



Tropentag, September 10-12, 2025, hybrid conference

“Reconcile land system changes
with planetary health”

Effectiveness of decentralised co-designed extension materials based on farmer-led innovation in conflict-affected north shewa, ethiopia

ELIZABETH GETAHUN¹, TIGIST WORKU², BIRGIT HABERMANN³

¹*ILRI, Livestock, Climate and Environment, Ethiopia*

²*International Livestock Research Institute (ILRI), Sustainable Livestock Systems, Ethiopia*

³*International Livestock Research Institute (ILRI), Sustainable Livestock Systems, Kenya*

Abstract

The farmer-led innovation has emerged as a base for agricultural knowledge transfer. Especially in the areas where the formal agricultural services are unavailable, limited, or disrupted by conflict or other challenges. This study explored the effectiveness of decentralised distribution of co-designed agricultural extension materials based on farmer-led innovations in conflict-affected areas. The study utilised both qualitative and quantitative research methods. A follow-up phone survey interview was conducted with 71 farmers who received the co-designed materials using a random method, and 6 KII interviews were conducted with Kebele and Woreda-level livestock experts who were engaged in distributing the materials. A total of 71 respondents participated in the survey, with 57 (80 %) farmers reading the co-designed material, while 14 (20 %) farmers did not because of being too busy or lacking time. The results showed that the content, size, look, and illustrations in the material were the most effective parts and were easy for farmers to understand. Among those who read the materials, 45 (79 %) indicated that they gained new information or learned new practices from the material. And 42 (93 %) farmers have started implementing the farmers' practices introduced in the booklet. Further, the study also found that 54 (95 %) of farmers confirmed that the distribution of co-designed materials enhanced farmers' overall awareness of their farming practices. Finally, 22 (39 %) of farmers reported that they shared the information they learned with others, primarily with neighbours, friends, and relatives. The study concluded that co-designed extension materials based on farmer-led innovations are effective in strengthening farmer-to-farmer knowledge-sharing, particularly in areas with weak agricultural extension services as a result of conflict.

Keywords: Agriculture extension service , co-designed extension material, conflict, farmer-led innovation, farmer-to-farmer knowledge sharing, pioneer farmer