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Influencing factors for adoption of forage technologies in smallholder dairy systems in Lushoto, Tanzania

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Problem

- lack of sufficient quantity and quality of livestock feed on a consistent basis is cited as a major constraint faced by dairy farmers in East Africa, especially during the dry season.
- → new improved forage technologies often fail to be adopted for a variety of reasons......

Specific objectives and methods

- Using semi-structured qualitative explorative interviews, structured field observations, and an extensive literature review, the study unveils:
- 1. triggering (driving),
- Within the frame of a BMZ/GIZ sponsored project we focus on exploring the adoption potential of these forage technologies:
- → in two villages in North-Eastern Tanzania (Lushoto).



Determinants of the Adoption of Forage Technologies findings from literature survey

- Risk aversion of farmers (new technologies are questioned),
- Farm size not fitting to new technologies,

- 2. sustaining , and
- 3. inhibiting forces, towards further adaptation and adoption of these technologies from a farmer's perspective.

Findings from survey

Triggering factors for adopting improved forages

- ✓ shortage of feed and soil conservation problems,
- expected economic advantages were not as dominant in the farmers' responses.

Sustaining factors for maintaining after adoption

- ✓ year round availability of fodder after adoption,
- ✓ increased fodder demand (due to higher livestock numbers),
- accumulated benefits (e.g. increased animal numbers and forage yields).

Conclusions

- Extreme price fluctuations,
- Poor access to markets (transportation, cooling facilities, inputs),
- Social networks (rural-urban ties),
- Legal aspects: taxes and subsidies,
- Gender and age.

Conceptual basis

Theory of Behaviour Modification (Hruschka, 1994).

- 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.
- From farmers perspective, further up-scaling needs now more support in:
- 1. animal breeding,
- 2. provision of sufficient planting materials and,
- 3. the expansion of the programme to other farmers beyond the innovation platform.





| former equilibrum | equilibrum | modified behaviour |
|--------------------------|-----------------------------|--------------------------------------|
| Perception of problem | Stages of implementation | Solution to problem or relapse |

Outlook

first results from the farmers' perspective will be further triangulated by findings from a multi-stakeholder workshop using a qualitative participatory expert-based assessment approach with other stakeholders:

•Farmers, extension officers, scientists











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