# **Work Packages - Horizon CL6**

**HORIZON-CL6-2023-CLIMATE-01-2**

“Improve the reliability and effectiveness of alternative

water resources supply systems and technologies”

#### **WP1 - Project Management**

WP Leader-KTUN TR

(Task Leader: Zaragoza (Researcher))

* **T1.1 - Continuous coordination of activities**
* **T1.2 - Technical, quality and risk management**
* **T1.3 - Ethics management**
* **T1.4 - Data management**

#### **WP2 - Analysis of the Water Status Report and Plan**

(Partner: Zaragoza ? (Researcher) - City Status Report)

* **T2.1 - Water quality, quantity, and accessibility data identification and analysis**
* **T2.2 - Current water management strategies and policies analysis**
* **T2.3 - Initiatives and action plans development for water management**

#### **WP3 - Treated Municipal Wastewater Reuse and Technology**

(WP Leader: Zaragoza Researcher?)

* **T3.1 - Treated municipal wastewater quality assessment (sampling)**
* **T3.2 - Treated water effluent reuse technologies and design**
* **T3.3 - Reuse and recycling wastewater**

This task would focus on identifying opportunities for the beneficial reuse of treated wastewater, such as for agricultural irrigation or industrial processes, and developing systems and processes to support wastewater reuse.

* **T3.4 - System validation**

#### **WP4 - Seawater and Brackish Water Treatment, Reuse and Technology**

(WP Leader: PT)

* **T4.1 - Seawater and brackish water quality assessment (sampling)**
* **T4.2 - Seawater and brackish water treatment technologies and design**

This task would involve designing and engineering seawater and brackish water treatment systems, including the development of treatment plant layouts, process flow diagrams, and system specifications.

* **T4.3 - Reuse and recycling seawater and brackish water**

This task would focus on identifying opportunities for the beneficial reuse of treated seawater and brackish water, such as for agricultural irrigation, industrial processes, or groundwater recharge, and developing systems and processes to support water reuse.

* **T4.4 - System validation**

#### **WP5 - Rainwater and Stormwater Treatment, Reuse and Technology**

(WP Leader: KTUN)

* **T5.1 - Rainwater and stormwater quality assessment (sampling)**
* **T5.2 - Rainwater and stormwater treatment technologies and design**

This task would involve designing and engineering rainwater and stormwater treatment systems, including the development of treatment plant layouts, process flow diagrams, and system specifications.

* **T5.3 - Reuse and recycling rainwater and stormwater**

This task would focus on identifying opportunities for the beneficial reuse of treated rainwater and stormwater, such as for landscape irrigation, groundwater recharge, or industrial processes, and developing systems and processes to support water reuse.

* **T5.4 - System validation**

#### **WP6 - Pilot Water Treatment System Integration**

(WP Leader: ULUCEV)

* **T6.1 - System design and engineering**

This task would involve designing and engineering water treatment systems, including the development of treatment plant layouts, process flow diagrams, and system specifications.

* **T6.2 - Integration of treatment systems**

This task would focus on integrating various water treatment systems to create a comprehensive water treatment system.

* **T6.3 - Automation and control**

This task would involve the development of automation and control systems for water treatment plants, including the design and implementation of control systems, instrumentation and control loops, and automation software.

* **T6.4 - System validation**

#### **WP7 - Pilot Activity**

(L: ULUCEV)

* **T7.1 - Pilot activity plan and management**
* **T7.2 - Demonstration and evaluation**

#### **WP8 - Pilot Treated Water Reuse Feasibility and Analysis**

(L: DE)

* **T8.1 - Agricultural and Irrigation Reuse feasibility and analysis**
* **T8.2 - Domestic Reuse feasibility and analysis**
* **T8.3 - Industrial Reuse feasibility and analysis**
* **T8.4 - Final report of pilot treated water reuse feasibility and analysis**

#### **WP9 - Acceptance and Desirability Analysis and Strategy**

(L: SDSN)

* **T89.1 - Stakeholder analysis**

This task would involve identifying and analysing the various stakeholders involved in the water treatment project, including community members, government officials, NGOs, and industry representatives.

* **T9.2 - Public perception assessment**

This task would focus on assessing the perceptions of the public and stakeholders towards the water treatment project, including their attitudes, beliefs, and concerns.

* **T9.3 - Social and cultural impact assessment**

This task would involve assessing the social and cultural impacts of the water treatment project, including its potential effects on community values, traditions, and practices.

* **T9.4 - Public acceptance and desirability analysis**
* **T9.5 - Final public acceptance and desirability report**

#### **WP10 - Results Validation and Water-Energy Nexus Analysis**

(L: CH)

* **T10.1 - Pilot data collection and management**

This task would involve collecting and managing data related to pilot activity processes, energy consumption, and other relevant factors.

* **T10.2 - Results validation**

This task would focus on validating the results of pilot water treatment processes, including the identification of sources of error or variability and the implementation of corrective measures.

* **T10.3 - Water-energy nexus analysis**

This task would focus on analysing the water-energy nexus, including the identification of energy inputs to water treatment processes and the potential for energy generation from water treatment processes.

* **T10.4 - Life cycle assessment**

This task would involve conducting a life cycle assessment of water treatment processes, including the evaluation of environmental impacts associated with energy consumption and other factors.

#### **WP11 - Communication, Dissemination and Exploitation**

(WPL: Developia SP)

* **T11.1 - Dissemination and communication plan**
* **T11.2 - Dissemination and communication activities**
* **T11.3 - Exploitation management**
* **T11.4 - Standardisation**