



BRAC AND MIT WILL EMPOWER COMMUNITIES TO BETTER PLAN FOR AND RESPOND TO CLIMATE CHANGE



## BANGLADESH - A Nexus of Climate Risk

- Bangladesh is experiencing extreme heat waves, rising seas, pervasive flooding, and storms
- Estimates suggest that by 2050, climate change will displace 1 in 7 people in Bangladesh
- The growing crisis requires a new, proactive approach to climate resilience

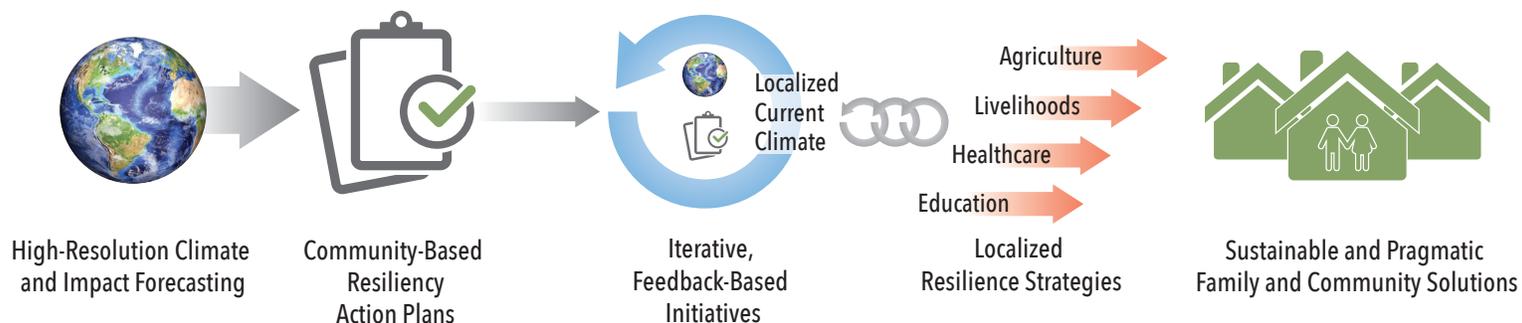
## Our Solution is CREWSnet: The Climate Resilience Early Warning System Network

Early warning and decision support systems are proven tools for saving lives and reducing suffering. CREWSnet combines state-of-the-art climate and socioeconomic forecasting techniques with resilience technologies and strategies to empower communities, diversify livelihoods, and save lives.

CREWSnet creates a comprehensive framework for predicting climate impact and creating scalable resilience strategies for communities worldwide:

- **Next-Generation Forecasting & Information Sharing:** Community-scale forecasting that enables a fundamental change in climate resilience, empowering families to interpret local climatic changes and plan for their futures
- **Enabling Proactive Adaptation:** Community-based resilience options that span agriculture, livelihoods, infrastructure, education, and financing
- **Driving Community Action:** Highly-localized forecasting that enables communities to tailor their own decisions about relocation
- **Scaling Worldwide:** Iterative refinement of CREWSnet forecasting, information sharing, and resilience technologies that creates a solution that is readily adaptable for global use
- **CREWSnet Growth:** A global open-source capability, to be implemented with partners around the world

# CREWSnet: Predicting Impacts, Designing Strategies, and Enabling Resilience



The CREWSnet system will significantly enhance forecasting resolution of local climate impacts, enabling community-based decisions in resiliency planning. This approach uses predictions from state-of-the-art modeling techniques to present options for proactive adaptation. By applying an iterative, feedback-based process that incorporates current local climate change conditions, community indicators, and resiliency actions, CREWSnet will enable these communities to adopt a pragmatic adaptation path that is tailored to their specific needs in the agriculture, economic, healthcare, education, and infrastructure sectors until a sustainable solution is achieved.

## Partnering for Impact

BRAC and MIT are seeking forward-thinking and impact-driven partners motivated to apply next-generation technologies to climate change adaptation, urban development, and other community empowerment needs. With your help, BRAC and MIT will initially focus on Satkhira, located in southwestern Bangladesh and one of the world's most climate and socially vulnerable regions. MIT will integrate its innovative, localized forecasting, information sharing, and resilience technologies into BRAC's holistic humanitarian, climate, and urban development programs. With local collaboration, the BRAC-MIT team will continuously monitor and refine resilience programs and innovations to build sustainable systems. The ultimate goal is to engage public, private, and non-profit partners in other high-risk geographies to scale these solutions across Bangladesh and the world.

For further discussions, please contact:

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## CREWSnet Team

website: [crewsnet.mit.edu](http://crewsnet.mit.edu)



Ranked the #1 NGO globally, with 48 years of experience working in Bangladeshi communities and 10 other countries to impact over 100 million people worldwide



MIT CENTER FOR GLOBAL CHANGE SCIENCE

30 years of research experience addressing the earth's natural mechanisms and environmental phenomena to guide decision-making around climate, energy, water, food, and air pollution



Develops and scales transformative technologies, including enterprise-scale decision support systems, world-leading remote sensing, and new techniques for community resilience



MIT JOINT PROGRAM ON THE SCIENCE AND POLICY OF GLOBAL CHANGE

Integrates scientific research with risk and policy analyses to project the impacts of, and potential responses to, global socioeconomic, technological, and environmental change



Co-founders received 2019 Nobel Prize in Economic Sciences, a global research network working to reduce poverty by ensuring that policy is informed by scientific evidence, informing policies that have reached over 400 million people worldwide since 2003