

Evidences

Study #3861

Contributing Projects:

- P812 - Creating climate-smart multi-functional landscapes through integrated soil, land and water management at different scales in East Africa

Part I: Public communications

Type: OICR: Outcome Impact Case Report

Status: Completed

Year: 2020

Title: Inspired regional government in Ethiopia to fund dam building for drinking water and its watershed management using CSA options

Short outcome/impact statement:

The Alliance and its partners inspired the government in Ethiopia to start constructing a drinking water dam for the people of Mekaneselam. Our detailed report investigating the various water harvesting options and suggestions for a suitable location has led to a decision to invest hundreds of millions. We are now working with partners to develop an integrated 'dam catchment management master plan'. When completed the project will benefit the close to 100,000 people of Mekaneselam and its surroundings.

Outcome story for communications use:

With a current population of about 85,000, the Mekaneselam town in the South Wollo Zone of the Amhara region in Ethiopia has been suffering from a shortage of water for a long time. With a projected annual population increase of about 7% and potential expansion of industries, Universities, and other services, the water shortage is expected to increase unless a long-term solution is provided. Cognizant of our contributions in integrated land and water management, the administration of Mekaneselam town approached the Alliance team in Ethiopia to conduct a pre-feasibility study, including potential dam site alternatives, overall water resources potential, and corresponding land and water management solutions. After investigating the landscape/geomorphological and geological condition of the area, the team understood that the groundwater resources of the area are very low and recognized that surface water harvesting through dam construction is a more feasible option. Based on a detailed assessment of various options through scenario analysis supported by field visits, the team identified an appropriate site to locate a dam and compiled a detailed report. The depth and breadth of the study inspired the regional government to conduct a detailed feasibility study and assigned the Amhara Design and Supervision Works Enterprise (ADSWE) to undertake the study. Within about a month, the ADSWE reported the suitability of the site for the envisaged purpose. Based on this, the regional government has allocated tens of millions for the construction of the dam. This high-level impact inspired the Alliance team and we have now started to lead the development of an integrated 'dam catchment management master plan' to tackle erosion and dam siltation. The team, in collaboration with the Natural Resources Conservation and Management (NRCM) Directorate of the Amhara National Regional State and local partners, has started implementing CSA practices across the dam catchment. Repeated consultations were made involving local development actors for a joint and collaborative effort- which is very well considered by partners. Appreciating this effort, NRCM have selected the site to be one of their key/priority watersheds and co-developed a master plan for its development. Training and exchange visits were made to build the capacity of stakeholders to identify and prioritize income generating CSA options, which are being implemented. Through lessons gained here and elsewhere in the country can form a very important basis for the management of the various lakes and dams including the Grand Ethiopian Renaissance Dam (GERD).

Links to any communications materials relating to this outcome:

- <https://tinyurl.com/yd87cvb2>
- <https://cgispace.cgiar.org/handle/10568/111324>

Part II: CGIAR system level reporting

Link to Common Results Reporting Indicator of Policies : No

Stage of maturity of change reported: Stage 3

Links to the Strategic Results Framework:

Sub-IDOs:

- Land, water and forest degradation (Including deforestation) minimized and reversed
- Agricultural systems diversified and intensified in ways that protect soils and water
- Increased capacity for innovation in partner development organizations and in poor and vulnerable communities

Is this OICR linked to some SRF 2022/2030 target?: Too early to say

Description of activity / study: <Not Defined>

Geographic scope:

- National

Country(ies):

- Ethiopia

Comments: <Not Defined>

Key Contributors:

Contributing CRPs/Platforms:

- CCAFS - Climate Change, Agriculture and Food Security
- WLE - Water, Land and Ecosystems

Contributing Flagships:

- FP2: Climate-Smart Technologies and Practices
- FP1: Priorities and Policies for CSA

Contributing Regional programs:

- EA: East Africa

Contributing external partners:

- ANRRSNRCM Direoctrate - Amhara National Regional State, Bureau of Agriculture, Natural Resources Conservation and Management Directorate
- Inter Aide

CGIAR innovation(s) or findings that have resulted in this outcome or impact:

The various engagements and learning sites in Ethiopia under the support of the Africa RISING program, CCAFS, and WLE formed the basis to develop guidelines and frameworks that can facilitate integrated land and water management options across scale. The 'creating climate-smart and multifunctional landscapes' work under EU-IFAD enabled to fine-tune tools and scale technologies.

Innovations: <Not Defined>

Elaboration of Outcome/Impact Statement:

Considering our experiences related to 'creating multifunctional landscapes', we have been requested by the Borena Woreda City Council in the south Wollo zone of the Amhara region to identify a suitable location to construct a dam to provide drinking water for the population of Mekanesselam and its surroundings. The city is attracting investment, small factories are booming and now hosts one of the campuses of Meqdella University. However, there is a serious shortage of drinking water, an answered question for many years.

A team of experts conducted a detailed assessment that led to the identification of a potential site accompanied by a detailed report which led the Amhara Region to allocate resources for the construction of a dam. Encouraged by this decision, the team continued to provide support related to integrated land and water management options to sustain the dam for the intended period of time. Discussions were held with stakeholders to develop a 'master plan' that can enable management of the dam catchment in a sustainable manner. We established a partnership with the Amhara Bureau of Agriculture 'on the ground implementation of option and supervision'. We also co-developed a management consortium of "multi-stakeholder platforms" that can support and coordinate project implementation. In order to create synergy and integration, we mapped stakeholders operating in the area and who can potentially support the watershed management work. Key actors such as the Amhara Region Bureau of agriculture, Borena-Saint National Park, Menschen für Menschen Foundation, KfW (Kreditanstalt für Wiederaufbau), Mekanesselam city council, Borena Woreda Admin, Hocheche Kebele administration and representatives of other offices were identified and invited for joint discussion. As part of this exercise, a discussion was also made with relevant stakeholders and formulated a sub-committee that will coordinate the overall dam construction and watershed management works.

More than ten key CSA practices such as crop rotation, intercropping, agroforestry, terraces, bunds, and exclosures were implemented in 2020 and will continue in the coming years. The CSA practices were identified considering the landscape configuration and associated potentials. So far about 250 ha of land has been covered with the above practices and work is still in progress. About 265 households (243 male and 22 female) participated in the implementation of CSA practices will benefit from the interventions. When the water supply dam is finalized, it will provide water supply for the Mekanesselam town with a population of more than 100, 000.

References cited:

Tamene, L.; Abera, W. (2020) Creating climate-smart multi-functional landscapes through integrated soil, land and water management practices and contextualized agroadvisory services at different scales in Ethiopia. Addis Ababa (Ethiopia): Alliance of Bioversity and CIAT. 38 p.

<https://cgspace.cgiar.org/handle/10568/111324>

<https://blog.ciat.cgiar.org/ethiopia-government-and-alliance-partners-to-implement-usd-32-million-water-project/>

<https://drive.google.com/drive/folders/101ReLWTxVb7b5e-g3MGxLIJ4-GHqIHRk>

Quantification: <Not Defined>

Gender, Youth, Capacity Development and Climate Change:

Gender relevance: 0 - Not Targeted

Youth relevance: 0 - Not Targeted

CapDev relevance: 1 - Significant

Main achievements with specific **CapDev** relevance: Provided training to local and regional actors to share lessons and experiences on sustainable land management options and their management.

Climate Change relevance: 0 - Not Targeted

Other cross-cutting dimensions: No

Other cross-cutting dimensions description: <Not Defined>

Outcome Impact Case Report link: [Study #3861](#)

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