Implications of restricted access to grazing by cattle in wet season in the Sahel. *Journal of Arid Environments* 72:523-533.
- Ayantunde, A.A., Delfosse, P., Fernández-Rivera, S., Gerard, B., and Dan Gomma, A. 2007. Supplementation with groundnut haulms for sheep fattening in the West African Sahel. *Tropical Animal Health and Production* 39:207-216.
- Ayantunde, A.A., Kango, M., Hiernaux, P., Udo, H.M.J. and Tabo, R. 2007. Herders' perceptions on ruminant livestock breeds and breeding management in South-western Niger. *Human Ecology* 35:139-149.
- Ayantunde, A.A., Fernández-Rivera, S., Hiernaux, P.H., van Keulen, H. and Udo, H.M.J. 2002. Day and night grazing by cattle in the Sahel. *Journal of Range Management* 55:144-149.
- Ayantunde, A.A., Fernández-Rivera, S., Hiernaux, P.H.Y., van Keulen, H., Udo, H.M.J. and

- Chanono, M. 2001. Effect of timing and duration of grazing of growing cattle in the West African Sahel on diet selection, faecal output, eating time, forage intake and live-weight changes. *Animal Science* 72:117-128.
- Ayantunde, A.A., Fernández-Rivera, S., Hiernaux, P.H.Y., van Keulen, H., Udo, H.M.J. and Chanono, M. 2000. Effect of nocturnal grazing and supplementation on diet selection, eating time, forage intake and weight changes of cattle. *Animal Science* 71: 333-340.
- Ayantunde, A.A., Williams, T.O., Udo, H.M.J., Fernández-Rivera, S., Hiernaux, P. and van Keulen, H. 2000. Herders' perceptions, practice, and problems of night grazing in the Sahel: Case studies from Niger. *Human Ecology* 28: 109-129.
- Ayantunde, A.A., Hiernaux, P., Fernández-Rivera, S., van Keulen, H. and Udo, H.M.J. 1999. Selective grazing by cattle on spatially and seasonally heterogeneous rangeland in Sahel. *Journal of Arid Environments* 42: 261-279.
- Ayantunde, A.A., Fernández-Rivera, S. and Chanono, M. 1998. Nocturnal grazing and supplementation effects on forage intake and weight changes of cattle. *Journal of Animal Science* 76 (supplement 1): 355 and *Journal of Dairy Science* 81 (supplement 1): 355 (abstr.).
- Bosman, H.G., Ayantunde, A.A., Steenstra, F.A. and Udo, H.M.J. 1997. A simulation model to assess productivity of goat production in the tropics. *Agricultural Systems* 54:539-576.
- Ayantunde, A.A., Fernández-Rivera, S., Hiernaux, P.H.Y. and Chanono, M. 1997. Effect of timing and duration of grazing on diet selection and performance of cattle. *Journal of Animal Science* 75 (supplement 1): 273 (abstr.).
- Fernández-Rivera, S., Ayantunde, A., Hiernaux, P.H.Y. and Turner, M. 1996. Nocturnal grazing effects on the nutrition of cattle. *Journal of Animal Science* 74 (supplement 1): 200 (abstr.).

### **Books, Book chapters and Proceedings**

- Zaibet L, Traoré S, Ayantunde A, Marshall K, Johnson N, Siegmund-Schultze M (2009) Livelihood strategies in endemic livestock production systems: Trends, tradeoffs and implications. Paper presented at the 30th Conference of the International Scientific Council for Trypanosomosis Research and Control, AU/DREA, Entebbe-Uganda, 21-25 September 2009 (conference proceedings).
- Sere, C., Ayantunde, A., Duncan, A., Freeman, A., Herrero, M., Tarawali, S. and Wright, I. 2008.



Livestock production and poverty alleviation – challenges and opportunities in arid and semi-arid tropical rangeland based systems. Proceedings of the International Grassland Conference and the International Rangeland Congress, 29 June – 5 July, 2008, Hohhot, China. Volume 1, page 19-26.

Tabo R., Koala S., van Rooyen A., Ayantunde A., Bationo A. and Sessay M (editors). 2006.

Combating Desertification and increasing Biodiversity: Best bet technologies adopted in DMP member countries. International Crops Research Institute for the Semi-Arid Tropics (ICRISAT), Patancheru, India. 78pp.

Turner M.D., Ayantunde A.A., Patterson E.D. and Patterson, K.P. 2006. Farmer-herder relation and conflict management in agro-pastoral zone of Niger. Paper presented at International Conference on the Future of Transhumance Pastoralism in West and Central Africa. 21-25 November, 2006, Abuja, Nigeria. National Animal Production Research Institute, Ahmadu Bello University, Zaria, Nigeria.

Ayantunde, A.A., Fernández-Rivera, S. and McCrabb, G. (editors) 2005. *Coping with Feed Scarcity in Smallholder Livestock Systems in Developing Countries*. Animal Sciences Group, UR, Wageningen, The Netherlands, University of Reading, Reading, UK, Swiss Federal Institute of Technology, Zurich, Switzerland and International Livestock Research Institute. Nairobi, Kenya. 307 pp.

