CHINA EUROPE Water Platform

China Europe Cooperation on "Sponge Cities"

AIWW

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Programme Manager CEWP-PI Water and Urbanization

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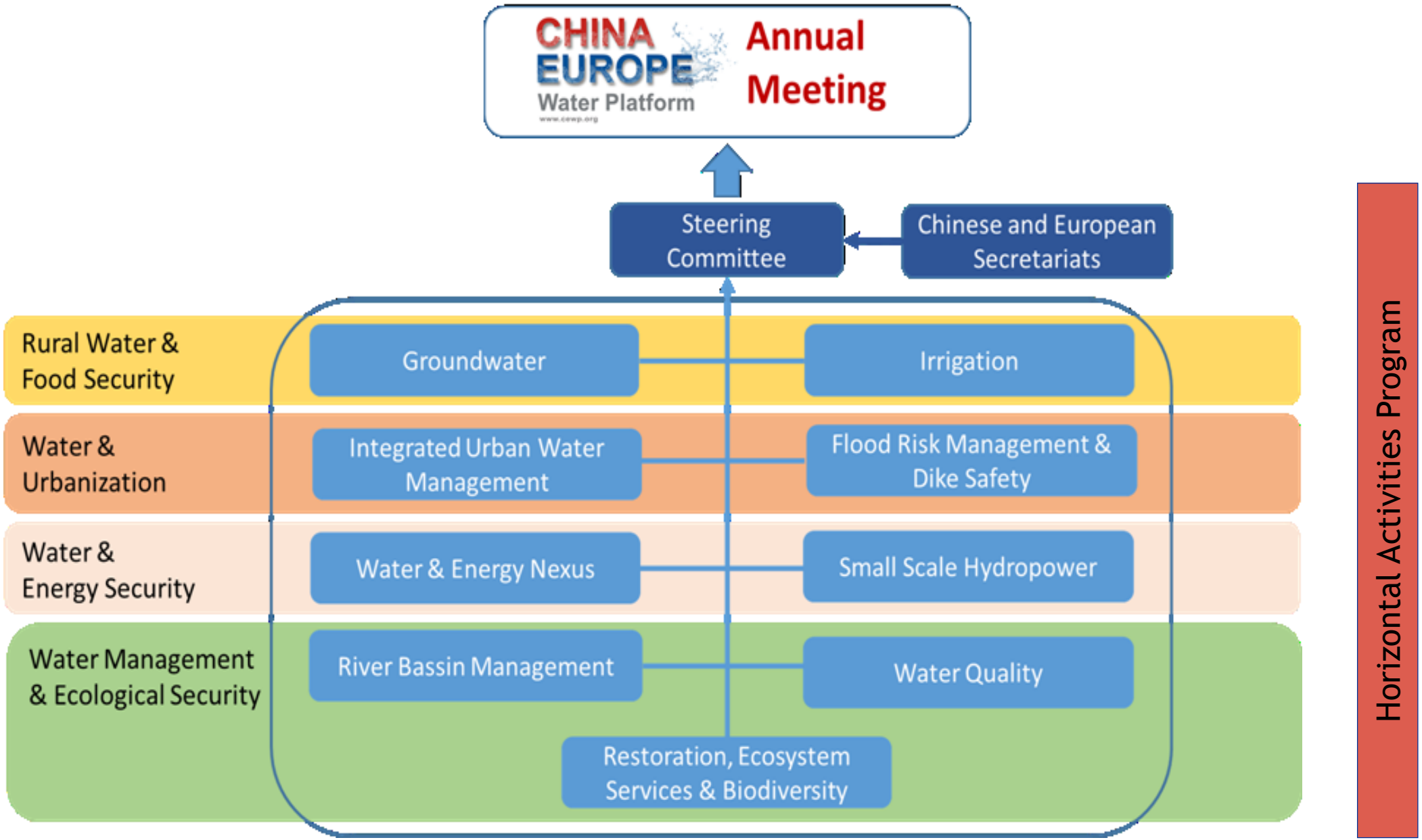
Co-funded by the
European Union and P.R. China



