Project in UNEP 10YFP SLE Programme

Showing the sustainable lifestyle behaviour and technologies for energy efficient households in Zambia

General

The project will link the lifestyles and climate change mitigation by showing the influence of the lifestyle change and behaviour on the energy use and energy efficiency of the households – the improvement in energy efficiency, using of best available technologies and influencing on use of energy by influencing on attitudes and behaviour, in the phases of end use and investment, leads to minimised energy use, which has influence on climate change mitigation. The minimisation of the energy consumption in this context means using the best energy efficient technologies while improving the living conditions of people at the same time – the compared reference case will be traditional system investments and traditional way of using the systems in households. The sustainable consumption and production aspects are included, e.g. distributed solar renewable energy technologies.

Objectives

The objective of the project is to show influence of lifestyle, behaviour and technology on household energy performance and show possibilities of energy efficient technologies for large public. The scenarios of lifestyle are studied using participatory approaches and social innovations. The behaviour influencing on household energy use will be studied by case study simulations. The holistic performance combining lifestyle and technology scenarios will be shown by building energy simulations and web-based tools.

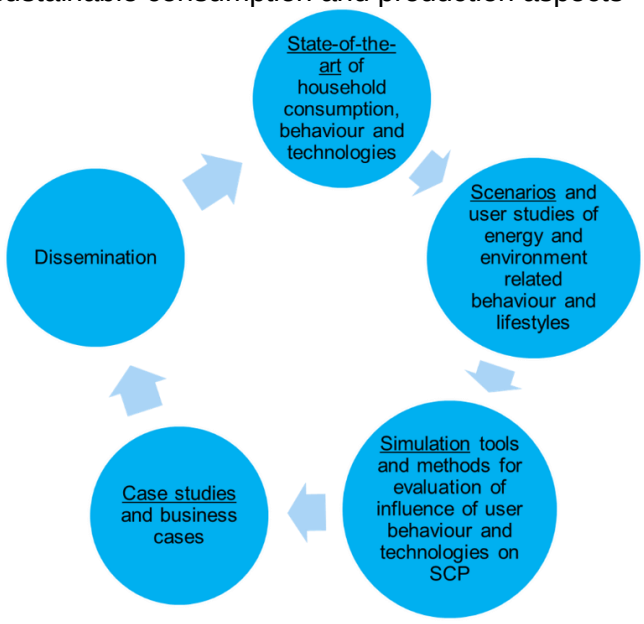

Figure 1. Project workpackages.

Figure 2. Pre-payment meter used in Zambia.

Dissemination and results

The dissemination will be done in 3 levels:

- Development of the knowledge and expertise of university teachers and students (CBU) by implementing building system energy simulation tools and methods in university courses
- Material & web based tool for basic education of public and youth
- Increasing the knowledge of decision and policy makers about economic viability of the energy saving technologies; practical case studies and business cases

The expected long-term influence of the project is improved energy efficiency of the households, mitigation of climate change and sustainable lifestyle and societies.

Partners: Copperbelt University (CBU) and VTT Technical Research Centre of Finland ltd.
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Financing: UNEP 10YFP Sustainable Lifestyle and Education programme.

Contact persons: VTT ismo.heimonen@vtt.fi & CBU albert.malama@cbu.ac.zm