

Coastal Community Resilience Assessment

A scientific approach for
Measuring and Building Community Resilience to Hazards

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Objective

- ◆ Piloting Coastal Community Resilience (CCR) Assessment
 - ❖ scientific approach for measuring resilience elements and characteristics among vulnerable poor from coastal hazards.
 - ❖ methods and approaches to build the capacity of the vulnerable to cope and adapt to natural disasters and changing weather patterns.
 - ❖ application of CCR as a project planning and evaluation tool.
- ◆ Sharing experiences from a project on “Strengthening Resilience in Tsunami Affected Communities of India and Sri Lanka” (SRTAC).

Why Community Resilience?

- ◆ Climate change and natural disasters (low and high intensity) are anticipated to increase (both frequency and intensity) and threaten the vulnerable poor.
 - ◆ Coastal populations are dramatically increasing leading towards more demographic vulnerability
 - ◆ Disasters are undermining years of development efforts
 - ◆ Increase in the frequency of threat, leads to increased vulnerability of local poor, creating stressful environment, thereby reducing the opportunities for the affected poor to cope and adapt to any sudden change at any given point of time.

What is Resilience?

Why Community Resilience?

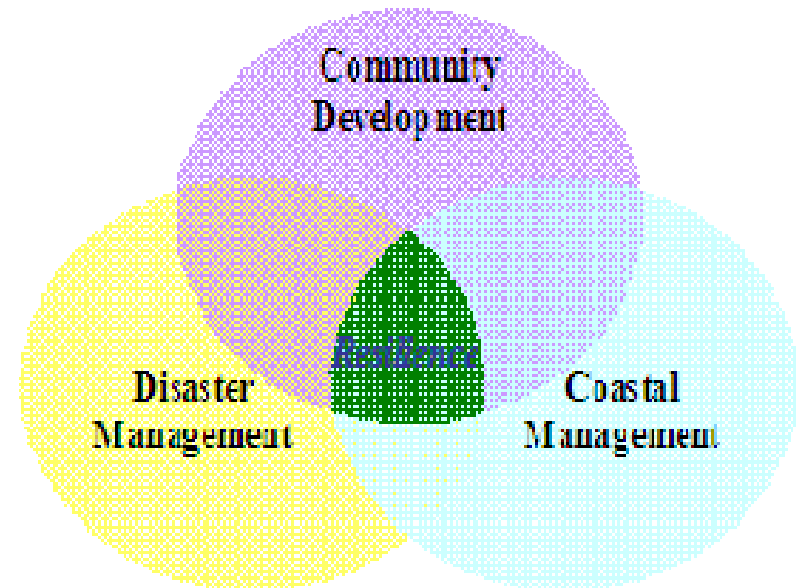
- ◆ **What?** The ability of a system, community or society exposed to hazards to resist, absorb accommodate to and recover from the effects of a hazard in a timely and efficient manner, including through the preservation and restoration of its essential basic structures and functions. (*UNISDR-2009*)

- ◆ **Why?** The resilience of a community in respect to potential hazard events is determined by the degree to which the community has the necessary resources and is capable of organizing itself both prior to and during times of need i.e Communities' ability to cope and adapt to change.

Coastal Community Resilience (CCR)

◆ requires integration and maintaining an optimal balance of three community based frameworks:

- ❖ community development,
- ❖ disaster management and
- ❖ coastal management



◆ The CCR approach is developed by Indian Ocean Tsunami Warning System(IOTWS), a rapid assessment tool for measuring the resilience capacity of vulnerable poor. This is conducted as a multi-sectoral collaborative and participatory undertaking to identify strengths, weaknesses, and opportunities to enhance resilience at local and national level.

