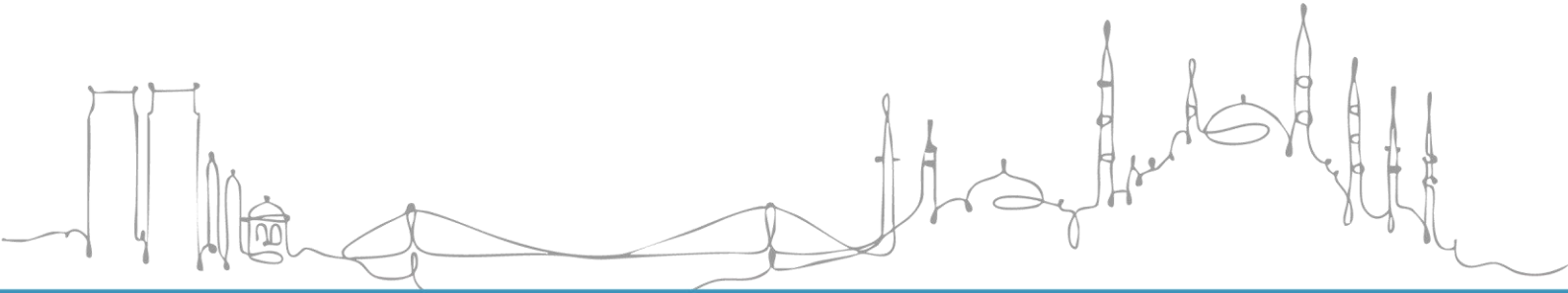


5th ISTANBUL INTERNATIONAL WATER FORUM

“Strengthening Water Resilience: Innovation to Action”

5-6 May 2026 | Istanbul, Türkiye

Concept Note
Special Session
Good Practices in Metropolitan Water Management



Special Session

Good Practices in Metropolitan Water Management

This panel, entitled "Good Practices in Metropolitan Water Management," aims to examine sustainable, resilient, and integrated water management approaches within a multidimensional framework, addressing the deepening water stress experienced by metropolitan cities under the compounding pressures of population growth, rapid urbanization, and climate change. The panel will discuss, from both technical and managerial perspectives, the following thematic areas: non-revenue water management strategies for improving water use efficiency; digitalization and data-driven decision support mechanisms in water management; the significance of master planning in water and sewerage administrations with regard to institutional capacity and long-term investment planning; and the role of membrane technologies in the utilization of non-conventional water resources. The overarching objectives of the panel are to strengthen evidence-based policy dialogue among local governments, water and sewerage administrations, academia, and the private sector; to analyze good practice examples concerning the integration of innovative technologies into strategic planning processes; and to develop actionable recommendations in support of water supply security.

The panel outputs are intended to bridge the gap between theoretical frameworks and field applications by presenting concrete implementation experiences in the context of urban water resilience, integrated water resources management, and climate change adaptation policies — in alignment with the overarching theme of the 5th Istanbul International Water Forum. In this regard, the panel will contribute a technical and institutional perspective to global water policy discourse.

Objectives and expected outcomes:

- To discuss sustainable and integrated water management approaches in metropolitan areas
- To evaluate strategies for improving water efficiency (especially non-revenue water / loss and leakage management)
- To highlight the role of digitalization and data-driven decision-making mechanisms in water management
- To emphasize the importance of master planning in water and wastewater utilities
- To analyze the use of alternative (non-conventional) water resources and membrane technologies
- To strengthen knowledge-based collaboration among local governments, academia, and the private sector
- To examine the integration of innovative technologies into strategic planning processes
- To develop practical recommendations to support water supply security
- To bridge the gap between theory and practice in urban water management
- To contribute technical and institutional perspectives to global water policy discussions

Keywords: Metropolitan water management, urban resilience, integrated water resources management, climate change adaptation, non-revenue water (loss and leakage) management, digitalization, data-driven decision support systems, alternative (non-conventional) water resources, master planning