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European Consortium for CEWP-PI

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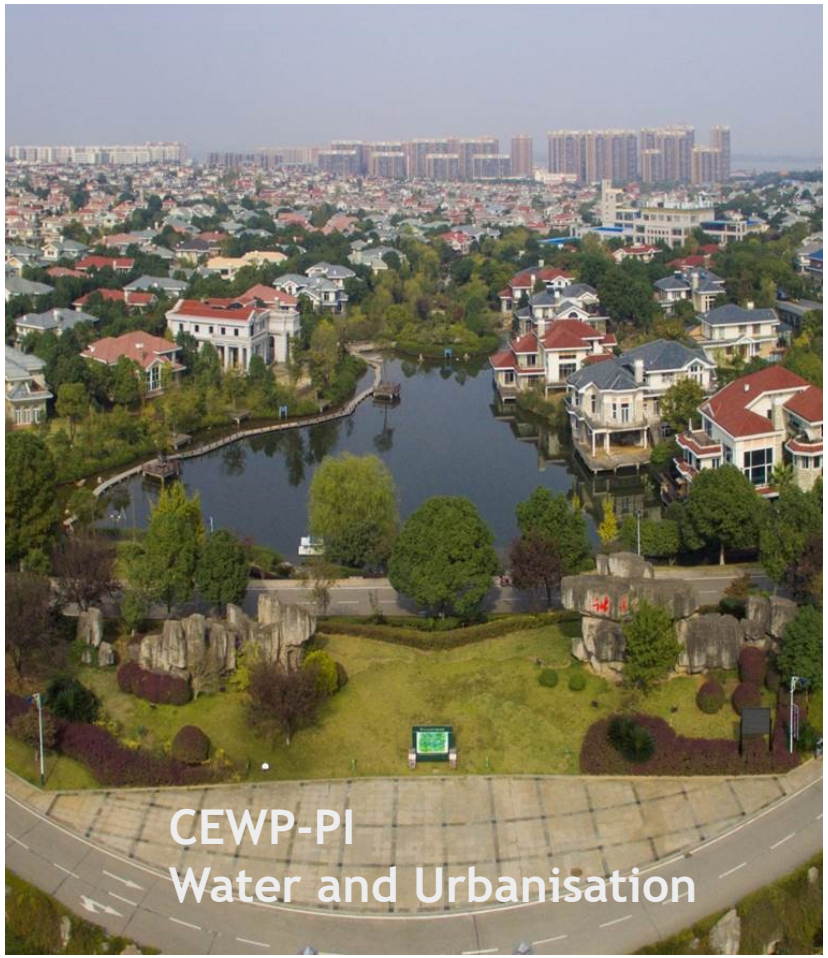