Elements of Resilience



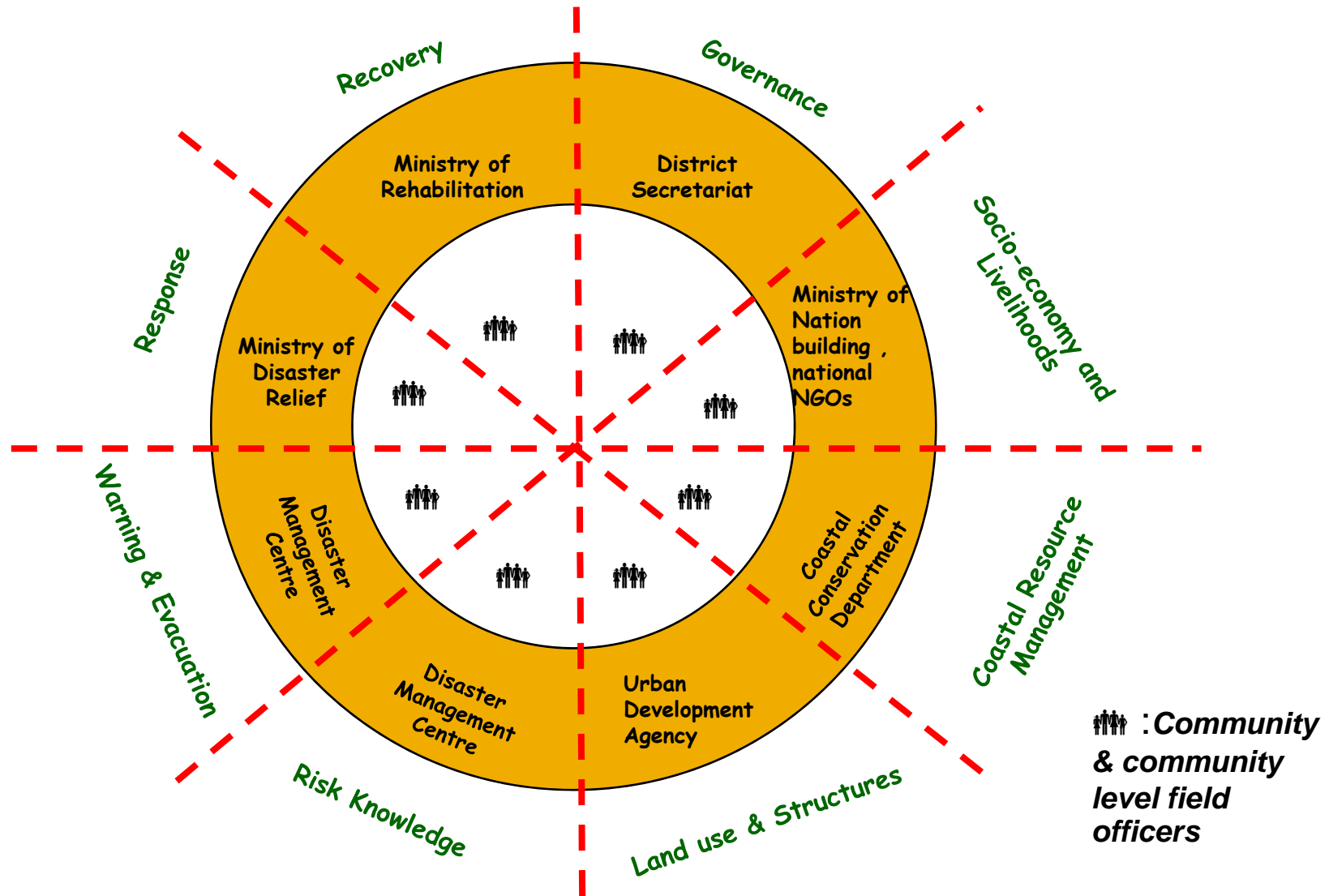
Source: CCR Guide
book, IOTWS

Elements of Resilience (contd.)

- ◆ Benchmarks for each resilience elements are identified to evaluate the resilience capacities of a community
- ◆ Each benchmark represents desired conditions against which to evaluate the resilience status of a community
- ◆ Example provided below

Element	Benchmark	Desired conditions
Governance	Basic services (i.e. water, transportation, security, etc.) are accessible to society provided by capable and transparent leaders and institutions as an enabling condition for building coastal community resilience	<ol style="list-style-type: none"> 1 Institutions are capable of providing basic services to community in a satisfactory and efficient manner 2 All members of the society including marginalized groups are accessible to basic services 3 Risk reduction measures are in to basic services delivery mechanisms 4 Critical facilities and infrastructure are operational for potential hazards events 5 Contingency plans exist to respond to hazard events

