

e-Resilience in Developing Countries

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Panel Session: "Information and Communication Technologies in the Anthropocene".

Amidst the unmistakable signs of a changing global climate, the challenges faced by developing countries to overcome poverty and marginalisation are rapidly intensifying. Emerging evidence indicates that both acute (i.e. extreme weather events) and chronic climate effects (i.e. longer-term changes in the environment) magnify existing development vulnerabilities in areas such as livelihoods and finance, socio-political conditions, health, habitat and migrations, food security and water. Thus, the magnitude and uncertainty of climate change-related impacts pose the need for innovative responses and increased resilience of developing countries, in order to better withstand, recover from, and adapt to the changing conditions*.

Within this context, the role of information and communication technologies (ICTs) is starting to emerge and to shed light on new approaches to respond, prepare for, and adapt to climate change impacts. Emerging experiences from vulnerable communities in Asia, Africa, Latin America and the Caribbean suggest that the use of applications such as mobile phones and the Internet can contribute to climate change responses, including the strengthening of local livelihoods, access to relevant information and networking opportunities, training and awareness raising, among others.

Recognising the close links that exist between climate change vulnerability and the achievement of development outcomes, alongside the increasing use of ICT tools within developing contexts, the objective of this presentation is to explore and foster discussion about the role of ICTs in building resilience to climate change.

The concept of 'e-resilience' will be introduced as an emerging area of study to understand how innovative ICT tools and approaches can strengthen the response of vulnerable systems to the challenges and uncertainty posed by climate change, while suggesting a conceptual approach for the analysis of ICTs' role towards resilience within vulnerable livelihood systems. The presentation will also identify some of the key opportunities and challenges for these tools in enhancing community and national resilience, as well as emerging areas of inquiry in this field.

As research at the intersection of ICTs, climate change and development continues to evolve, the analysis of 'e-resilience' can provide us with valuable insights into the role of ICT tools to strengthen the adaptive capacities and livelihood strategies of developing contexts facing climatic uncertainty.

The presentation will be based on the findings of the 'Climate Change, Innovation and ICTs' project, a two-year applied research initiative to generate practice-based evidence on the potential of ICTs to respond to the

challenges posed by climate change in developing countries, led by the Centre for Development Informatics at the University of Manchester with the support of Canada's International Development Research Centre (IDRC).

Further information can be found at:

Centre for Development Informatics (CDI): <http://www.manchester.ac.uk/cdi/>

Find online documents on ICTs, climate change and development at the project site: <http://www.niccd.org/>

Comment via the blog on ICTs, climate change and development: <http://niccd.wordpress.com>

Join the ICTs, Climate Change and Development group and share ideas: <http://groups.google.co.uk/group/niccd>

*Resilience is seen as a systemic property that allows livelihood systems to cope with the effects of climate change-related hazards, variability and trends. It involves the ability to withstand, recover and change; the first two being associated with acute climate change-related events, the latter with chronic climate change.