

Technical Programme

IITD-ANCST International Workshop on “Modeling Atmospheric Oceanic Processes for Weather and Climate Extremes” (March 28-29, 2019)

DAY 1 (28-03-2019)	
Inaugural Session: 09:30 - 10:30 am (Senate Hall, Main Building) Chief Guest: Dr. M. Rajeevan, Secretary, MoES, GoI Presided by: Prof. V. Ramgopal Rao; Director, IIT Delhi	
Tea break: 10:30 - 11:00 am	
Session 1: Challenges in operational forecasts of extreme weather events (11:00 am - 1:00 pm) (Chair: Prof. Edvin Aldrian, IPCC WG-I Vice - Chair; Rapporteur: Dr. Amita Prabhu)	
11:00 - 11:25	Dr. K. J. Ramesh, DG IMD, Delhi Atmospheric-Ocean modelling systems in improving Short-range to seasonal forecast
11:25 - 11:50	Prof. U.C. Mohanty, IIT Bhubaneswar Extreme Weather Events over India: Observations and Predictions
11:50 - 12:10	Dr. MFA Bin Abdullah, Malay Met Dept, Malaysia City Scale Forecasting: Extreme Rainfall Events over Kuala Lumpur
12.10 - 12:30	Dr. A.K. Mitra, NCMRWF, Noida Implementation of a Seamless Modelling System at NCMRWF for Weather/Climate
12:30 - 12:50	Dr. Manish Modani, The Weather Company (IBM), Bengaluru Numerical Weather Prediction at IBM/The Weather Company: Overview of a Global Rapidly-Updating Forecast System
Lunch: 1:00 pm - 2:00 pm; Venue: Faculty Guest House	
Session 2 (2:00-4:00 PM) Atmospheric-Oceanic processes: Mechanisms, drivers and feedbacks leading to extremes (Chair: Prof. U.C. Mohanty; Rapporteur: Ankur Prabhat Sati)	
2:00 - 2:25	Prof. A. Chandrasekar, IIST, Thiruvananthapuram Improved 4DVar simulation of Uttarakhand heavy rainfall event using the WRF model

2:25 - 2:50	Prof. A. D. Rao, IIT Delhi Storm surges and its coastal inundation along the Indian coasts: a climate change scenario
2:50 - 3:10	Dr. S. Sijkumar, SPL-VSSC, Thiruvananthapuram Influence of Atmospheric Waves in the cyclogenesis of the Ockhi Cyclone
3:10 - 3:30	Dr. Srivatsan VijayRaghavan, NUS, Singapore High Resolution Climate simulations at cloud resolving scales over Singapore using WRF
3:30 - 3:50	Prof. Ashok Karumuri, University of Hyderabad Relevance of Recent Background Changes for Extreme Rainfall Events: Tale of Two Cities
Tea break: 3:50 – 4:15 pm	
Session 3 (4:15 -6:00 pm) Role of environmental factors on extreme weather events (Chair: Prof. A. D. Rao, Rapporteur: Sachiko Mohanty)	
4:15 – 4:40	Prof. Edvin Aldrian, BMKG, Indonesia Climate and atmosphere variability and their impact to the maritime continent ocean climate interaction
4:40 - 5:00	Dr. Yuya Takane, AIST, Japan Urban warming and future air-conditioning use in an Asian megacity: Importance of positive feedback process
5:00 - 5:20	Dr. D. Bala Subrahmanyam, SPL-VSSC, Thiruvananthapuram Predictability of the “OCKHI (A Very Severe Cyclonic Storm)” - Facts and Myths: Take-Home Messages for the Atmospheric Modellers
5:20 - 5:40	Dr. Ramesh Vellore, IITM Pune Himalayan Precipitation Extremes: Large-scale Dynamics
5:40 - 6:00	Dr. Hari Prasad Dasari, KAUST, Saudi Arabia Variability of Planetary Boundary Layer Height over the Arabian Peninsula
Dinner from 7:00 pm onwards (ESSEX Convention Centre)	
DAY 2 (29-03-2019)	

Session 4 (9.00 -11.00 am); Venue: Senate Room, Main Building Observations, diagnostic analysis and case studies for extremes (Chair: Prof. Maithili Sharan, Rapporteur: Sandeep K. K.)	
09:00 – 09:25	Prof. G. S. Bhat, IISc Bengaluru Wind Extremes over India
09:25 – 09:50	Prof. SSVS Ramakrishna, Andhra University North Indian Ocean Severe Cyclones and the associated Physical Processes
09:50 – 10:10	Representative from TSI instruments
10:10 – 10:30	Dr. Sheeba Chenoli, University of Malaya, Malaysia Case studies of extreme Rainstorms that Caused Devastating Flooding across the East Coast of Peninsular Malaysia during Northeast Monsoon
10:30 - 10:50	Prof. Suneet Dwivedi, University of Allahabad Novel Scale Adaptive Energetically Consistent Kinetic Energy Backscatter Schemes For Atmospheric Models
10:50 - 11:00	Dr. Prashant Kumar, NIT Delhi CMIP5 Projection in Significant Wave Height in Indian Ocean under the RCP4.5 and RCP8.5 Scenario
Tea break: 11:00 - 11:30 am Venue: Lecture Hall Complex (LHC) Foyer	
Session 5: Poster session (11:30 am – 1:00 pm); LHC Foyer	
Lunch: 1:00 pm – 2:00 pm; LHC	
Session 6 (2:00-4:00 PM); Venue: LHC111 Assessment of projected changes of extremes in warming climate (Chair: Dr. R. K. Mehajan, Rapporteur: Medhavi Gupta)	
2:00 – 2:25	Prof. D. Sengupta, IISc Bengaluru River water and Bay of Bengal cyclones
2:25 – 2:50	Prof. Someshwar Das, Central University of Rajasthan Modelling & Forecasting of Severe Storms over the Himalayas and Adjoining Regions
2:50 – 3:10	Dr. R.K. Jenamani, IMD, Delhi Understanding Large-scale and Meso-scale Process lead to Extreme dense Fog/smog Spells across IGP and at IGI Airport

3:10 – 3:20	Dr. Amita Prabhu, IITM Pune Impact of Eurasian snow extremes, Atlantic Sea Surface temperature and Arctic Oscillation on summer monsoon rainfall variability
3:20 - 3:30	Dr. Anurag Kandya, PDPU, Gujarat Investigating the Dynamics of Urban Heat Islands of Megacity Delhi
Tea break: 3.30 - 4:00 pm	
Session 7: Panel discussion (4:00 pm - 5:15 pm)	
Panelists: Dr. K. J. Ramesh, Dr. Akhilesh Gupta, Dr. Swati Basu, Dr. R.K. Mehajan, Prof. Manju Mohan	
Valedictory and concluding session (5:15 pm - 6:00 pm)	
High Tea 6:00 pm	