Multi-layer Data Collection



Tools & Techniques for Data collection

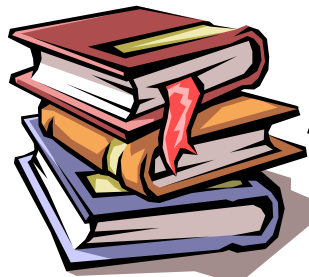
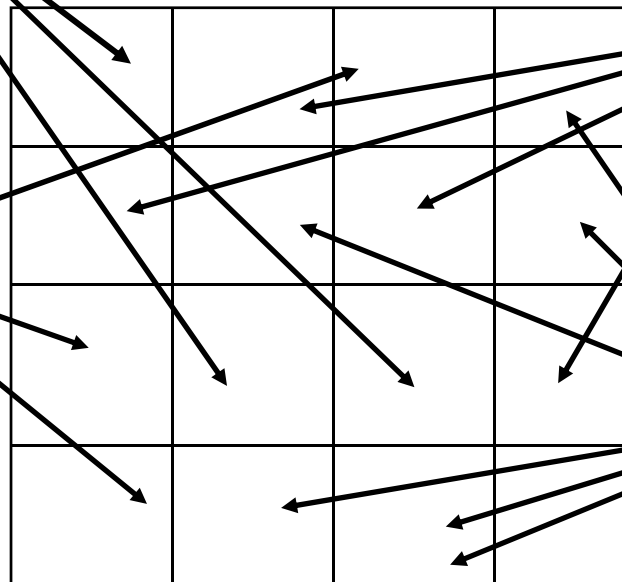


FGDs

Institutional visits & resource interviews



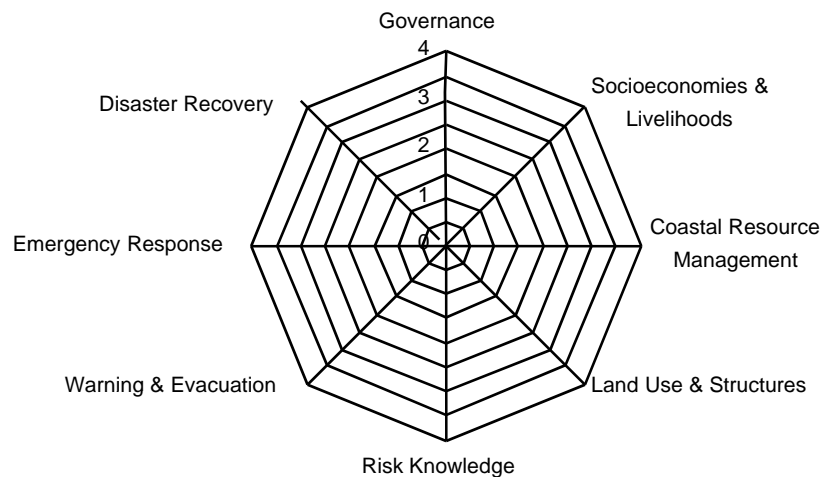
Benchmarks by elements



Secondary reviews



Scoring



- Scoring: A numerical rating system is helpful for the CCR assessment to evaluate achievement of each benchmark toward the desired level and it make easier to understand and communicate results.

4: very Good (76 to 100 percent fulfilled, sustainable)

3: Good (51 to 75 percent fulfilled)

2: Fair (26 to 50 percent fulfilled, in progress)

1: Poor (1 to 25 percent fulfilled, major gaps)

0: Condition absent

Value of CCR Approach

- Provides a framework to integrate the goals of community development, coastal management and disaster management
- Promotes a proactive approach to both chronic and episodic hazards rather than a reactive focus on response to disaster events
- Utilizes a broad assessment of community capacity and vulnerability to tsunami and other coastal hazards
- Merges goals of environmental sustainability and humanitarian assistance

