



**Integrated Climate
Information
Management
Systems (ICIMS):
Introduction to the
Workshop**

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Outline

- Climate Change Research at IPS
- Integrated Climate Information Management Systems (ICIMS)
- Objectives of the Workshop



Institute of Policy Studies (IPS)

- Apex policy research institute in Sri Lanka
- An independent Think Tank
- Established in 1989



INSTITUTE OF POLICY STUDIES OF SRI LANKA

Climate Change Research in IPS

- **Vision:**
 - Mainstreaming climate change policy for sustainable development in Sri Lanka
- **Objective:**
 - Inform policy makers on innovative ways to face the challenge of climate change
- **Approach** : Consultative and collaborative
- Environmental Economics Policy Unit spearheads climate change studies in IPS



Five Gaps Model

- **Model of 5 major gaps acting as policy challenges**
 - **Information gaps**
 - **Technological gaps**
 - **Policy Gaps**
 - **Institutional gaps**
 - **Resource mobilization gaps**



National Adaptation Plan 2016-2025

- **A rolling plan**
 - To be revised periodically according to changing conditions
- A selection of practical interventions with responsible stakeholders
 - 9 economic sectors
 - 10 cross-cutting areas
- Guided by principles and direction of National Climate Change Policy (NCCP)
- Prepared according to NAP guidelines of the UNFCCC
 - NAP Process

*CLIMATE*net and Blog

- **Networking facility for all stakeholders**
 - Exchange of **views - Blog**
 - Sharing of **resources**
 - Research articles/reports
 - Policy documents
 - Links to vital sources
 - Dissemination of **information - News**



Climate Risks & Farmers

- **Farmers**

- Vulnerable to climate risk on daily basis
- Inherently adaptive

- **Rain-fed & Irrigated farmers**

- **Rain-fed** : Naturally more vulnerable to climate uncertainty

- **Other shocks**

- Transformation of local institutions (Ostrom, 1991; Agrawal, 2001)
- Degradation of local resources: land, forest, water
- Decline of traditional systems: e.g. traditional knowledge

Climate Information



- A time gap exists between decisions and outcomes
- Uncertainty creates demands for information
 - risky choices

Climate Information Products (CIPs)

- Mainly refers to probabilistic weather and climate forecasting products
- Predict future weather and climatic events with a time lag (lead time): e.g.
 - Short term weather forecasts
 - Seasonal precipitation forecasts
 - Long-term projections
- Supply of CIPs need sophisticated technology and advanced scientific knowledge

Farmers' local climate knowledge

- **Perceptions and expectations about local climate**
 - Play a major role in farmers' decisions (Hansen et al., 2004; Marx et al., 2007)
- **Shared beliefs & local indicators on climate**
 - Guide farmers' decisions on daily basis
 - Strong empirical evidence (Roncoli et al., 2002; Lybbert et al., 2007; Orlove et al., 2007)
 - Long-term collective memory based on a social process of transmission

Farmers forecasts and beliefs

- Beliefs about local seasons and average pattern about variability
- Beliefs about intra-seasonal variability
- Users forecasts: local climatic indicators
- Probabilistic CIPs Vs. Local knowledge
 - Substitutes or Complements?

Climate Information Gap

- Gaps in supply of information
 - Farmers' climate information needs vs. available sources of information
 - Probabilistic CIPs vs. local climate knowledge
 - Declining reliability of local climate knowledge
 - Lack of dependable probabilistic CIPs
- Gaps in communication of information
 - Constraints and barriers to access CIPs
 - Available channels vs. desired channels of communication
 - Limitations in format and content

Integrated Climate Information Management Systems (ICIMS)

- Farmers use CIPs and expectations based on local knowledge in their decisions
- Information from CIPs and local knowledge could complement each other
- ICIMS
 - To combine the strengths CIPs and local knowledge
 - To overcome weaknesses by complementing each other
 - To offer complete decision support solution for bridging supply and communication gaps



Objectives of the Workshop

- Share the knowledge and experience of climate information management in different countries
- Assess the strengths and weaknesses of different climate information management models
- Identify suitable models for pilot-testing among vulnerable farming communities
- Build a network on ICIMS





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