

Definition of Smart Urban Coastal Sustainability (SmUCS)

FINAL VERSION

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Smart Urban Coastal Sustainability (SmUCS) means for EU-CONEXUS to focus its education, research & innovation, and knowledge-sharing activities on defining, understanding and addressing **societal challenges** that are experienced by communities from **urban and semi-urbanised coastal regions** (rivers, seas and oceans).

Smart Urban Coastal Sustainability (SmUCS) is not a subject-driven thematic framework, but a **challenge-driven** education and research domain. Coastal environments are interfaces between inland areas and marine offshore parts where social and economic activities interact with highly valuable and unique **coastal ecosystems**. Socio-economic activities along our coasts have a direct and indirect connectivity and impact on these ecosystems through the provision of goods and services. The functioning and evolution of urban coastal societies and environments in the context of climate change and increasing anthropogenic pressure are major challenges that are addressed in the framework of Smart Urban Coastal Sustainability.

By providing sustainable, smart, nature-based solutions, EU-CONEXUS can achieve key sustainability goals, reduce the impact on the coastal ecosystems, respond to present challenges and anticipate future ones.

Examples for domains for research and education as covered in the Joint Research Institutes are

- **Coastal governance and coastal engineering** (cultural heritage, ecological justice, fisheries policy, understanding of coastal uses, on-/off-shore renewable energy – construction and operation of facilities, legislation...)
- **Coastal ecosystems with its social and natural components and stakeholders** (defence of biodiversity, improvement of water quality, water resources management, sustainable tourism, logistics, water lifecycle, SMEs, circular economy...)
- **Wellbeing of coastal communities and improvement of the quality of life** (civic education and awareness of naturally available resources, prevention of physical and mental diseases, healthy habits...)

(this list is not exhaustive and might be extend)