Kick-off Workshop on Mainstreaming Climate Change Adaptation Planning in Human Settlements Sector

13-14 July 2017, Amari Watergate Hotel
Bangkok

DAY 1
What does Climate Change mean to the Human Settlements?

*Overview of the session:*

- Terms & Definitions
- Concept of Climate Risk Assessment
- Introduction of Impact Chains Concept
- Presentation of the Human Settlements sector impact chain
- Group Work
Current Status

- **NAP Training**
- **SNAP**
- **GAP Analysis** → **Impact Chain Development** → **Quantification of Impact Chains** → **Mainstreaming**

National

- **1st Draft NAP**
- **Introduction to M&E**

Sub-national

- **ONEP NAP Preparation**
- **Vulnerability Assessment**
- **Scoping study and Selection of Pilot Areas**
- **CC Risk Assessments**
- **CCA in Planning Processes**
- **Identify Adaptation Measures**

- **Final NAP**

- **Guideline**
Why impact chains in Thailand?

- To deepen the findings of the national Vulnerability Assessment study conducted in 2015
- To strengthen the sector-wise assessment of climate change impacts

**Aim**: Increase the understanding of climate risks within each sector

→ *How does climate (change) drive risks?*

**Outputs**:

- 6 national, sector-based impact chains
- Integration of sectoral impact chains in the first NAP draft
Impact Chain components

- Climate driver
  - Temperature change
  - Precipitation change
  - Ocean acidification
  - Sea Level Rise

- Hazard
  - 1st range hazards
  - 2nd range hazards
  - Sector-specific hazards

- Exposure

- Vulnerability
  - Sensitivity
  - Adaptive capacity

- Risk

- Sector mission
Applying the AR5 risk approach to CC impact chain components - *definitions*

Climate driver

The most relevant climate-related variables for South East Asia as identified in the IPCC AR5 (Chapter 24)

- Temperature change
- Precipitation change
- Ocean acidification
- Sea Level Rise
Applying the AR5 risk approach to CC impact chain components - definitions

The potential occurrence of a natural or human-induced physical event or trend or physical impact that may cause loss of life, injury or other health impacts, as well as damage and loss to property, infrastructure, livelihoods, service provision, ecosystems and environmental resources.

Term refers to climate related physical events or trends or their physical impacts. (IPCC 2014)

- 1st hazard range: overall impacts induced by changing climate-related variables [climate drivers] due to rising GHG concentration in the atmosphere
- 2nd hazard range: specific impacts induced by changing climate-related variables [climate drivers]
- Sector-specific hazards: specific and particularly relevant hazards for the sector/system under review
Applying the AR5 risk approach to CC impact chain components - definitions

Vulnerability

- Physical/biological and socio-economic attributes of a system/sector.

**Sensitivity**

- The whole of capabilities, resources and institutions of a country, region, or sector allowing to implement effective adaptation measures. (IPCC, 2007)
- Adaptive capacities = building resilience on the long term (looking at climate changes)
- Coping capacities = actions that communities adopt to confront CC impacts in the short term (weather changes)
Applying the AR5 risk approach to CC impact chain components—definitions

- The **potential for consequences** where something of value is at stake and where the outcome is uncertain.
- Risk as the probability of occurrence of hazardous events or trends multiplied by the impacts if these events or trends occur.
- \( R = f(V, E, H) \)
- Term risk refers to the risks of climate-change impacts.

IPCC, 2014
Applying the AR5 risk approach to CC impact chain components - definitions

Sector mission

The official mandate or development goal of the sector (e.g. Mission Statement).
Human Settlement sector impact chain
(June 2016 WS)
Human Settlements impact chain