



Tropentag, September 18-21, 2016, Vienna, Austria

“Solidarity in a competing world —
fair use of resources”

Influencing Factors for Adoption of Forage Technologies in Smallholder Dairy Systems in Lushoto, Tanzania

HYCENTH TIM NDAH^{1,2}, JOHANNES SCHULER², BIRTHE PAUL³, BEATUS NZOGELA³, WALTER E.
MANGESHO⁴, JULIUS BWIRE⁴

¹*University of Hohenheim, Inst. of Social Sciences in Agriculture, Germany*

²*Leibniz Centre for Agricultural Landscape Research (ZALF), Inst. of Socio-Economics, Germany*

³*International Center for Tropical Agriculture (CIAT), Tropical Forages Program, Kenya*

⁴*Tanzania Livestock Research Institute (TALIRI), Tanzania*

Abstract

The lack of sufficient quantity and quality of livestock feed on a consistent basis is often cited as a major constraint faced by dairy farmers in East Africa, especially during the dry season. However, new improved forage technologies often fail to be adopted for a variety of reasons. Within the frame of a BMZ/GIZ sponsored project we focus on exploring the adoption potential of these forage technologies following a case study based approach in two villages in North-Eastern Tanzania.

This contribution highlights first results derived from semi-structured qualitative explorative interviews and structured field observations - a follow-up inventory of farmers who had received planting material in 2014 and 2015. Main aim was checking sustainable adoption decision of farmers from first knowledge of improved forages to actual implementation. Specifically, the study unveils: triggering, sustaining and inhibiting forces towards further adaptation and adoption of these technologies from a farmer's perspective with its conceptual grounding on the theory of behaviour modification.

While the triggering factors were both related to shortage of feed and soil conservation problems, the expected economic advantages were not as dominant in the farmers' responses. Reasons for sustaining the practices of growing improved forages were the year round availability of fodder, increased fodder demand (due to higher livestock numbers) and accumulated benefits (e.g. increased animal numbers and forage yields). Soil conservation issues were mentioned less often, in contrast to their dominance in the triggering factors. According to the farmers, further upscaling needs now more support in animal breeding, provision of sufficient planting materials and the expansion of the programme to other farmers beyond the innovation platform. The change in the importance of triggering (esp. land conservation) and sustaining factors (e.g. constant availability of fodder) is an important lesson learnt from this survey.

These first results from the farmers' perspective will be further reflected when triangulated with findings from a multi-stakeholder workshop using a qualitative participatory expert-based assessment approach - QAToCA in order to clearly extract adoption constraints following a systems perspective.

Keywords: Adoption constraints, forage technologies, livelihoods, livestock systems