Working Towards Improving Resilience and Adaptive Capacity to Climate Change in the Hindu-Kush-Himalayan Region

ANU Climate Change Institute

Newsletter April 2013

Activity aims

The aim of this new project "Working Towards Improving Resilience and Adaptive Capacity to Climate Change in the Hindu-Kush-Himalayan Region" (PSLP-IRAP) is to use participatory approaches to identify the risks, vulnerabilities and opportunities arising from climate change impacts on small upstream communities in Nepal and India and downstream communities in Bangladesh. The project will facilitate capacity to help communities cope better with those risks and vulnerabilities identified. A key objective is the development of a transferrable climate change adaptation toolkit, which is based on a set of scientific and evidence based methodologies or tools to guide local planners and policy makers during the adaptive response planning process. Such tools include, but are not limited to, risk assessment scenarios, conceptual modeling, stakeholder identification, and adaptive management scoping studies.

This project is supported by the Public Sector Linkages Program (PSLP) under the auspices of AusAID. The Australian National University Climate Change Institute's (ANUCCI) lead public sector counterpart agency is the Monsoon Asia Integrated Regional Study (MAIRS), Chinese Academy of Sciences.

Activity progress

This collaborative research project aims to develop an integrated climate adaptation toolkit that can be used by key decision makers as a guide for national planning and local capacity building.

Key components of the project

(1) Identification of key pilot sites to establish the context

(2) Engagement with Government officials and community groups

(3) Collection of relevant bio-physical, socio-economic and cultural data

(4) Synthesis of scientific data and field investigations

(5) Capacity building through interactive research and training programmes

(6) Creation of a knowledge platform for dissemination and exchange

(7) Coordination of results with existing National and Local Adaptation Plans for Action

(8) Integration of evidence based policy analysis for the development of the Climate Change Adaptation Toolkit

(9) Development of a roadmap for the expansion of the toolkit methodology to other countries in region (i.e Bangladesh and India)

Australian AID

Australian National University

MAIRS

Steering Committee members, Guangzhou, China.

Steering Committee meeting in Guangzhou, China

A steering committee was convened at the commencement of the project to monitor and evaluate all stages of the project and to ensure that the aims and objectives of the project are conducted in a satisfactory and timely manner. The steering committee's role throughout the life of the activity is to also communicate the objectives and results of the project to the broader research/policy community, and develop a road map or strategic plan for implementation and expansion of the toolkit beyond the current life of the project.

The first steering committee meeting was held in Guangzhou, China on Wednesday 27th March, 2013. The primary objective of this meeting was to select a suitable study site and to outline the approach taken to develop the toolkit in consultation with government and community groups. This meeting was held in conjunction with the 8th MAIRS Scientific Steering Committee (SSC). An overview of the PSLP-IRAP project was presented to Chinese Government officials and members of the SSC.

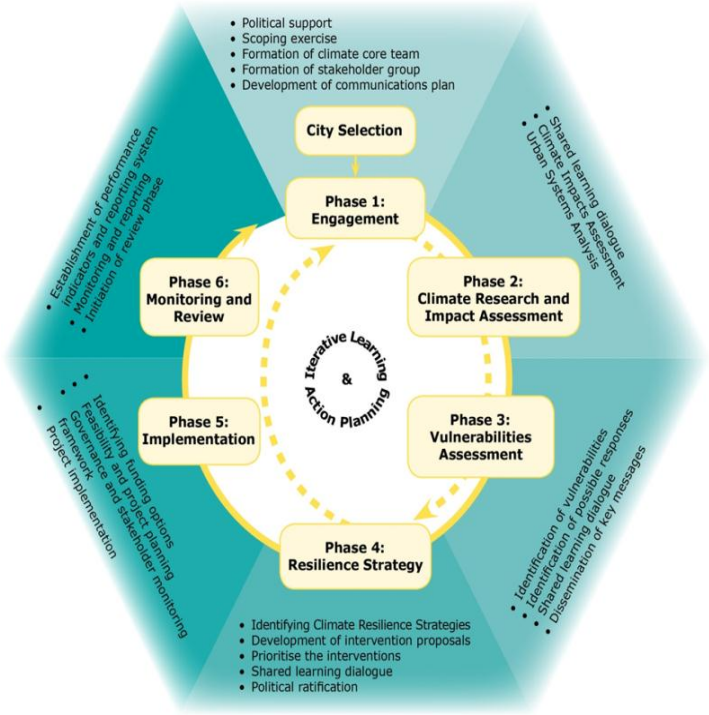
Dr Lance Heath from the Australian National University's Climate Change Institute provided an overview of the PSLP IRAP project at the 8th MAIRS Scientific Steering Committee meeting in Guangzhou, China.

