



Sustainability action · Project Water

Ceramic Water Purifiers, Cambodia

The project's objective is to disseminate over 325,000 units over 7 years until 2017, to ensure maintenance and operation of disseminated units meet standards for water quality and to strengthen and facilitate establishment of institutions for the continued and sustained development of the Ceramic Water Purifier program.

Project

In Cambodia, more than 1,800,000 rural households do not have access to safe drinking water and are often exposed to water-borne diseases. 88 out of 1,000 Cambodian children under the age of five die from diarrhea due to the consumption of untreated water.

Two thirds of Cambodian households rely on boiling water as a way to provide their families with clean drinking water. Boiling water using wood and charcoal has direct negative health impacts and is responsible for respiratory, heart and eye problems. Globally, more than 1.6 million women and children die prematurely from exposure to burning biomass for cooking and heating.

The Ceramic Water Purifier (CWP), is a low cost alternative to boiling water. This provides both monetary and health benefits for users in addition to reducing the burden on the environment.

Checklist	Additionality and permanence	3 rd party verified	Transparency	Annual CO ₂ -reduction	Social and environmental benefits	Marketing material
Project 301 595	According to the rules of the Gold Standard	By TÜV Rheinland	Provided by the Markit Environmental Registry	67,000 tCO ₂ e	As documented in our database	High resolution pictures available



Location

The project is being carried out throughout Cambodia, where 34% of the population does not have access to an improved source of water. New water treatment enterprises are established in areas where the people have a significant need for safe water, where the people access water from surface water sources like rivers, ponds, and swamps.

Project achievements

Socio-economic impact

- Cambodian households using a CWP are no longer exposed to diarrheal diseases and harmful air toxins
- 99.99% of Escherichia coli bacteria is removed from water, exposure to indoor air pollution is reduced, and women save time that would otherwise have been spent collecting fuel and boiling water; time that can be better spent with their children or pursuing other income opportunities
- CWPs enable households to greatly reduce their exposure to microbial contamination
- Clean water provided by CWPs decrease medical expenses for families and they no longer need to rely on charcoal or wood; thus reducing household energy budgets from \$110 to \$56 during the first two years
- The project also allows users to spend more time on revenue generating activities
- The project strengthens economic development in rural areas in Cambodia as 67 rural non-farm employment jobs are created and new business opportunities arise for rural merchants in CWP
- Broken units can be used for road reparation and for potting flowers. Local villagers collect these from the factory

Environmental impact

- Since the introduction of the project, there has been a drastic reduction in indoor and ambient air pollution and better visibility especially in winter
- 71.5% of the population boils water for treating drinking water. The project reduces dependence on energy intensive boiling as the only form of water treatment. Families no longer have to gather firewood or purchase charcoal every time they want to drink safe water. In this way, the project helps to curb the high rate of deforestation in Cambodia and reduces greenhouse gas emissions

Gold Standard