Rijkswaterstaat
The Netherlands

Turku University of Applied Science
Finland

TURKU AMK
TURKU UNIVERSITY OF APPLIED SCIENCES

University of Copenhagen
Denmark

KØBENHAVNS UNIVERSITET
UNIVERSITY OF COPENHAGEN

RISE Research Institute of Sweden

RI. SE

CECoSC Partnership

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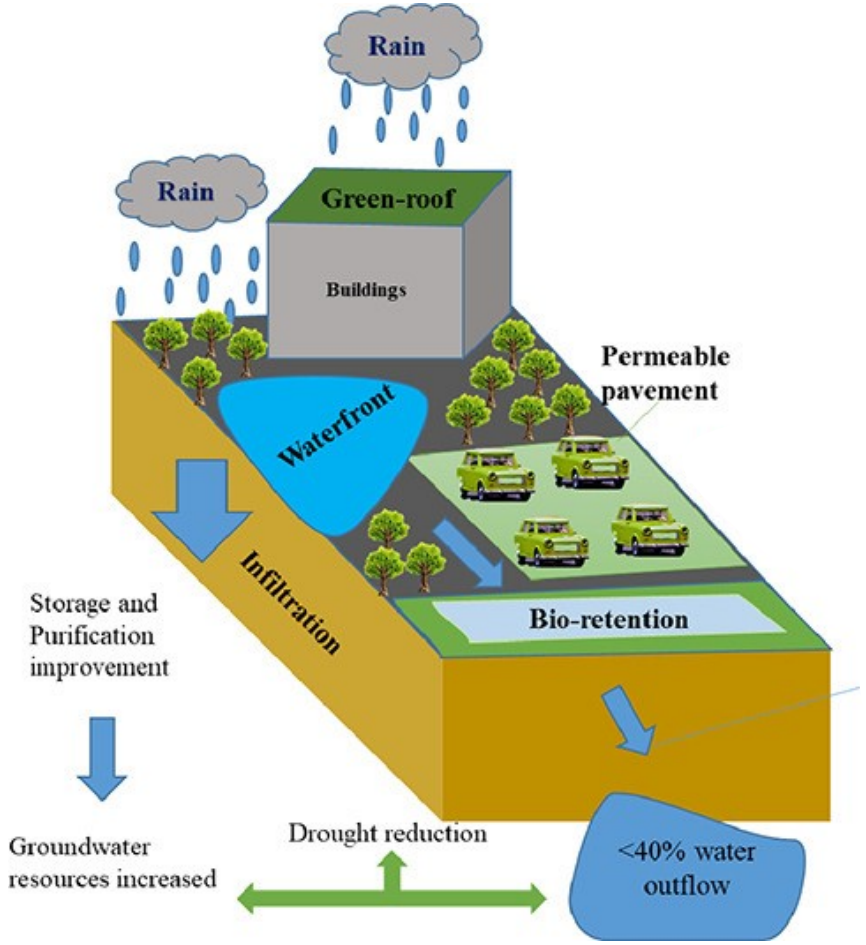
EU Partners	CN Partners
Lead Partner	Partner Beijing Water Authorities Partner City Beijing
Partner	Partner Chinese Academy of Urban Planning and Development
Partner	Partner City Changde (Hunan
Partner	
Reference Cities Amsterdam, Turku, Copenhagen, Gothenburg	

The sponge city concept (SCC)



Nguyen et al., 2018

'The sponge city approach promotes water resilient, low impact development integrated with urban planning and construction, allowing cities to function much like a sponge by absorbing rainwater that both mitigates flooding while also storing and purifying water to meet future use' (SC 2013, 2015)

In short: Water responsive cities capable of absorbing and retaining rainwater.

Less discharge, more retention

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Sponge city

conventional

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Green roof

Wadi system

Water Square

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Bypass, room for the river

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Shared Problem Analyses

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- The need for more integrated and adaptive aproach
- The need for improved decision support tools
- Costs and (long term) financing, currently huge costs that do not make the concepts sufficiently sustainable
- The need for learning and upscaling between and beyond existing sponge cities

