

Session 1:

Setting the scene: Climate change impacts on coastal zones

Perspective from technology

Expert dialogue on technologies for averting, minimizing and addressing loss and damage in coastal zones

Bonn, Germany, 17 June 2019



Dinara Gershinkova

Chair of the Technology Executive Committee

Technology Executive Committee



(Members of the TEC)

- Policy arm of the Technology Mechanism (CTCN is operational arm)
- Comprises 20 expert members
- Key outputs include policy recommendations on climate technology development and transfer



TEC briefs

 United Nations Framework Convention on Climate Change

TEC Brief #5

Technology Executive Committee

Technologies for Adaptation in the Water Sector

Photo: Fotini Tzioti - Lianou/Vision China

Why this TEC Brief?

Climate change will increase the natural variability of rainfall patterns and is likely to generate more extreme events, such as floods and droughts. These phenomena are expected to have significant effects on water safety and security, altering patterns of availability and distribution, and increasing water contamination (UN Water, 2007). Such changes have caused a multitude of impacts, which, due to future climatic changes, are expected to escalate (IPCC, 2014). Countries have, therefore, prioritised the water sector as a critical area of focus for adaptation, alongside agriculture. Technologies employed to respond to changes in the water sector are highlighted as a crucial resource for ensuring the effectiveness of adaptation. The Fifth Assessment Report of Working Group 2 of the Intergovernmental Panel on Climate Change (IPCC WGII AR5) has emphasised the role of technology in supporting adaptation to changes in water (IPCC, 2014). Moreover, the Third Synthesis Report of the Technology Needs Assessment (TNA) reflects the prioritisation of adaptation in the water sector by 77 per cent of Parties (UNFCCC, 2013).

The Technology Executive Committee (TEC) recognises the need for appropriate policies to support countries in employing technologies for adaptation, in order to meet the objectives of the United Nations Framework Convention on Climate Change (UNFCCC).

This policy brief has been developed for policy makers in national and local levels of government. In so doing, it has drawn upon existing examples of water technologies to highlight lessons learned and provide recommendations for policy, while bearing in mind the principles for effective adaptation (outlined in Section C-1 of the Technical Summary of the IPCC WGII AR5).

Technologies employed to support adaptation in the water sector may address issues of drought and scarcity, floods and over-abundance, water quality degradation, ecosystem impacts and service demand and use. To focus the scope of the discussion, this brief only covers technologies employed for addressing decreases in water availability (drought and scarcity), particularly in rural and developing country contexts. Nevertheless, this brief will touch upon other issues alluded to above, whenever relevant. Finally, a separate policy brief for agriculture can be referred to for an understanding of synergies, co-benefits and integration between both sectors.

 United Nations Framework Convention on Climate Change


TEC Brief #10

TECHNOLOGY EXECUTIVE COMMITTEE

Technological Innovation for the Paris Agreement

Implementing nationally determined contributions, national adaptation plans and mid-century strategies

