



Tropentag, September 10-12, 2025, hybrid conference

“Reconcile land system changes
with planetary health”

Climate-resilient agribusiness in Rwanda: Impact through the integration of agroforestry, enterprise, and value chain development

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Abstract

In Rwanda, Eastern Province is most vulnerable to droughts and prolonged dry spells. Aggravated by climate change, this calls for joint public and private sector action to mitigate the effects and adapt to changing climate and market conditions. This, in turn, requires approaches combining agroforestry, enterprise, and value chain development for climate-resilient agribusiness. The Transforming Eastern Province through Adaptation (TREPA) project, carried out by government agencies and R&D organisations, has developed such an integrated approach based on five pillars: 1) Producing diverse tree seedlings, 2) Promoting agroforestry and silvopastoral practices, 3) Organising smallholders into cooperatives, 4) Linking cooperatives with markets for climate-resilient agroforestry products, and 5) Building capacities for climate-resilient agribusiness.

In the first step, value chains were prioritised for developing climate-resilient agribusiness, based on the potential of expanding tree cover in the related production systems, creating jobs, and generating higher value added through the production, processing, and marketing of tree crops. As a result, the value chains of wood fuels, timber, fruits, nuts, bee products, and fodder were identified as most promising. Secondly, we determined the number of cooperatives and other small and medium enterprises (SMEs) engaged in the prioritised value chains. Among the 247 cooperatives and other SMEs identified, we assessed business skills, technical capacities, and knowledge on climate change for a tailored approach to developing capacities for climate-resilient agribusiness. Combining the results of the enterprise and trainings needs assessments, we grouped the cooperatives and other SMEs according to their experience with business planning, managing credits, staffing, the infrastructure, machinery and equipment available for bulking and processing, their knowledge on climate change, and exposure of operations to drought, flooding, and other effects of climate change. Finally, we designed and implemented context- and client-specific training modules for upgrading technical and business skills, processing climate and market information, and designing impactful business, mitigation and adaptation strategies.

The results achieved to date can serve as an example for enhancing the impact of forest and land restoration programmes by focusing on landscape, climate, and business resilience,

while addressing environmental, socio-economic and political-institutional aspects through integrated approaches.

Keywords: Agribusiness, agroforestry, climate resilience, Rwanda, smallholders, value chains