Bannink, A., Ayantunde, A.A. and van Vuuren, A.M. 2005. Validity of feed evaluation systems under feed scarcity. In: A.A. Ayantunde, S. Fernández-Rivera and G. McCrabb (eds.) *Coping with Feed Scarcity in Smallholder Livestock Systems in Developing Countries*. Proceedings of the international workshop on feed resources and undernutrition in livestock, 14-17 June 1999, International Livestock Research Institute, Addis Ababa, Ethiopia. pp. 264 – 276.

Fernández-Rivera, S., Hiernaux, P.H., Williams, T.O., Turner, M.D., Schlecht, E., Salla, A., Ayantunde A.A. and Sangaré, M. 2005. Nutritional constraints to grazing ruminants in the millet-cowpea-livestock farming system of the Sahel. In: A.A. Ayantunde, S. Fernández-Rivera and G. McCrabb (eds.) *Coping with Feed Scarcity in Smallholder Livestock Systems in Developing Countries*. Proceedings of the international workshop on Feed resources and undernutrition in livestock, 14-17 June 1999, International Livestock Research Institute, Addis Ababa, Ethiopia. pp. 157 – 182.

Ayantunde, A.A., Fernández-Rivera, S., Hiernaux, P., van Keulen, H. and Udo, H.M.J. 1999.

Forage intake and feeding behaviour of day and/ or night grazing cattle in Sahelian rangelands. In *Regulation of feed intake* (eds. D. van der Heide, E.A. Huisman, E. Kanis, J.W.M. Osse and M.W.A. Verstegen), Proceedings of the 5<sup>th</sup> Zodiac Symposium, 22-24 April 1998, Wageningen, The Netherlands. CAB International, Wallingford, UK. pp. 197-202.

Hiernaux, P., Ayantunde, A., de Leeuw, P., Fernández-Rivera, S., Sangaré, M. and Schlecht, E.

1999. Foraging efficiency, stocking rates, grazing pressure and livestock weight changes in the Sahel. In *People and Rangelands Building the Future* (eds. D. Eldridge and D. Freudenberger), Proceedings of the VI International Rangeland Congress, 19 – 23 July 1999, Townsville, Australia. pp. 511-512.

### **Reports, briefs and non-refereed journals**

Konlan, S.P., Ayantunde, A.A., Weseh, A., Dei, H.K. and Avornyo, F.K. 2015. Opportunities and challenges of emerging livestock feed markets in northern Ghana. Africa RISING Project Technical report, February 2015. International Livestock Research Institute, Nairobi, Kenya.

<https://cgspace.cgiar.org/handle/10568/67183>

Amole, T., Zijlstra, M., Descheemaeker, K. and Ayantunde, A.A. 2014. Simulation of small ruminant system productivity in the humid tropics of southwestern Nigeria. ILRI Project Report. Nairobi, Kenya: International Livestock Research Institute (ILRI).

<http://hdl.handle.net/10568/67773>

Konlan, S.P., Ayantunde, A.A., Dei, H.K. and Avornyo, F.K. 2014. Evaluation of existing and potential feed resources for ruminant production in northern Ghana. Africa RISING Project Technical report, September 2014. International Livestock Research Institute, Nairobi, Kenya. <https://cgspace.cgiar.org/handle/10568/42338>

Umutoni, C. and Ayantunde, A.A. 2014. Evaluation of feed resources in mixed crop-livestock systems in the Sudano-Sahelian zone of Mali. Africa RISING Project Technical report, May 2014. International Livestock Research Institute, Nairobi, Kenya.

<https://cgspace.cgiar.org/handle/10568/42337>

Amole, T.A. and Ayantunde, A.A. 2014. Assessment of existing and potential feed resources to improve livestock productivity in dryland areas of Niger. ILRI Project Report. Nairobi, Kenya: ILRI. <https://cgspace.cgiar.org/handle/10568/59825>

