
Disaster Risk Reduction – A Viet Nam context

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General information about Vietnam

Vietnam lies along the Indochina peninsula and belongs to the Southeast Asian sub-region, which covers relatively complicated terrain: countless mountains, numerous rivers, and stretching and meandering coastline. Its territory covers 2,860 small and large rivers with a total flow of about 867 billion m³ per year. The Red and Mekong rivers are two major and the most important of all. Being situated in the tropical monsoon zone close to the typhoon centre of the Western Pacific and due to its geographical location, Vietnam experiences many climate variations resulting frequent hydro-meteorological hazard events. Currently, 70% of the 73 million people in Vietnam live in areas that are subject to floods, storms, paradoxically droughts, and many other hazards, which have been increased in frequency and intensity in the recent years causing significant damages, losses of lives and economic losses. For many regions of the country repeated disasters severely hamper efforts of economic development and cause a continuing cycle of poverty.

Policy on Disaster Management in Vietnam

In Vietnam, the Central Committee for Flood and Storm Control (CCFSC) is the chief coordinating body that is responsible for disaster management in the country. CCFSC's main mandate is principally to translate the strategy into action. Each province/city has its own CFSC system and rescue teams at all levels (province, city and commune/ward levels). It is certain that only by being well prepared, communities can reduce their vulnerability to climate hazards for protecting life and property, the government of Vietnam has issued many legal documents to foster community-based disaster risk management and reduction. Among them, the most important and recent ones are (i) the decision 172 made by the Prime Minister about National Strategy for Natural Disaster Prevention, Response and Mitigation to 20201002; (ii) the government's 12 year-project on "Community awareness raising and community-based disaster risk management (CBDRM) started from 2009 to 2020; and (iii) the National Target Program responding to climate change (NTP).

Completed water-based disaster risk reduction projects in Vietnam

With an attempt to support the Government of Vietnam to strengthen capacity of the communities living in water-based disaster-prone areas to better their disaster preparedness, many disaster risk reduction projects have been implemented by NGOs in Vietnam since 2000. Those projects were implemented in different parts of Vietnam suffering from different types of water-based hazards (flood, storm surge, flash flood, etc). The following are some projects, which demonstrate good practices on disaster risk reduction in Vietnam:

- Capacity building for adaptation to climate change in Thua Thien Hue city implemented by the Canadian Centre for International Studies and Cooperation (CECI) from 2002–2005
- The Water Disaster Risk Reduction Project in Danang and Quy Nhon (UNDP–CECI) from 2004–2006
- The Enhancing Humanity Safety, Environment and Disaster Management Project (ADB Poverty & Environment Fund) ADB–CECI from 2004–2006
- A program for Hydro-meteorological Disaster Mitigation in Secondary Cities in Asia (PROMISE) funded by USAIDS from 2004–2006
- CARE –nternational in Vietnam: The Community Resilience to Natural Disaster Project (CRND) in Long An, Dong Thap provinces of Mekong Delta
- Viet Nam–Australia NGO Cooperation Agreement (VANGOCA) Project: Participatory Disaster Preparation and Mitigation Project in Dong Thap and Tien Giang Provinces from 2004–2009
- Building Resilience of Communities to Recurrent Natural hazards, particularly flash floods in the upland areas of Viet Nam (Lao Cai and Kon Tum provinces) from 2006–2007
- Asian City Climate Change Resilient Network (ACCCRN) implemented in Danang, Quy Nhon and Can Tho under Rockefeller Foundation's fund from 2008–2013

On-going ACCCR project

The Asian City Climate Change Resilient Network (ACCCRN) project is an initiative of the Rockefeller Foundation, which is for Vietnam, India, Thailand and Indonesia. In Vietnam, there are three cities selected (Danang, Quy Nhon and Can Tho) to implement this project since 2009. The project has four phases. The first two phases were completed in 2010 (Phase 1 was for city selection and Phase 2 was for partners' engagement and pilot implementation). It is now on Phase 3 starting from 2011 to 2013 and Phase 4 will be for replication.

Project partners

- RF: Rockefeller Foundation (lead organization)
- ISET: American Institution of Social and Environmental Transition. Its role is to support climate change-related research and development. Its role is to coordinate and provide technical support to local partner organizations, administration of grant funds for local partners (technical partners and three city authorities)

- ARUP: Project Consultant & Technical Assistance
- Challenge to Change (CtC): international NGO with its role to support poor communities to adapt to climate change, and advocating for behavioural change. CtC's role is to work with city authorities and local communities on participatory vulnerability analysis, supporting SLDs, awareness-raising and capacity-building, youth work, CBDRM and support to pilot projects implementation
- NISTPASS: Vietnam's National institute for Science & Technology Policy & Strategy Studies. Its role is to contract researchers on climate scenarios and impact assessment; supporting SLDs; supporting local planning; evaluation; national policy research
- City people's committee of Danang, Quy Nhon and Can Tho: The local partners (leading the project activities with support from national & international partners)

Other partners and collaborators

- ACCCRN in Vietnam requires broad cooperation with a range of national partner institutions. These include, but are not limited to: Ministry of Natural Resources and Environment Management (MONRE), Can Tho University, other research institutions, city-level technical departments, Committees for Flood and Storm Control (CFSCs), mass organisations, Red Cross, District and lower-level authorities and communities, local facilitators, civil society groups and representatives, local and international NGOs.

