

## **Proceedings: Virtual Roundtable Meeting / Workshop on Mainstreaming Water-Sensitive Design and Planning (WSUDP) into City Planning in South Africa**

Centre for Science and Environment (CSE), India organised this virtual roundtable-cum-workshop on mainstreaming WSUDP into city planning in South Africa. The workshop was jointly organised with CSE's regional partners, the University of Cape Town (UCT) – Future Water Institute, South Africa and the Water Research Commission (WRC), South Africa. The workshop was aimed to bring together key water sector players and practitioners and discuss opportunities for mainstreaming WSUDP into city planning in South Africa.

A total of 41 practitioners attended the workshop (out of 61 registrations) from 10 cities in South Africa representing various government organisations including WRC, Dept of Water and Sanitation, Dept. of Agriculture, Land Reforms and Rural Development, Johannesburg Roads Agency, Municipalities of Ethekwini, Cape Town, Tshwane, Johannesburg, Potchefstroom, uMhlathuze. Representations from academic and research institutions included UKZN, Cape Peninsula University of Technology, North-West University, IUCN, etc.; representations from industry organisations including, Bosch Projects, GCRO, BMK Group, etc. The participants are from a diverse background of engineering, geography, hydrology, architecture and urban planning. Various WSUDP South Africa training alumni also attended the workshop.

The welcome address was given by Mr Jay Bhagwan, Executive Manager, WRC where he welcomed all participants, following which he provided a brief overview of the current status of WSUDP in South Africa. He threw light on the CSE-WRC-UCT partnership of more than six years where we jointly built capacity of more than 150 practitioners in WSUDP and played a key role in taking steps towards institutionalising WSUDP and water-sensitive cities in policy and programmes in South Africa, particularly in terms of effective stormwater management in city-regions.

Dr Suresh Kumar Rohilla, Senior Director, CSE gave a brief presentation on the various initiatives under the partnership including the series of research, advocacy and capacity building initiatives, starting from 2015. Following this, he presented the need for WSUDP in India and South Africa, with both nations being water-stressed and cities and towns in both nations are facing complex multi-dimensional water issues. He spelt out the challenges in innovation in policy and planning, and challenges of scale and capacities in cities, to address issues in the water and sanitation agenda.

Dr Rohilla showcased laid out the WSUDP approach in India, with focus on protecting local water bodies, stormwater management in public places, water conservation approaches at various scales and on-site demand management through rainwater harvesting and local reuse of treated wastewater. He showcased the journey of WSUDP in India, and how CSE was a key player in identifying gaps and in research, policy, plans and programmes, in the urban water sector. CSE research and practitioners guides on roadmap for WSUDP, etc. have taken the agenda forward, with states of Odisha and Delhi having institutionalised WSUDP as part of state policy and masterplans, and how the central govt. has included WSUDP approach and strategies in various urban missions like AMRUT, Smart Cities, Jal Jeevan Mission (Urban), Jal Shakti Abhiyan, etc. along with a MIS-based monitoring framework, which are key developments in mainstreaming WSUDP at the national level.

Having set the context, the technical session began with Dr Kirsty Carden, Interim Director, Future Water Institute – UCT providing a brief overview of the current WSUDP initiatives in South Africa in terms of policy framework, guidelines, projects and community of practice (CoP). Dr Carden shared the focus areas of WSUDP in South Africa in terms of the various guidelines on SUDS and Spatial Planning Framework. She threw light on the key findings and status of the on-going projects including

Liveable Neighbourhoods, GDARD SUDS Implementation, Water-Sensitive Cities Index Benchmarking for Cape Town, Pathways to resilient South African cities, and Benchmarking indicators for water security for Johannesburg and CoP.

Following this Dr Carden (on behalf of Ms Jessica Fell, UCT) shared the process and key findings of the Benchmarking the City of Cape Town as Water-Sensitive City and its district planning aspects. She how the Cape Town Water Strategy, 2019 and the pandemic provided a context for the benchmarking process. Dr Carden shared the various indicators used in the benchmarking process, and the data collection and stakeholder review process for the same. A water sensitive city overlay is to be added on the zonal planning map, as part of phase-1 of implementation.

This was followed by a presentation on Liveable Neighbourhoods delivered jointly by Tom Sanya, Senior Lecturer, UCT and Chisomo Phiri, PhD Scholar, UCT. They showcased their research on developing liveable neighbourhoods with water as foremost priority incorporating various aspects of WSUDP at the neighbourhood scale. They showcased a case example of Hangberg Houthway neighbourhood in South Africa, and the proposed green corridor concept for stormwater management including reuse.

The final technical session was delivered by Dr Demilade Fayemiwo, Fellow, Future Water Institute – UCT, where she showcased the findings of the capacity building initiatives for SUDS implementation. She presented the various gaps and deficiencies encountered by practitioners from policy to practice and how there is a need to develop capacity for SUDS implementation in EIA assessments using stakeholder engagement techniques like focus group discussions, etc.

The technical sessions were followed by an interactive discussion forum moderated by Dr Rohilla and Dr Carden. Participants discussed the various aspects of WSUDP implementation for up-scaling pilot initiatives, and how various policies and guidelines provide limited opportunities for multi-dimensional WSUDP implementation. The group deliberated on the various aspects of city planning, urban water management, drainage augmentation and climate change adaptation under which WSUDP interventions can be implemented in cities and regions of various sizes across South Africa, and how various state and non-state stakeholders can become a part of implementation. The workshop was concluded with a vote of thanks by Dr Rohilla, Mr Bhagwan and Dr Carden.