



Bangladesh



KEY PRIORITIES RELATED TO DRM IN THE COUNTRY

Bangladesh is highly exposed to natural hazards, including floods, cyclones and earthquakes. With its proactive hydrological policies and programs (e.g. the Emergency 2007 Cyclone Recovery and Restoration Project) Bangladesh is often cited as a positive example for investment in DRM globally. The country lies on the seismically active Indian plate, which creates significant earthquake risks. These risks are of growing

concern because Dhaka, a fast-growing urban center, is one of the 20 cities most vulnerable to earthquakes¹; urban earthquake risks are unknown and unplanned for; and ambiguity in agency responsibility and political affiliations have negatively impacted policy implementation and city governance, making it unable to keep up with the pace of urban growth, in terms of land use planning, regulation and public service delivery.

GFDRR ACHIEVEMENTS TO DATE

GFDRR is engaged in a process that aims to build consensus among national decision makers and technical experts to pursue a common goal of reducing earthquake-associated risks that could threaten the country's long-term development. This stems from the recognition that earthquake associated risks can only be addressed by instilling a culture of prevention that permeates public and private actors. This requires multiple

stakeholders to proactively address seismic risk in order to increase resiliency to earthquake events. Thus, the program is actively engaging stakeholders in a multi-year process to increase the collective understanding of risk, identify major disincentives for resilient development, support planning for prevention and gradually shift towards a more proactive approach towards resilient development.

LOOKING AHEAD

The purpose of the ongoing engagement is to increase ownership and understanding of seismic risk reduction by: (i) reaching consensus on improved enforcement of regulation; (ii) finding a platform of hazard and vulnerability data to stimulate resilient development and decision-making tools; and (iii) developing programs in seismic engineering certification and

mason and bar-bender training. Such advances are expected to translate into an investment program designed to increase resilience to seismic risk in urban environments. Further GFDRR financed activities, led by the government, will support the allocation of approximately US\$5 billion of investments to be financed over a 10-year period.

1. Earthquake Disaster Risk Index, Blume Earthquake Engineering Center, Stanford University

Background

CLIMATE CHANGE & DISASTER RISK PROFILE

Bangladesh is a low-lying country on the largest delta in the world formed by the Ganges, the Brahmaputra and the Meghna rivers. It has one of the highest population densities in the world.

The climatic features of Bangladesh are driven by the annual monsoon during which approximately 80% of the annual rainfall occurs, often leading to major floods. During the transitional pre- and post-monsoon periods, there can also be severe local storms and tornadoes.

Cyclones and associated storm surges and floods have been the most important drivers in terms of the loss of human life due to natural disasters, leading to almost all of the nearly 520,000 natural disaster deaths recorded over the past 40 years. Also, significant are seismic risk and droughts, which affect the livelihoods of millions of people.

The rapid melting of snow in the upper Himalayas, coupled with increased peak discharges, could likely increase the depth and spatial extent of flooding in the Ganges-Brahmaputra Meghna Basin.

GFDRR ENGAGEMENT






Source of Funding	Australia SDTF, SRFF
Resources Awarded	US\$5,535,000
Resources Disbursed	US\$5,120,000
Number of projects	Ongoing: 2; Completed: 7

KEY INDICATORS

DRR Index²	WDI: 4/5 DRI Class: 7/7
Income Group	Low
Population	150.5 million
GDP	US\$735/capita
Poverty	31.5% of population
Urban Population	28% of total

DRM/CCA IN POLICY PAPERS

(as assessed by the DRM specialist)

Mainstreaming:	Low	High
PRSP		
WB-CAS		
UNDAF		
NAPA		
EU-CSP		

NATIONAL PLATFORM

The National Disaster Management Council (NDMC).

NATIONAL LEGISLATION

The National Disaster Management Act (2012) and Plan (2010); the Standing Order on Disasters (2010).

2. The World Development Indicators (WDI) Disaster Risk Reduction progress score is an average of self-assessment scores, ranging from 1 to 5, submitted by countries under Priority 1 of the Hyogo Framework National Progress Reports (1-5 scale; 5=best). The Disaster Risk Index (DRI) is a mortality-based index developed in order to enable comparisons of countries hit by different hazard types (7 classes; 7=high mortality).

GFDRR KEY PARTNERS

National Services	Ministry of Finance, Ministry of Planning, Ministry of Disaster Management and Relief, Ministry of Housing and Public Works, Ministry of Local Government, Rural Development and Cooperatives, Ministry of Water Resources, Ministry of Agriculture, Ministry of Food and Disaster Management (MofDG)
International Organizations	World Bank, United Nations Development Programme (UNDP), International Federation of Red Cross and Red Crescent Societies (IFRC), World Food Programme (WFP), Food and Agriculture Organization (FAO)
Regional Organizations	Asian Development Bank (ADB), South Asian Association for Regional Cooperation (SAARC), South Asia Water Initiative (SAWI)
NGOs/CSOs	Oxfam, Action Aid, CARE, Caritas, Muslim Aid, Concern International, Islamic Relief, Plan International, Practical Action, Save the Children, World Vision, Solidarités International, Bangladesh Disaster Preparedness Centre
GFDRR Donors	Australia, Canada, Denmark, European Commission (EC), Japan, Netherlands, Norway, Sweden, Switzerland, United Kingdom (UK)

Project

Description

PROJECTS AWARDED BY GFDRR 2007-2014

Urban Earthquake Resilience Project- Phase II

US\$800,000 | Start date: 2013 (Ongoing)

This is the second phase of a multi-year participatory program that will result in an earthquake mitigation strategy for cities in Bangladesh. Key elements to be completed in this phase include the Disaster/Emergency Management System (DMS), Slums, Shelter and Earthquake Resiliency elements (SSERR), and Resilience of the Water System (RWS).