- Amole, T.A. and Ayantunde, A.A. 2014. Assessment of existing and potential feed resources to improve livestock productivity in the dryland areas of Burkina Faso. ILRI Project Report. Nairobi, Kenya: ILRI. <https://cgspace.cgiar.org/handle/10568/59823>
- Ayantunde, A., Said M and Fall, A. 2012. Assessment of social processes in relations to natural resource management interventions in sub-humid zone of West Africa. Research Report, International Livestock Research Institute (ILRI), Nairobi, Kenya. 24 pages.
- Douxchamps, S., Ayantunde, A. and Barron, J., 2012. Evolution of Agricultural Water Management in Rainfed Crop-Livestock Systems of the Volta Basin. Colombo, Sri Lanka: CGIAR Challenge Program for Water and Food (CPWF). 74p. (CPWF R4D Working Paper Series 04).
- Ayantunde, A., Asse, R., Said, M., and Fall, A. 2011. Transhumance and endemic ruminant livestock in sub-humid zone of West Africa. Policy Brief, International Livestock Research Institute (ILRI), Nairobi, Kenya. 7 pages.
- Ayantunde, A., Asse, R., Fall, A. and Said, M. 2010. Transhumance and endemic ruminant livestock in sub-humid zone of West Africa – contexts, concepts and challenges. *A synthesis report for GEF – AfDB funded project “Sustainable management of globally significant endemic ruminant livestock of West Africa*. International Livestock Research Institute (ILRI), Nairobi, Kenya. 62 pages.
- Ayantunde, A.A., Said, M. and Turner, M. 2009. Identifying livestock-based risk management and coping options to reduce vulnerability to droughts in agro-pastoral and pastoral systems in East and West Africa. Final Project Report submitted to Systemwide Livestock Programme (SLP).
- Ayantunde, A.A., Asse, R. and Djilgal, N. 2009. Indicators for natural resources in Nianija, The Gambia. Report of community workshop on review and update of indicators for critical natural resources in Nianija, Gambia under the project “Sustainable management of globally significant endemic ruminant livestock of West Africa”.
- Ayantunde, A.A., Asse, R. and Djilgal, N. 2009. Indicators for natural resources in Bandafassi, Senegal. Report of community workshop on review and update of indicators for critical natural resources in Bandafassi, Senegal under the project “Sustainable management of globally significant endemic ruminant livestock of West Africa”.
- Ayantunde, A.A., Asse, R. and Djilgal, N. 2009. Indicators for natural resources in Garalo, Mali.

Report of community workshop on review and update of indicators for critical natural resources in Garalo, Mali under the project “Sustainable management of globally significant endemic ruminant livestock of West Africa”.

- Ayantunde A.A. and Kalilou A. 2008. Participatory vulnerability analysis in agro-pastoral communities in Niger. A report of community workshop on participatory assessment of vulnerability in three agro-pastoral communities in Niger.
- Lesnoff, M., Saley, M., Adamou, K., N'Djaffa, H., Ayantunde, A. and Gerard, B. 2008. 12mo: Une méthodologie rétrospective pour l'estimation des paramètres démographiques des cheptels de ruminants domestiques tropicaux. CIRAD (Centre de coopération internationale en recherche agronomique pour le développement), ILRI (International Livestock Research Institute).
- Lesnoff, M.; Saley, M.; Adamou, K.; N'Djafa Ouga, H.; Ayantunde, A.; Gerard, B. 2008. French Agricultural Research Centre for International Development, Montpellier (CIRAD), Cedex, ILRI, Nairobi (Kenya). 2008. 12 Mo. A retrospective method for estimating demographic parameters in tropical ruminant livestock population. Version 3.1. ILRI Manuals and Guides. no. 3. 53p. Montpellier, Cedex (France): CIRAD.
- Ayantunde, A.A. and Breijer, M. 2007. Indigenous ecological knowledge and biodiversity conservation: A case study from south-western Niger. International Livestock Research Institute (ILRI) report. 69 pp.
- Turner M.D., Ayantunde A.A., Patterson E.D. and Patterson, K.P. Conflict management for improved livestock productivity and sustainable natural resource use in Niger, West Africa. International Livestock Research Institute (ILRI) report. 97 pp.
- Hieraux, P. and Ayantunde, A. 2004. The Fakara: a semi-arid agro-ecosystem under stress. Report of research activities of International Livestock Research Institute (ILRI) in Fakara, South-western Niger, between 1994 and 2002, submitted to Desert Margins Program, ICRISAT Niamey, Niger, 95 pp.
- Ayantunde, A.A., Bannink, A., Hindle, V.A., ten Berg, H.F.M., van Evert, F.K. and van Vuuren, A.M. 1999. Nutrient management in topical agro-ecosystems with emphasis on livestock. Report ID-Lelystad no. 99.074, Institute for Animal Science and Health (ID-Lelystad), Lelystad, The Netherlands.
- Bannink, A., Ayantunde, A.A. and van Vuuren, A.M. 1999. Coping with feed scarcity and

undernutrition. In Outcome and Perspectives of Collaborative Research (eds. J.H.A. de Gooijer and R.W. Paling), Programme and Abstracts of the 10<sup>th</sup> Symposium on Tropical Animal Health and Production, 5 November 1999, Faculty of Veterinary Medicine, Utrecht University, The Netherlands. pp. 39-44.

Ayantunde, A.A., Mutagwaba, T.J.N., Prea, L.P.C., Truong, T.C. and Tissera, W.N.I. 1993. Goat production systems in humid zones of Nigeria and Indonesia: Current positions, differences and perspectives. *Livestock Newsletter* 4:26-33.

Bosman, H.G., Ayeni, A.O. and Ayantunde, A.A. 1993. Goat feeding practices in S.W. Nigeria: Results of an In-Depth survey in six villages. *Technical report no. 10*, West African Dwarf Goat project, Obafemi Awolowo University, Ile-Ife, Nigeria, and Agricultural University, Wageningen, The Netherlands.

### **Journal Review**

I have been reviewing manuscripts for a number of international journals:

**Animal** (an international journal of animal bioscience) – since 2010

**Agricultural Systems** – since 2005

**Human Ecology** – since 2007

**Journal of Arid Environments** – since 2007

**Outlook on Agriculture** – Since 2015