ICLEI South Asia, in collaboration with ICLEI Oceania, with support from the Rockefeller Foundation's Asian Cities Climate Change Resilience Network (ACCCRN) programme, has developed a toolkit, referred to as the ICLEI ACCCRN Process (IAP) to enable local governments to assess their climate risks and vulnerabilities, and to formulate adaptive response plans accordingly. To date, this toolkit has been tested in three Indian cities – Shimla, Bhubaneswar and Mysore – and has undergone further refinement.

The Climate Change Institute is working closely with ICLEI Local Governments for Sustainability to modify the IAP for the purpose of this project and to ensure that it is relevant for peri-urban and rural areas.

Mr Sunandan Tiwari from ICLEI - Local Governments for Sustainability - South Asia Secretariat described the ICLEI ACCCRN process to steering committee members at the Guangzhou workshop. The IAP process has four basic components:

Engagement: Phase 1 begins with the site selection process and to seek support from government and community groups.



ICLEI ACCCRN Process (IAP).

Mr Sunandan Tiwari from ICLEI - Local Governments for Sustainability - South Asia Secretariat provided an outline of the climate change adaptation toolkit and described the IAP process to steering committee members.

Climate Research and Impact Assessment: This phase involves a Shared Learning Dialogue (SLD) with the stakeholder groups. This interaction aims to have a mutual learning and sharing of experiences. An assessment of past climate trends and future climatic projections is conducted. Fragile systems are identified and a risk assessment is carried out in order to prioritise these urban systems in terms of their likelihood to be impacted by changing climate and the associated consequences resulting from these impacts.

Vulnerabilities Assessment: This phase helps in identifying the key vulnerabilities of each fragile urban system. It determines the spatial vulnerability of the city for each fragile system. It also identifies the vulnerable population and the potential supporting actors for each system. This information is gathered in consultation with key stakeholder groups through SDL.

Resilience Strategy: The relevant resilience interventions for the city are identified. These interventions are prioritised on the basis of resilience indicators, their feasibility and applicability.

Capacity building

There is a growing demand for research to provide information for a deeper and more useful understanding of resilience, adaptive capacity, and more importantly for more effective methods to meet this increasing demand from policy decision makers. The project activities will address these issues by strengthening research and institutional capacity. In doing so methodological approaches will be improved, assisting decision makers in finding effective strategies that will help communities adapt to the impacts of climate change.

Source to sink approach to managing climate change risks

To ensure the effective uptake of the toolkit across the Hindu Kush-Himalayan (HKH) region, a road map will be developed for the further expansion of the toolkit to include India and Bangladesh.

Associate Professor Katherine Morton from the Australian National University's Department of International Relations provided an opening address at the PSLP IRAP Steering Committee meeting in Guangzhou, China.

Dr Ailikun from MAIRS, Institute of Atmospheric Physics, Chinese Academy of Sciences, Beijing, China (left) and Ms Colette Gilmour from the ANU Climate Change Institute in Guangzhou, China (right).

Dr Paul McShane from the Monash Sustainability Institute (MSI).

The ANUCCI is also working closely with the Monash Sustainability Institute (MSI). This current project links to a related PSLP project led by MSI titled: "Knowledge management for a collaborative response to water resource allocation in response to climate change." This project takes a broader approach to identify mutual benefits arising from collaboration among riparian states. MSI will bring an urgently needed *Knowledge Sector* development component to the project to enhance knowledge sharing and information dissemination.

Steering Committee meeting in Guangzhou, China.

China
Dr. Ailikun, MAIRS-IPO
Dr. Hua Ouyang, IGSNRR
Prof. Yili Zhang, IGSNRR
Dr. Linshan Liu, IGSNRR
Ms. Ying Yang, MAIRS-IPO

Nepal
Professor Narendra Raj Khanal, Tribhuvan University
Dr. Prem Sagar Chapagain, Tribhuvan University
Dr. Madan L. Shrestha, NAST
Dr. Mandira Shrestha, ICIMOD

Bangladesh
Dr. Ahsan Uddin Ahmed, CGC
Professor Shaikh Abdus Salam, University of Dhaka

India
Prof. Prakash C. Tiwari, Kumaun University
Mr Sunandan Tiwari, ICLEI, South Asia Secretariat

Australia
Associate Professor Katherine Morton, ANU
Dr Nasreen Khan, ANU
Dr Jagannath Adhikari, ANUCCI
Dr Paul McShane, MSI
Ms Colette Gilmour, ANUCCI
Dr Lance Heath, ANUCCI

For more information, visit the ANU Climate Change Institute's website at:

http://cci.anu.edu.au/researchers/research/programs/projects/climate-change-and-the-third-pole/

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