Urban Earthquake Resilience - Project Phase II

US\$2,072,000 | Start date: 2012 (Ongoing)



Establishes a multi-year participatory process that will result in an earthquake mitigation strategy for Dhaka and, ultimately, the entire country. Key outputs include decision-making tools for mitigating the impact of earthquake hazards through structural and non-structural vulnerability reduction.

Support Rehabilitation in Cyclone Sidr-affected Areas

US\$3,208,000 | Start date: 2009-2013 (Completed)



Supports cyclone-resistant infrastructure rehabilitation, livelihood revival and vulnerability reduction. This project builds upon the overall World Bank cyclone assistance program (Emergency 2007 Cyclone Recovery and Restoration Project) to build resilience to future disasters.

Climate Change and Future Flood Risks for Agriculture

US\$61,000 | 2008–2009 (Completed)



Assessed the impacts of climate change on the future characteristics of floods and vulnerabilities in the context of agriculture and food security. Provided recommendations on agricultural adaptation options. This work supported the World Bank study on the "Implications of Climate Change on Food Security: A Menu of Adaptation Responses."

Agricultural Risk Insurance Feasibility Study

US\$125,000 | 2007–2010 (Completed)



Developed agricultural risk insurance products some of which public and private stakeholders, including the Government of Bangladesh, PKSF (Palli Karma-Sahayak Foundation) and the domestic insurance industry, have committed to pilot.

Improving Response and Recovery Activities

US\$79,000 | 2008–2010 (Completed)



Assessed the capacity of social protection and the livelihood needs of disaster-affected populations as a result of the training provided to the Ministry of Food and Disaster Management and other relevant ministries.

International Conference on Climate Change, Natural Disasters, and Cyclone Sidr

US\$107,000 | 2007–2008 (Completed)



Informed stakeholders on the inter-linkages between disasters and climate change to generate awareness and build consensus among development partners and stakeholders for the adoption of "build back better" principles and to mainstream disaster risk reduction in post-disaster recovery, reconstruction and development strategies.

Capacity Building in Damage and Loss Assessment

US\$301,000 | 2007–2013 (Completed)



Conducted training on Damage and Loss Assessment that built national and local multi-sector and multi-disciplinary capacities for damage and loss assessment, as well as for planning recovery and rehabilitation with adequate resources and support to communities.

Comprehensive Assessment of Cyclone Sidr Impacts and Needs

US\$383,000 | 2008–2010 (Completed)



Conducted assessment by seven donor agencies following a request for technical assistance from the government and provided: (i) a summary of the overall impact of the disaster; (ii) a financial plan for recovery and reconstruction; and (iii) a quantitative basis for initiating risk management activities.

PILLARS:



Risk Identification



Risk Reduction



Preparedness



Financial Protection



Resilient Recovery

SYNERGIES WITH OTHER STAKEHOLDERS

Australia, EU, Norway, Sweden, United Kingdom, UNDP

A consortium of donors is supporting the Comprehensive Disaster Management Program (CDMP)—Phase 2 (2010-2014). CDMP's Phase 1 laid the foundations for institutionalizing risk reduction approaches and frameworks within its host Ministry of Food and Disaster Management; Phase 2 institutionalizes risk reduction approaches more broadly across thirteen key Ministries and agencies.

World Bank

Advancing Disaster Risk Management:

Develops a National Earthquake Risk Management Strategy for Bangladesh and an Earthquake Disaster Risk Management Plan for Dhaka through a multi-stakeholder, results-oriented, participatory planning process. The Urban Earthquake Resilience Project—Phase 1 (GFDRR grant, see above), will serve as the foundation for the development of decision-making tools for mitigating the impact of earthquake hazards. Phase 2, the proposed Building Safer Cities by Improving Earthquake Resiliency Project (Japan's Policy and Human Resources Development, PHRD Fund), will complement the development of the master plan and stakeholder engagement by: (i) focusing on a specific program of technical training of the engineering and construction community (ii) enhancing building codes and (iii) piloting of resilient construction efforts.

Water Management Improvement Project:

Improves water resource management by rehabilitating damaged water infrastructure, piloting the role of local communities and enhancing the institutional performance of the country's principal water institutions.

Climatic Change, Climatic Variability, and Growth in Bangladesh:

Informs future policy recommendations and operational interventions by the World Bank. The specific task on climate change, growth and occupational choice will help to understand how people are diversifying occupational choices to offset weather-related risks and help design insurance programs that mitigate risk so that people will choose more productive occupations. It will also help to design safety net programs, which could cushion the impact of weather-related risks

Emergency 2007 Cyclone Recovery and Restoration Project:

Supports the Government's efforts to facilitate restoration and recovery from the damage to livelihoods and infrastructure caused by Cyclone Sidr and to build long-term preparedness through strengthened disaster risk reduction and management. The project includes restoration of the agricultural sector in Sidr-affected areas, reconstruction and improvement of infrastructure, including multipurpose shelters and rehabilitation of coastal embankments with "build back better" designs.

Decentralized Disaster Management and Local Governance:

Provides guidance on how local governments and communities can play effective roles in disaster management and how communities can hold local states accountable. In relation to the Local Governance Support Project (LGSP), a guidance note has been developed based on an analysis of local government and community responses to natural disasters. The project also disseminates information as to how policymakers may strengthen institutions that empower local governments and communities to effectively manage and reduce disaster risks
