ICT technologies improve crop-livestock production and smallholder farmer's incomes in Eastern DR Congo

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Introduction

•Mixed crop-livestock (C-L) farming systems dominate Eastern DR Congo and Burundi, where they provide food, income, draught power and employment to smallholder farmers.

·However, farmers have limited knowledge on best practices for optimizing the integration of crop and livestock production at farm level.

•The CLiP Project seeks to help these farmers to improve their food security, nutrition, income and resilience through adoption of locally-generated innovations that enhance productivity of integrated C-L (or IC-L) systems and thefunctioning of their respective value char

·Information and Communication Technologies (ICTs) are being used to disseminate new knowledge and advice.

Approach & processes in DRC				
		Farmer type	Crop and livestock technologies disseminated	
In far far to	February 2017, 150 mers representing 2 m types were selected host C-L R4D monstrations in Miti d Kamanyola	Poor	Rabbit + improved varieties of forage legumes, bio-fortified varieties of maize, field beans and orange-flesh sweet potato + Integrated Soil Fertility Management (ISFM) training	
de an		Medium wealth	Pigs + improved varieties of forage legumes, bio-fortified varieties of maize, field beans and orange-flesh sweet potato + ISFM training	
		·Staff fro	•Staff from Ministry of Agriculture, IITA and ILRI registered as	
	75 of these farmers were registered on the Airtel ICT platform in June 2017	•Airtel provided ordinary cellphones on loan to farmers, which farmers paid-off at the end of cropping season.		
		•Services offered included (i) toll-free calling and sms for technical advice on production and marketing (ii) access to Airtel microcredit (iii) electronic cash transfers.		

Farmers benefited from knowledge transfer, improved

access to vet services and input and output markets for crop and livestock products



Results

Integrating C-L along solidarity chains (S.C.)

Increasing adoption of ICT services along S.C.

Moving-up the livestock ladder



•CLiP innovations have improved agricultural productivity at HH level by approx. 60% and the number of farmers benefiting from ICT technologies has increased (progressive total of 2025 sms's from farmers seeking expert advice).

•Through digital technologies, smallholder farmers are connecting to markets and local agro-vet networks. This is promoting adoption of improved IC-L technologies. •Rabbit solidarity chains are more popular those of pigs, because of their faster turn-around time.

•The most widely disseminated cropping technologies are (i) Mbili system of intercropping maize :beans or maize : soybean (ii) Cultivation of bio-fortified maize, bean and Orange Flesh sweet potato

Take-home message

IFAD

Digital ICT technologies aided access to information, which contributed to increased adoption of improved innovations, productivity and marketing, leading to improved food security, nutrition, incomeand livelihood.



In DRC sites, ICT marketing platforms enabled 37 poor (Type 1) farmers to change status to
Medium Weath (Type 2), when each sold ave. 54 rabbits to buy pig or goat. In total 12 piglets and 16 goats were purchased.

•Similarly, 18 Type 2 farmers sold each 9 pigs or 24 piglets to buy a cow, advancing them to Type 3 (Wealthy) category.

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