CECosC Project Architecture

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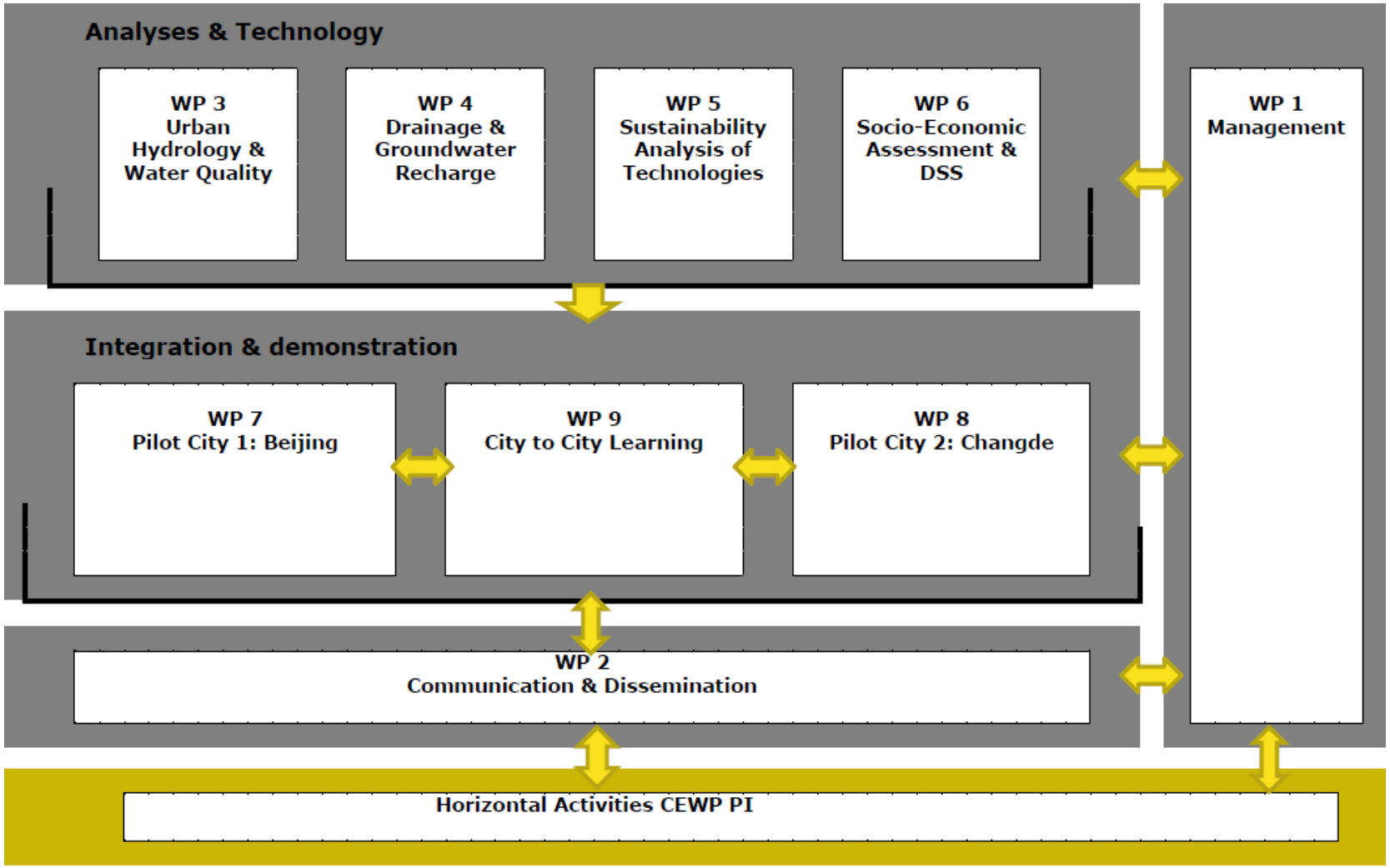

