



WATER TECHNOLOGIES DEMONSTRATION PROGRAMME

(A partnership between the Department of Science and Innovation and the Water Research Commission)

VVISDP: FIRST OPEN CALL for ERWAT

Innovative Technologies and Solutions for Micro Hydropower Generation from Low Head as part of the Viability and Validation of Innovations for Service Delivery Programme (VVISDP).

The **Water Technologies Demonstration Programme (WADER)** invites Expressions of Interest (EOI) from technology developers/vendors in response to the **WADER Technology Scanning Call focusing on micro hydropower generation for low head applications within wastewater treatment works at ERWAT.**

The Department of Science and Innovation (DSI), in collaboration with the Water Research Commission (WRC), has established WADER to pull together the applied research and development and commercialisation stages of the water innovation continuum. Acting as an innovation intermediary, the Programme's mission is to facilitate high-level, collaborative technology demonstrators from the public and private sectors to maximise the potential of the water innovation value chain.

The Viability and Validation of Innovations for Service Delivery Programme (VVISDP), established by the Department of Science and Innovation, is a programme that aims to assist municipalities with the uptake of innovations. The Water Research Commission (WRC) established the Water and Sanitation Innovation Transfer Unit (WSITU) under the VVISDP, to enable the effective transfer and uptake of innovative solutions by the municipal sector.

The programme intends to support municipalities by providing expertise for the evaluation of new innovations for service delivery. This is done by creating a supportive environment for engagement on innovation initiatives and is implemented as part of the WADER programme.

The objective of this WADER Technology Scanning Call for micro hydropower generation is to provide opportunities for innovators and commercial partners in the hydropower space to showcase their technology and solutions. The specific emphasis for this call is on low head (<5m) applications within wastewater treatment works. The expected power output is <150 kW.

The intention of the technology scanning call is to identify and ultimately showcase low head micro hydropower generation within a local municipality wastewater treatment works. Submissions should provide solutions to generate electricity from the flow of wastewater that can be utilised within the treatment works.

Requirements

The proposer should demonstrate the underlying scientific principles behind the technology and/or solution, provide the rationale supporting design features, operation and maintenance requirements and detail any previous demonstrations/implementation (number of units installed, performance metrics, location, scale, partners, performance outputs). A cost breakdown for the supply and installation of the proposed technology and/or solution should also be included, along with a key component list.

The proposal should assume that all preparation works/changes to infrastructure to allow for the installation of technology/solution fall outside of the scope of this call.

The proposer should also include a section on what makes their technology or solution innovative.

All proposals should be submitted on the EOI template provided (attached to this call). Proposals should be concise and include diagrams and photos.

EOI's in PDF format indicating which call the proposal is being submitted (e.g. FIRST OPEN CALL for ERWAT) must be emailed to Sarah Ravhudzulo (sarahr@wrc.org.za) and copying Dr Manjusha Sunil (manjushas@wrc.org.za) by close of business on **Monday, 04 December 2023 (16:00)**. Late applications will not be considered.

Budget

The WADER programme does not have a set budget for the water innovation demonstration. The proposer will have to propose the funding amount required for the proposed demonstration.

Please note that the awarding of the funding contract is at the discretion of the Water Research Commission.

COMMUNICATION WILL ONLY BE WITH SHORTLISTED CANDIDATES. IF YOU DO NOT RECEIVE A RESPONSE BY 07 DECEMBER 2023, PLEASE CONSIDER YOU APPLICATION UNSUCCESSFUL.

SHORTLISTED APPLICANTS SHOULD BE AVAILABLE DURING THE WEEK OF 8 TO 14 DECEMBER 2023 TO PITCH THEIR PROPOSAL (Details of the pitch will be shared with shortlisted candidates).

Contact

Queries: Dr Manjusha Sunil

Phone: +27 12 761 9300

Email: manjushas@wrc.org.za