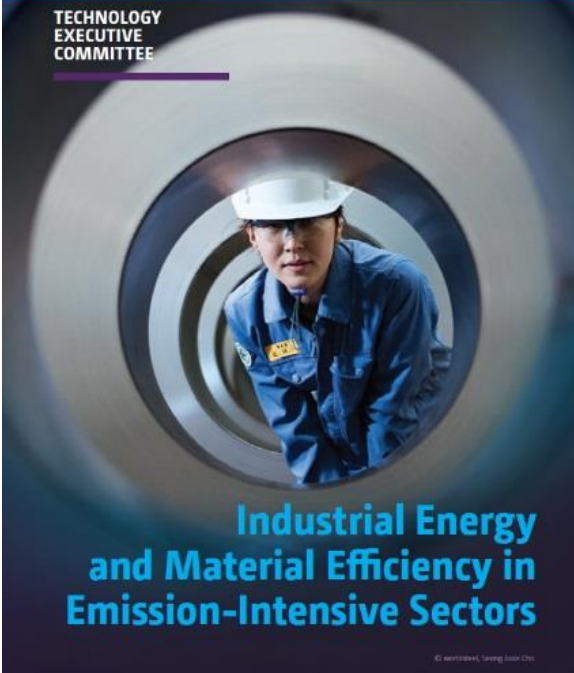


 United Nations Framework Convention on Climate Change

TEC Brief #11

TECHNOLOGY EXECUTIVE COMMITTEE

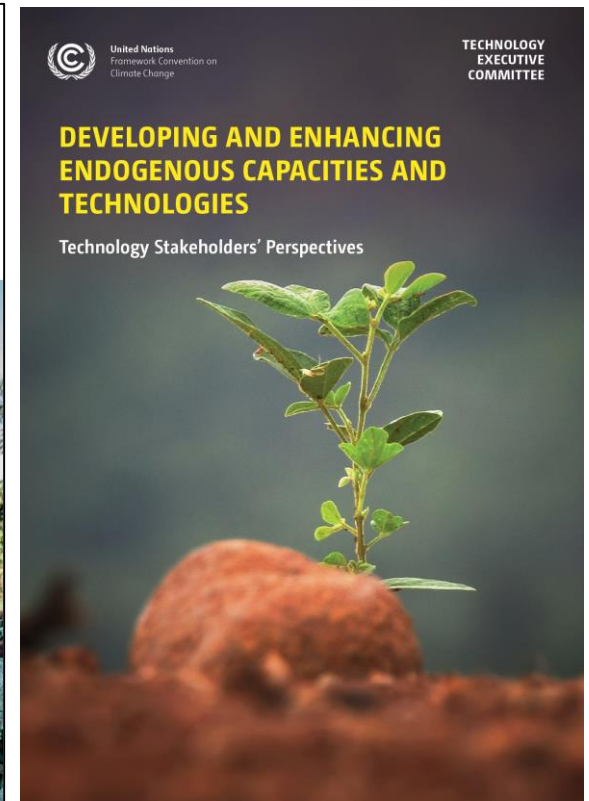
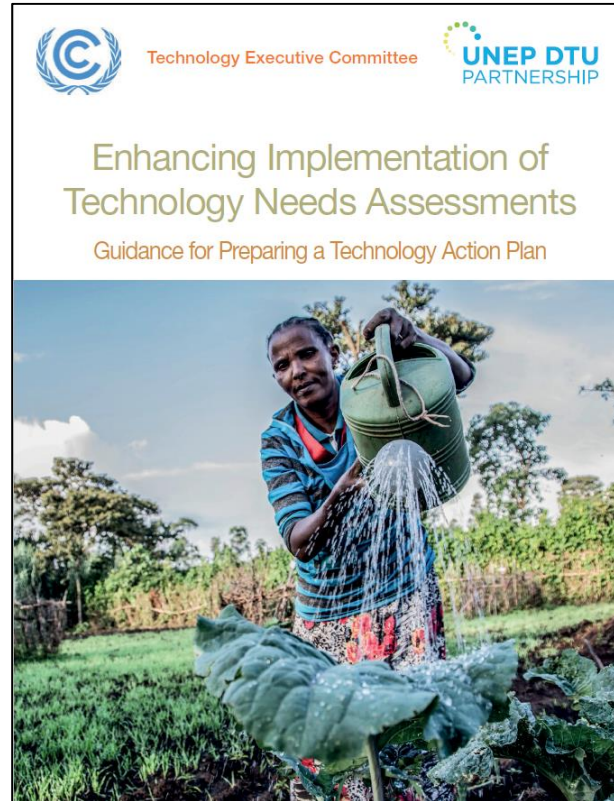
Industrial Energy and Material Efficiency in Emission-Intensive Sectors



