



EU H2020 Project Grant #690268

A Decision-Analytic Framework to explore the water-energy-food **NE**xus
in complex and transboundary water resources systems of fast growing developing countries

Press release

February 13, 2017

On the morning of February 2nd, the Zambian Minister of Water Development, Sanitation and Environmental Protection, the Honourable Lloyd Mulenga Kaziya, opened the first stakeholder meeting of the DAFNE project on integrated water resources management in the Zambezi.

Minister Kaziya welcomed more than 20 organisations and companies from the Zambezi basin to the meeting in Lusaka including, among many others the Zambian Watercourse Commission (ZAMCOM), the Zambian Electricity Supply Company (ZESCO), the regional network for water management WaterNET and Zambian Sugar Plc, as well as the Zambian ministries of agriculture, energy and water. Their common interest in the sustainable management of water, energy and food production within the basin, was the binding element of the two-day meeting.

Minister Kaziya stressed that the resource challenges faced by the Zambezi countries are primarily related to water resources including food and energy security, lack of infrastructure, and increasing floods and droughts due to climate change. He called upon researchers, practitioners and the private sector to join forces for the improvement of water management strategies through projects such as DAFNE.

DAFNE is short for “Use of a Decision Analytic Framework to explore the water-energy-food Nexus in complex and transboundary water resources systems of fast-growing developing countries”. The four-year action research project, DAFNE, funded by the EU’s Horizon 2020 Research and Innovation Action programme is investigating options for the sustainable resource management together with stakeholders in both the Zambezi and the Omo river basins in Africa.

With the active input of the stakeholders in the basin, the 13 DAFNE partners, from Africa and Europe, are developing a transparent framework for determining the trade-offs and synergies that meet demand for water, energy and food without compromising the sustainability of these resources. The approach used in the project highlights the interdependence of water, energy and food security, particularly in light of the growing impacts of climate change which influences all three.

Managing the trade-offs among agricultural projects, hydropower generation, and other uses is a challenge for our system according to Professor Zebediah Phiri of ZAMCOM, who also presented in the opening session. ZAMCOM, he stressed, has a central role in coordinating these activities but needs simple, robust and useful tools, such as those being developed in DAFNE, to consider the multiple objectives in the basin. Echoing this, Dr. Kenneth Msibi, Water Representative of Southern African Development Community (SADC) expressed SADC’s support for the project particularly in light of the potential support it lends to the implementation of SADC’s Strategic Action Plan.

The stakeholder meeting, the first of several that will be held in the basin over the next few years, was organised by local DAFNE partners, the Integrated Water Resources Management Centre at the University of Zambia, led by Professor Imasiku Nyambe. Professor Nyambe and his team who organized the event, are co-leading the project case study in the Zambezi basin together with Dinis Juízo, Associate Professor of Hydrology and Water Resources Management at Eduardo Mondlane University in Mozambique. The meeting was co-hosted by DAFNE's coordinating partner, the Swiss Federal Institute of Technology, led by Professor Paolo Burlando.

For more information visit the DAFNE website: <https://dafne.ethz.ch/>

For specific questions on the DAFNE objectives and approach please contact:

Professor Paolo Burlando

Professor and Chair of Hydrology and Water Resources Management

Deputy Director

Dept. of Civil, Environmental and Geomatic Engineering

ETH Zurich

Institute of Environmental Engineering, HIL D22.3

5 Stefano Franscini-Platz

CH-8093 Zurich, Switzerland

Tel. 41-(0)44-633 38 12

e-mail: paolo.burlando@ethz.ch