Interaction

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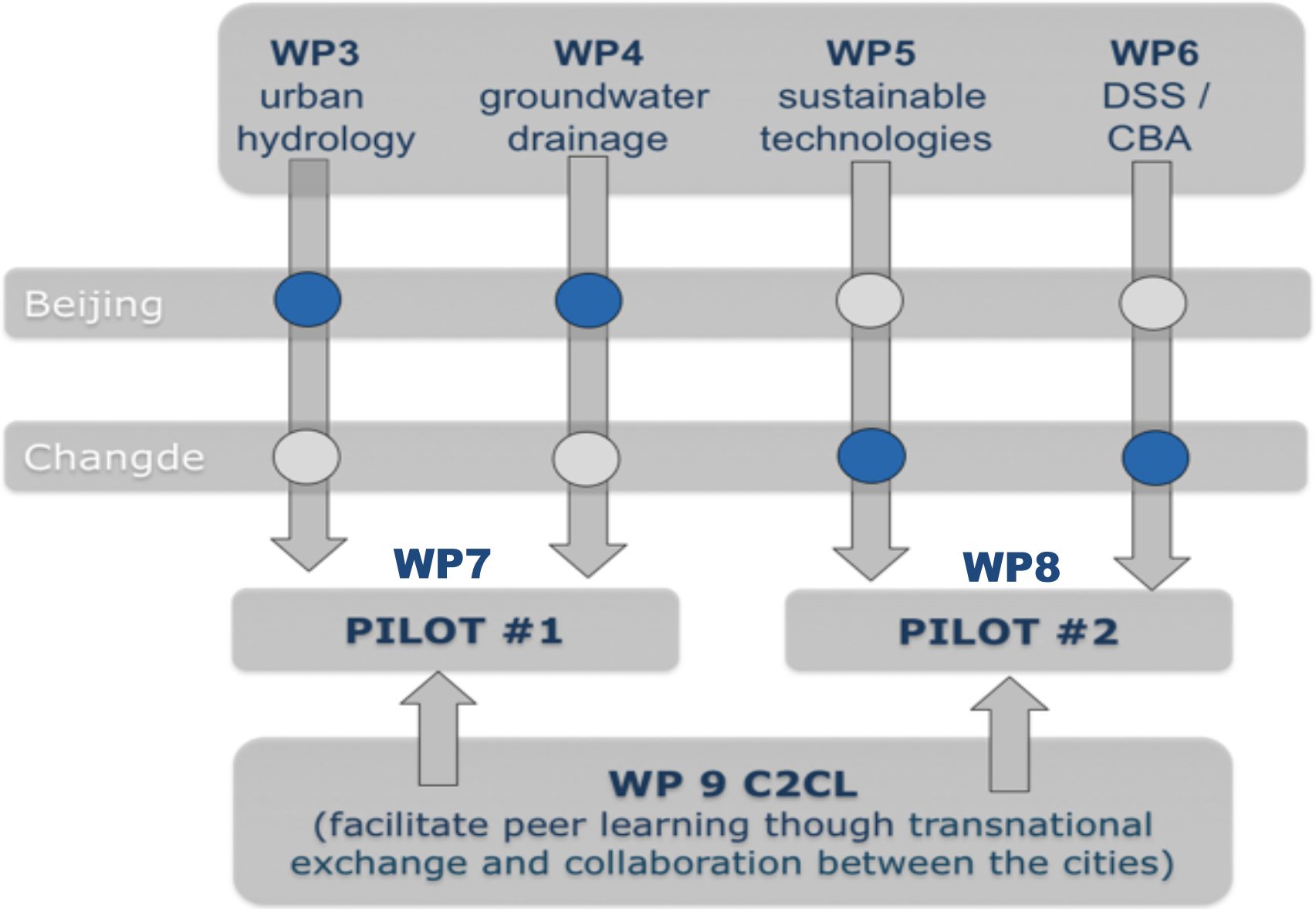

Shared Challenges and Opportunities*

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1. Decision Support Tools for SCC
   => Balancing blue green & grey (traditional) drainage systems

2. Economic evaluation blue green infrastructure

3. Monitoring blue green infrastructure

4. Co-creation and community involvement

5. Governance

**results from City Profiling workshops/sessions*

Transition of cities towards resilience and sustainability

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How to make the most of our investments in stormwater management?

