



Climate proofing infrastructure for improved water supply and sanitation in ASAL regions

In Kenya, water supply systems often require high capital investment and infrastructure development. In most cases, water systems in rural and peri-urban areas are not considered commercially viable investments. These systems are managed by voluntary Water Users Associations (WUAs) who have limited access to investments; leaving WUAs to search for solutions on their own, mostly on an adhoc basis.

In general, WUA members lack the business acumen to ensure the financial and commercial sustainability of systems. Research has shown that poorly performing water systems in rural and peri-urban areas will almost likely require technical assistance and seed grants so that they are able to achieve cost recovery.

In 2014, SNV's water point mapping report in seven counties found that a third of constructed water points are dysfunctional in Kenya, at any given time.

For water systems to deliver a long-term and quality service, WUAs will need to gain the know-

how and skills to, for example, set-up appropriate functional structures, design good governance and monitoring practices, have access to reliable data, etc.

The interplay of climate change and population growth exacerbates the water supply challenges of rural areas, especially in the Arid and Semi-Arid Lands (ASALs) of Kenya.

In ASALs annual rainfall ranges between 150mm and 850mm per year. Rainfall is unevenly distributed spatially, and temperatures are high all year round; with high rates of evapotranspiration. Degraded water catchments and the effects of climate change reduce the amount of freshwater availability, in surface and groundwater resources. Population growth compounds administrative efforts to distribute adequate water services in ASAL regions.

To address the challenges faced by ASAL communities, the Government of Kenya, SNV, and Water Sector Fund Kenya – with funding from the European Union (EU) – are collaborating on the four-year EDE-CPIRA programme, which

is being implemented across eight counties in Kenya. Together, the partnership seeks to develop infrastructure, and introduce a multi-stakeholder management arrangement. These interventions are envisaged to improve the functionality, reliability, and resilience of rural water systems against the backdrop of changing climate conditions.

Our ambition

The EU-funded **EDE-CPIRA (Ending Drought Emergencies: Climate Proofed Infrastructure for Improved Water Supply and Sanitation in Arid and Semi-Arid Land Areas)** programme seeks to address the deficit in climate-proofed water supply systems in the counties of Kitui, Kilifi, Baringo, Samburu, TaitaTaveta, Kajiado, Mandera and West Pokot. In the partnership, SNV will structure **Public-Private-Community Partnership (PPCP)** arrangements for the management of 16 rural water supply systems across the eight counties.

The approach

The EDE-CPIRA programme will apply SNV's Area-Wide Rural Water Supply Services (ARWSS) approach. In EDE-CPIRA, the partnership engages domestic private sector entities in the multi-stakeholder management of rural water systems; as service contractors, managers, investors, or innovative technology providers.

EDE-CPIRA programme implementation applies best practices and lessons learnt from the successful implementation of the Kenya Market Assistant Programme (K-MAP) of SNV. K-MAP was a six-year programme that was supported by the Government of the United Kingdom's Department for International Development, DFID (known as the Foreign, Commonwealth & Development Office, FCDO, since 2020).

For more information, contact:

David Wanyoike

WASH Team Leader, SNV in Kenya

dwanyoike@snv.org

SNV Netherlands Development Organisation

Ngong lane, Off Ngong Road

Tel: +254 7244 63355 or 7253 35640

<https://snv.org/project/ede-cpira-end-drought-emergencies>

PPCP implementation highlights



12 counties participated in the K-MAP programme



24 community water systems adopted PPCPs



268,000 people gained access to safely managed drinking water

Increase private sector involvement in WASH

SNV will identify and assess existing rural water supply systems that can benefit from the expertise of local private sector actors. The selection process will follow an established set of criteria – tried and tested by K-MAP implementation counties.

Strengthen the capacity of WUAs

SNV will build the capacity of WUAs to better manage the operation and maintenance activities of rural water supply systems. To ensure that everybody benefits, a gender equality and social inclusion approach will be applied throughout the PPCP process (in planning, design, and implementation). WUA members will be introduced to revenue enhancement and cost reduction strategies, as well as climate mitigation and adaptation mechanisms.

Climate proofing rural water systems

SNV and the WSTF will explore low-cost rural water supply technologies, with low operations and management requirements. These technologies will be introduced to upgrade or complement the 16 rural water supply systems that will be selected. Energy and resource-efficient technologies, such as solar powered technology for pumping, low-cost rainwater, and run-off water harvesting technologies will be tested and selected through a process informed by context, practicability, and sustainability.

