

Project Summary: GivePower Kenya Solar Water Farms

GivePower Foundation are developing a project that will support the provision of safe water using photovoltaic cells to power desalination technology to thousands of households in Kenya. By providing safe water, the project will ensure that households consume less firewood and charcoal during the process of water purification and as a result there shall be a reduction of carbon dioxide emissions from the combustion process.

Income generated by the sale of carbon credits, from savings in wood and charcoal use, will ensure ongoing maintenance and operation of the technologies while setting water prices at the necessary price point for local communities to benefit. GivePower Foundation have agreed to transfer the emissions reductions over to CO2balance UK Ltd. This project will be developed under the Gold Standard Foundation, which in addition to verifying and issuing the carbon credits, also measures local social, environmental, and economic impacts towards the UN Sustainable Development Goals (SDGs) for a minimum of 5 years from project start.

Technology





GivePower Foundation have developed a revolutionary solar-powered clean water solution. The containerized solar-powered desalination units provide sustainable and scalable safe water supply.

Sustainable Development

In addition to supplying clean and safe water and reducing greenhouse gas emissions, this project will create positive social, economic, and environmental impacts:

- Result in less biomass fuel used by households, which will reduce pressure on local ecosystems
- Reduce time spent collecting water and gathering biomass fuel to boil water
- Reduce the incidence of illness caused by unsafe water and household air pollution
- Reduce expenditure on biomass fuel, leaving money free for other household expenses
- Train communities in water, sanitation, and hygiene (WASH) techniques

This project aims to contribute to the following United Nations Sustainable Development Goals:

Sustainable Development Goals (SDGs)	United Nations Targets	CO2balance Indicator
	3.9 By 2030, substantially reduce the number of deaths and illnesses from hazardous chemicals and, air water and soil pollution and contamination	Provide safe water for consumption to all project beneficiaries
	SDG 5.4 Recognise and value unpaid care and domestic work through the provision of public services, infrastructure and social protection policies and the promotion of shared responsibility within the household and the family as nationally appropriate	Reduce time spent collecting firewood and water
	SDG 6.1 By 2030, achieve universal and equitable access to safe and affordable drinking water for all	Provide safe water for consumption to all project beneficiaries
	SDG 13.B Promote mechanisms for raising capacity for effective climate change-related planning and management in least developed countries and small island developing States, including focusing on women, youth and local and marginalized communities	Realise CO ₂ emission reductions by removing the need to boil water for purification

Project Implementation

The **Baseline Study** was conducted in February 2021. This captured the baseline scenario of communities' water access and purification methods prior to project implementation. This forms the base of the project from which the emission reductions will be calculated.

The **Local Stakeholder Consultation (LSC)** was held in Bamburi in March 2022. This involved bringing together various stakeholders such as end users, local and international NGOs, Women's Groups and local officials to discuss the project. The Project's potential impacts and the **UN Sustainable Development Goals** were discussed, and attendees were asked how best to enhance the positive effects and mitigate any negative effects. Comments and suggestions will be considered when implementing and monitoring the project.

Each solar water farm included in the project agrees to transfer rights to emissions reductions to the project. Information regarding this transfer will be clearly available at each site.

Project Monitoring will take place during 2022. A random selection of households will be visited to complete surveys. This will show the water usage and access habits of end users. The data collected here is used to calculate the emission reductions. Once this is complete the **Gold Standard Foundation** will review and certify the carbon savings.

Contacts

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