Huge and complex task requiring new skills, technologies and products

DSS for mutual learning

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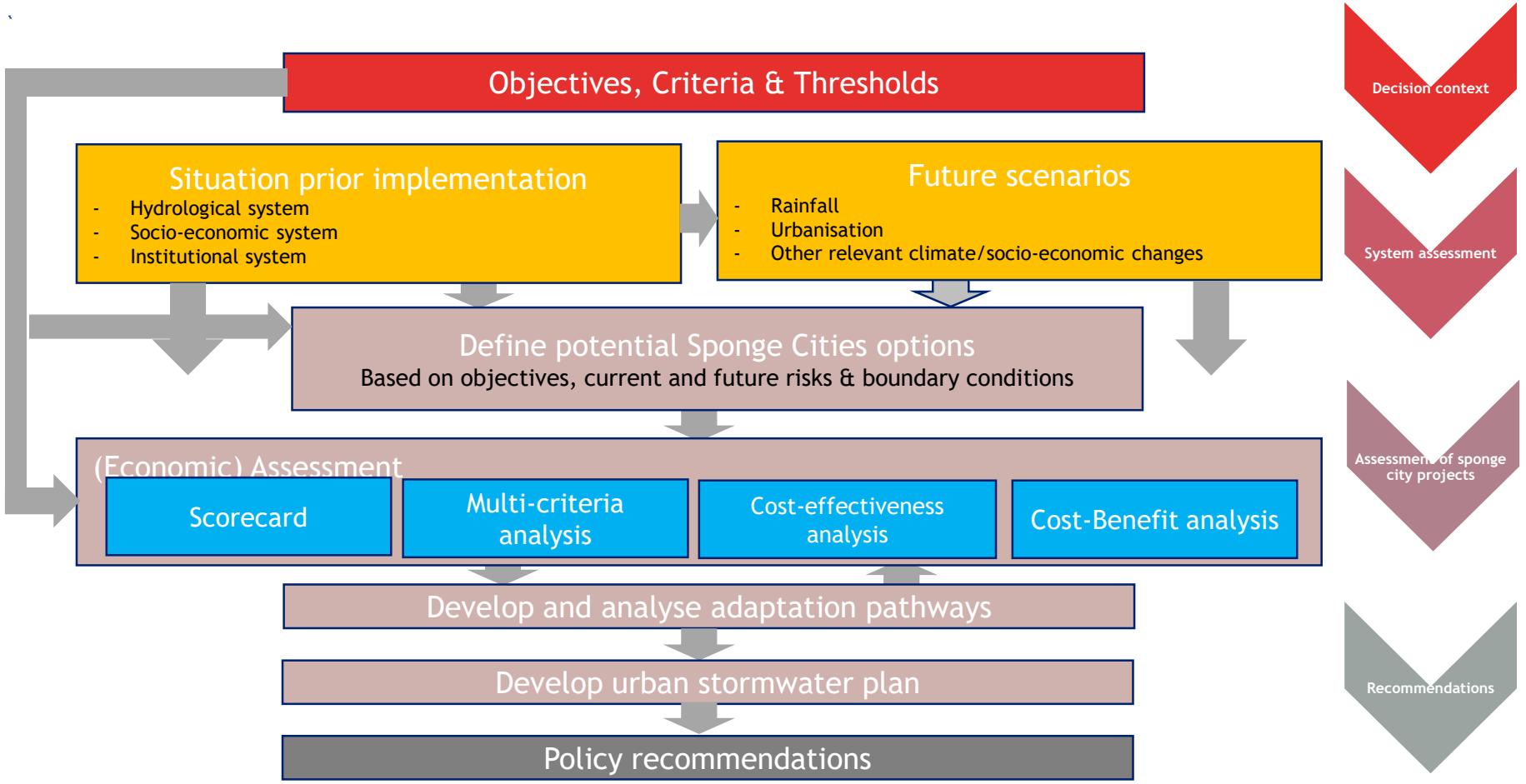
With a comparative Decision Support System it is easier to collaborate

CECoSC main objective: efficient exchange of knowledge and knowhow on how to ensure resilient and sustainable urban water management in China and Europe

The DSS reflects an integrated assessment framework



Thank you!

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