Available on TT:CLEAR <http://unfccc.int/ttclear/tec/documents.html>

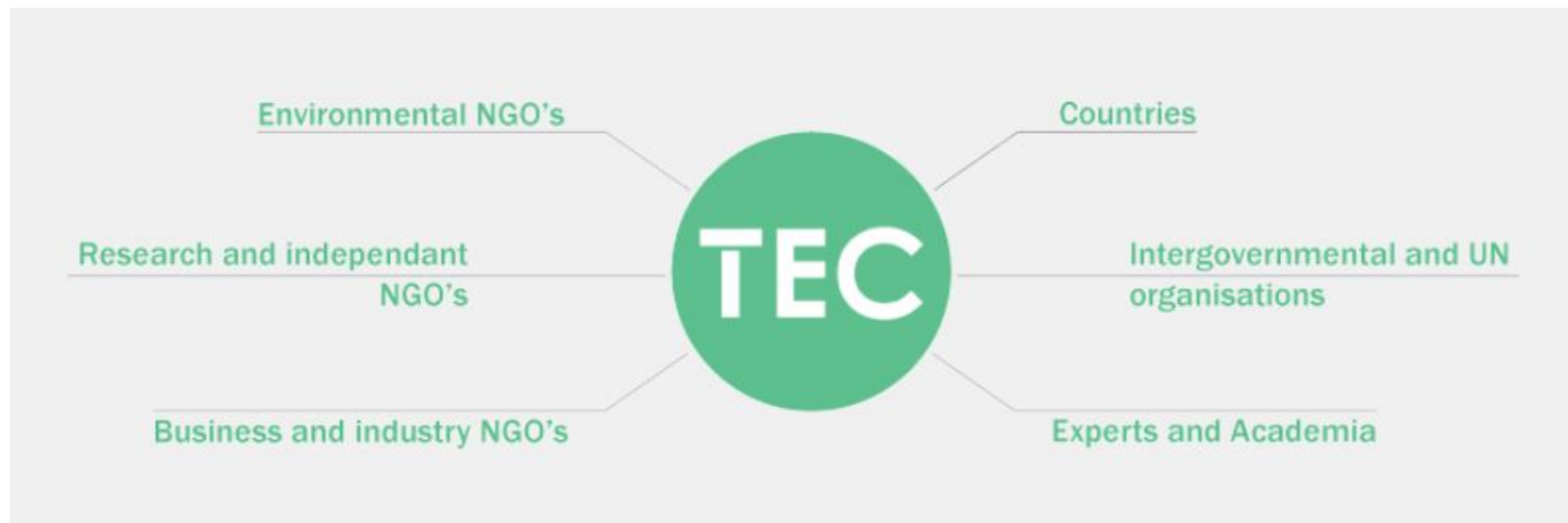


Reports/other publications



Available on TT:CLEAR <http://unfccc.int/ttclear/tec/documents.html>

TEC stakeholder engagement and collaboration with other bodies



Adaptation
Committee

WIM ExCom

PCCB

Standing
Committee
on Finance



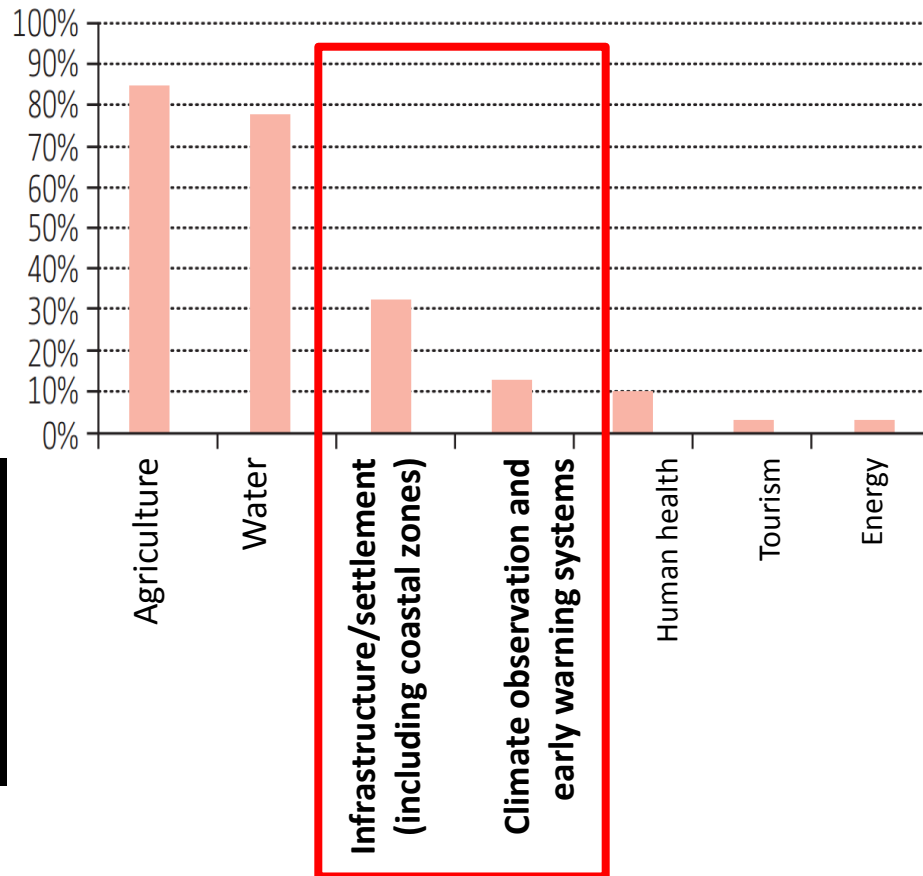
LDC Expert
Group

High-Level
Champions



Why coastal zone technologies?

Prioritized sectors for adaptation technologies:
(Source: 3rd synthesis report on TNA)



- Agriculture (82%)
- Water (77%)
- Infrastructure/settlements incl. coastal zones (32%)
- Climate observation and early warning systems (10%)

- TEC had already undertaken deeper analysis focusing on adaptation technologies in **agriculture** and **water** sector
- TEC recommended **technologies for coastal zone** as a common areas of interests to collaborate with WIM Excom



Categorization of technologies

- Technologies are often classified into three types:
 - **Hardware/Hard technologies:** physical equipment and capital goods
 - **Software/Soft technologies:** processes, knowledge and skills required using the technology
 - **Orgware/Organisational technologies :** Ownership and institutional arrangements pertaining to a technology
- TEC and WIM Excom agreed that the scope of the joint policy brief will cover hardware, software and orgware.



Thank you!

