

## WCRP CORDEX South Asia Training Workshop

(in partnership with CCCR-IITM, START, ICTP, CSAG, SMHI & ICSU-ROAP)

17 - 20 October 2012

Indian Institute of Tropical Meteorology (IITM)  
Pune, India

### AGENDA

#### Wednesday, 17 October 2012 (Day 1)

#### **09:00 - 09:30 Registration**

#### **09:30 - 10:55 Inaugural session (Chair: B. N. Goswami) - (Venue: Varahamihira Hall)**

09:30 – 09:35 Invocation and lighting the lamp

09:35 – 09:45 Welcome address -- (*B. N. Goswami, Director, IITM*)

09:45 – 10:00 The World Climate Research Program (*Michel Rixen, WCRP, WMO, Geneva, Switzerland*)

10:00 – 10:15 Global change and scientific capacity and training: workshop expectations (*Hassan Virji, START, USA*)

10:15– 10:45 **CO**ordinated **R**egional climate **D**ownscaling **EX**periment (CORDEX) - Overview and Challenges for the South Asia Region (*Colin Jones, SMHI, Sweden*)

10:45 – 10:50 Announcement -- (*R. Krishnan, CCCR, IITM*)

10:50 – 10:55 Group photograph

#### **10:55 - 11:30 Tea/Coffee Break**

#### **11:30 - 13:00 Overview of CORDEX South Asia and activities in the region (Chair: Michel Rixen, Rapporteur: J. Sanjay) - (Venue: Aryabhata Hall)**

11:30 – 12:00 CORDEX South Asia Co-ordination: Role of CCCR-IITM and Partners (*R. Krishnan, CCCR-IITM, India*)

12:00 – 12:30 Analysis, Interpretation and Application of CORDEX data for Vulnerability, Impact and Adaptation (VIA) research: Lessons from the CORDEX-Africa Experience (*Chris Lennard, CSAG, South Africa*)

12:30 – 12:45 Specific Projects and Opportunities in APN related to CORDEX-South Asia (*Linda Stevenson, APN, Japan*)

12:45 – 13:00 ADB development & capacity building priorities in South Asia (*Christine Chan, ADB, Manila*)

#### **13:00 - 14:00 Lunch Break**

14:00 – 14:30 Regional Climate Projections from CCAM (*John McGregor, CSIRO, Australia*)

**14:30 – 15:30 Interactions with participants and understanding user needs for VIA sectors (eg., Climate extremes, Water resources, Agriculture, Health, Ecology & Forests) - (Moderator: Colin Jones, Rapporteur: Milind Mujumdar)**

#### **15:30 - 16:00 Tea/Coffee Break**

**16:00 – 17:00 Summarize and synthesize the outcomes of interactions towards capacity building in the South Asian region - (Moderators: Chris Lennard, R. Krishnan)**

**19:30 -21:30 Dinner hosted by IITM**

**Thursday, 18 October 2012 (Day 2)**

**09:00 – 11:00 Evaluation and validation of regional climate projections (Chair: R. Krishnan, Rapporteur: Michel Rixen)  
(Venue: Aryabhatta Hall)**

09:00 – 09:30 Friederike Otto: Validation & interpretation of high resolution climate simulations

09:30 - 10:00 Paul Ramirez: Regional Climate Model Evaluation System (RCMES, JPL)

10:00 – 10:30 Neil Massey: Quantifying regional climate extremes: Weather at Home

**10:30 – 11:00 Brief introduction on the training modules (Chris Lennard)**

- Climate Data Analysis Module: CDA1 (CORDEX South Asia: Climate model outputs) – Mean & Variability – Sanjay + Team (Colin Jones, Paul Ramirez, M.Mujumdar, Revadekar, Friederike Otto, Roxy Mathew)
- Climate Data Analysis Module: CDA2 (CORDEX South Asia: Climate model outputs) – Extremes – Sabin + Team (Neil Massey, Revadekar, Milind Mujumdar, Sabade, Ashwini Kulkarni, S. Pawardhan, R. Vellore)
- Climate Data Analysis Module: CDA3 (CORDEX South Asia: Climate model outputs) – Model uncertainties – Ashwini Kulkarni + Team (Jinwon Kim, Sabin, Savita Patwardhan)
- VIA Applications Module: VIA1 (Vulnerability and Uncertainty) – Chris Lennard + Team (Jinwon Kim, Paul Ramirez)
- VIA Applications Module: VIA2 (Hydrological impacts) - Vimal Mishra and Balaji Narasimhan
- VIA Applications Module: VIA3 (Development of mini policy document) – Chris Lennard + Team ( Shrikant Jagtap, Narendra Shah, Senthilnathan, Sanjay, Krishnan)