Project objectives:

- To experiment, test and demonstrate a range of actions to build resilience to climate change impacts in cities
- To build a base of climate change resilient lessons learnt, failures and success that can be replicated
- To assist cities to develop and implement a climate change resilience-building process
- To build capacity of cities to continue climate change resilience building activities

Project implementation process/activities:

- Shared Learning Dialogue 1 (SLD1) was organized to introduce climate change issues; identify local climate hazards; identify vulnerable groups and districts; identify key data sources and current activities
- Participatory vulnerability and capacity assessment (PVCA)
- City-level climate impact assessments
- SLD2 was organized to review assessments and key issues for city adaptation. Identify pilot projects and need for further technical studies
- Implementation of pilot projects in three cities
- Climate change & Community-Based Disaster Risk Management (CBDRM) training for representatives of mass-organization and communities
- Awareness-raising with youth and private sectors
- Planning for city action on climate resilience: short-term, medium and long-term activities. Detailed planning studies
- Regional sharing of results/plans. Engagement with national agencies.
- SLD 3 was for drafting resilience action plans shared locally.
- National workshop; donor proposals; follow-up.

Project achievement up to date:

1. Hazard, vulnerability and capacity assessment with a range of local proposed disaster risk reduction and climate change adaptation measures.
2. There are seven pilot projects implanted in three cities:
 - (i) Youth and climate change awareness raising activities in three cities aiming at raising awareness among and promoting the participation of young people, especially students in three participating cities of ACCCRN through organizing sustainable development forum with the theme "Climate Change – be Aware and Act"
 - (ii) Constructing winches to evacuate small fishing boats to typhoon shelter at Son Tra catchments ward – Danang
 - (iii) Planting coastal protection tree and providing early disaster warning facility for fishermen – Danang
 - (iv) Increasing disaster risk management capacity through local application of housing techniques resistant to flood and storm for poor households in Nhon Ly commune & Nhon Binh wards – Quy Nhon
 - (v) Restoring mangrove forest (10ha) to bolster up ecosystem and livelihood options in Thi Nai lagoon, Nhon Binh ward – Quy Nhon
 - (vi) Promoting traditional processing of fish sauce models in Nhon Ly commune – Quy Nhon
 - (vii) Providing water supply & solar electricity system to poor community in Con Son islet – Can Tho
3. The City Climate Change resilient action plans and a Climate Change Working Group setup in each city partner of ACCCRN in Vietnam.
4. Establishment of Climate Change Coordination Office in each three cities (Danang, Quy Nhon and Can Tho), that will be responsible for coordination management of local and external support projects on disaster risk reduction and climate change adaptation.

5. The hydrology study was launched by the Binh Dinh People's Committee after Nhon Binh ward on the western edge of Thi Nai lagoon, not far from the heart of Quy Nhon, submitted a development plan. It includes a water treatment plant, a station for rail cargo and residential housing. The 18-month study will first document the 2009 floods in detail. It will then feed information into a hydrological model to simulate water flows and predict how floods could play out in a future with higher sea levels, looking at scenarios both with and without urban development. Quy Nhon, like many other growing cities in Asia, has an opportunity to make choices and investments today that will affect the longer-term resilience profile of the city. It is, therefore, the results of the study could encourage urban planners in other cities to pay more attention to disaster risk reduction and climate change issues.
6. Flood modeling development in for Danang city's urban development.

Implementation approach and methodology

- Multi-stakeholder participatory approach applied to all stages of the project – voice of vulnerable people are included in planning process
- Most vulnerable areas and groups are identified through hazard, capacity and vulnerability assessments (HCVA)
- Project intervention and beneficial household selection are discussed and decided by community
- Community-based management with capacity building process given to beneficiaries are established together with other support
- Lessons learned has been documented and shared through different Shared Learning Dialogues, Climate Change Working Group (CCWG) and ACCCRN working group meetings

Lessons learnt

- The most successful and potentially replicable come from the local initiatives (e.g., boat evacuation winches in Danang, mangrove restoration in Quy Nhon and water supply & solar electricity system to poor community in Con Son islet – Can Tho)
- The outcomes of pilot project interventions create potentials of different options for disaster risk reduction and climate change adaptation (e.g., mangrove plantation)
- It is visible examples for the city partners to better understand about the climate change resilience process, which is new and complicated to local authorities and communities
- CCA measures proposed by the vulnerable communities are taken into account in local resilience plan through their active participation and experience gained in the implementation process
- Local experience and indigenous knowledge are crucial factors for a sustainable model of disaster risk reduction and climate change adaptation
- Strong commitment of city partners reflected through their resource contribution (budget, human resources, etc)
- Capacity of local authorities and officers has been strengthened through pilot implementation and monitoring
- Awareness raising activities (CBDRM, technical training on housing techniques resistant to flood and storm, mangrove planting, etc) and sharing learning opportunities created in the projects are prioritized and highly appreciated by local authority and people
- Learning on local practical community-based CC resilience-building are available for all stakeholders including CtC, local government authorities and technical departments, local civil society, and poor communities themselves
- It is very important to make the local poor communities and all stakeholders more aware of climate change and the meaning of resilience-building and the capacity of local poor communities to support their own resilience-building in their local context
- Mobilization of local poor communities' capacity to support their own resilience-building will empower communities, especially by working on a small project they are one step closer to working on a bigger project in Phase 3 of ACCCRN
- Models of increased local resilience exist and have been evaluated, from which other neighbouring communities and authorities can learn

Challenges

- Linkage between climate's related risks and urban planning is not well defined in the pilot projects
- High turn-over of partners' staff responsible for the project caused the challenges of consistent continuation and coordination
- Local project planning and cost estimation was not well prepared have caused some shortage of budget and delays of implementation
- Participatory approach is key factor for successfully addressing climate related risks, but it needs time and capacity building for local people
- Coordination among involving stakeholders is an issue, especially for a comprehensive plan addressing climate related risks in the community
- Low participation of women in trainings and shared learning opportunities in Danang (only 16–28%), but it is higher in Quy Nhon (35–70%) and Can Tho (more than 60%).