**11:00 - 11:30 Tea/Coffee Break**

**11:30 – 13:00 Training: Analysis, evaluation, interpretation and VIA applications (TG1: Aryabhatta Hall, TG2: CAT Hall)**

Training Group TG1: Module VIA2 – Assess hydrological impacts – Vimal Mishra and Balaji Narasimhan

Training Group TG2: Module VIA1 – Introduce vulnerability, explore uncertainty – Chris Lennard

**13:00 - 14:00 Lunch Break**

**14:00 – 15:30 Training: Analysis, evaluation, interpretation and VIA applications (TG1: Aryabhatta Hall, TG2: CAT Hall)**

Training Group TG1: Module VIA1 – Introduce vulnerability, explore uncertainty – Chris Lennard

Training Group TG2: Module VIA2 – Assess hydrological impacts - - Vimal Mishra and Balaji Narasimhan

**15:30 - 16:00 Tea/Coffee Break**

**16:00 – 17:20 Understanding uncertainties in regional climate projections and their impacts** (Chair: C. Jones, Rapporteur: Jayshree Revadekar) – (Venue: Aryabhata Hall)

16:00 – 16:20 Jinwon Kim: Uncertainties in climate projections: Evaluating RCM skills

16:20 – 16:40 Shrikant Jagtap: Agricultural adaptation strategies in response to climate change

16:40 – 17:00 H. Annamalai: Uncertainties in the CMIP5 projections of the South Asian monsoon

17:00 – 17:20 Faisal Syed Saeed: Uncertainties in RCM simulations of South-Asian monsoon and climate change

**19:30 -21:30 Dinner hosted by WCRP**

**Friday, 19 October 2012 (Day 3)**

**09:00 – 10:00 Tools for analysis, evaluation and application of climate downscaling** (Chair: Chris Lennard, Rapporteur: Colin Jones) – (Venue: Aryabhata Hall)

09:00 – 09:30 Roxy Mathew: Analysis Tools: Climate Data Operators (CDO), GrADS/Ferret

09:30 – 09:45 J. Sanjay: CORDEX South Asia climate model outputs

09:45 – 10:00 Milind Mujumdar: Observed datasets, CCCR climate portal

**11:00 - 11:30 Tea/Coffee Break**

**11:30 – 13:00 Hands-on training: Analysis, evaluation, interpretation & VIA** (**TG1:** CAT Hall, **TG2:** Aryabhata Hall)

Training Group TG1: Module CDA1 – Analysis of CORDEX South Asia model data

Training Group TG2: Module CDA3 – Analysis of CORDEX South Asia model data

**13:00 - 14:00 Lunch Break**

**14:00 – 15:30 Hands-on training: Analysis, evaluation, interpretation and VIA** (**TG1:** Aryabhata Hall, **TG2:** CAT Hall)

Training Group TG1: Module CDA2 – Analysis of CORDEX South Asia model data

Training Group TG2: Module VIA3 – Develop mini policy document – Chris Lennard

**15:30 - 16:00 Tea/Coffee Break**

**16:00 – 17:30 Training: Analysis, evaluation, interpretation and VIA applications** (**TG1:** Aryabhata Hall, **TG2:** CAT Hall)

Training Group TG1: Module CDA3 – Analysis of CORDEX South Asia model data

Training Group TG2: Module CDA1 – Analysis of CORDEX South Asia model data

**Saturday, 20 October 2012 (Day 4)**

**09:00 – 11:00 Hands-on training: Analysis, evaluation, interpretation and VIA** (**TG1:** CAT Hall, **TG2:** Aryabhata Hall)

Training Group TG1: Module VIA3 – Develop mini policy document – Chris Lennard + Team

Training Group TG2: Module CDA2 – Analysis of CORDEX South Asia model data

**11:00 - 11:30 Tea/Coffee Break**

**11:30 – 12:30 Outcomes of workshop, feedback from training groups and way ahead** (*Chair R. Krishnan, Rapporteur: Chris Lennard*) – (**Venue: Aryabhata Hall**)

11:30-11:45 Requirements of community towards a regional consortium for data platform (Christine Chan, ADB)

11:45-12:15 Feedback from training groups TG1 and TG2 (Chris Lennard)

12:30-12:45 Outreach and publications (Colin Jones)

12:45-13:00 Conclusions and way ahead (R. Krishnan)

**13:00 - 14:00 Lunch Break**