Uses of the CCR assessment Tool

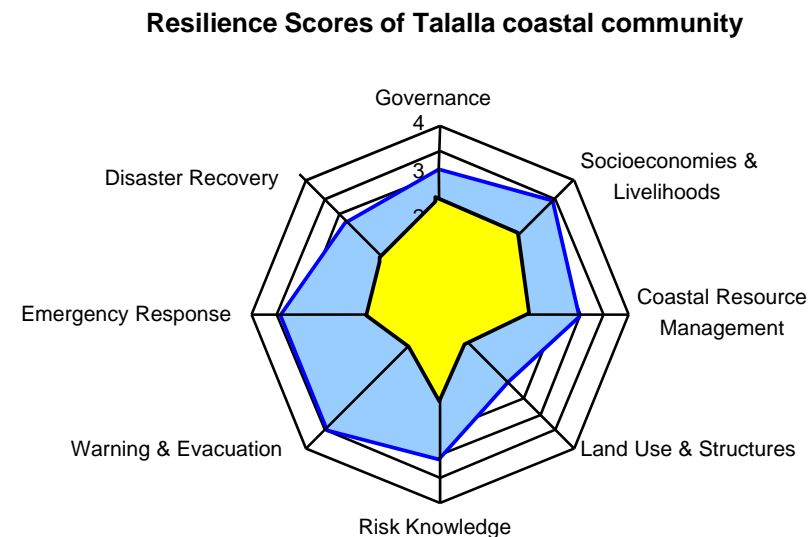
- Raise awareness of community on the risks from coastal hazards and the need for community planning and preparedness
- Broadly assess community capacity and vulnerability to coastal hazards
- Help integrate and prioritize the contribution of different stakeholders in community development, coastal management and disaster management
- Facilitate community issue identification and profile development
- Evaluate projects to establish a resilience baseline and monitor change as a result of project implementation

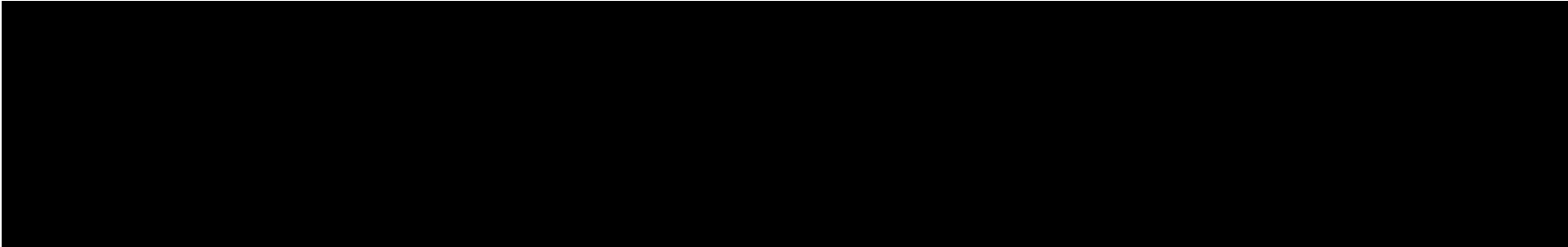
SRTAC Project

- ◇ overall objective of the project was to reduce the vulnerability of tsunami affected communities to future coastal hazards through
 - strengthening local capacities,
 - Ecological Rehabilitation - livelihoods and protective forest with access to strategic and
 - Access to Information: transformative information services by local people and organizations
 - Networking and building partnerships (regional, local and national)

Application of CCR as a Project Monitoring Tool

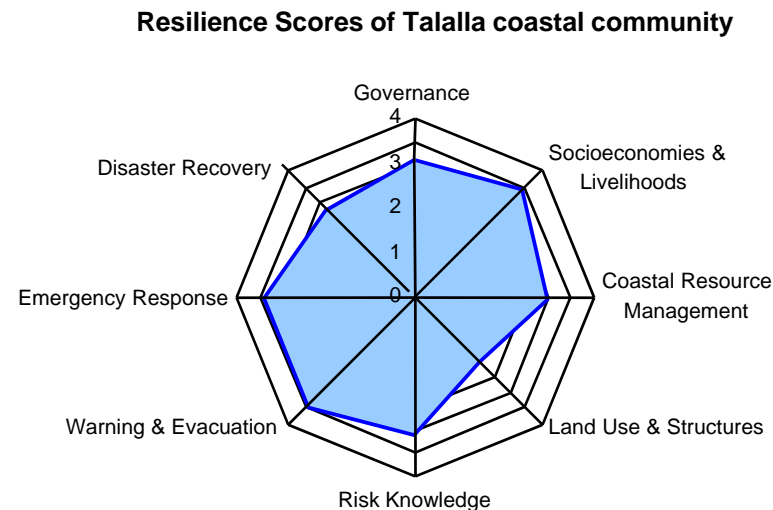
- The project assessed the resilience status of the selected project sites at the both ends of the project.
- Assessing the improvement of community resilience during the project period

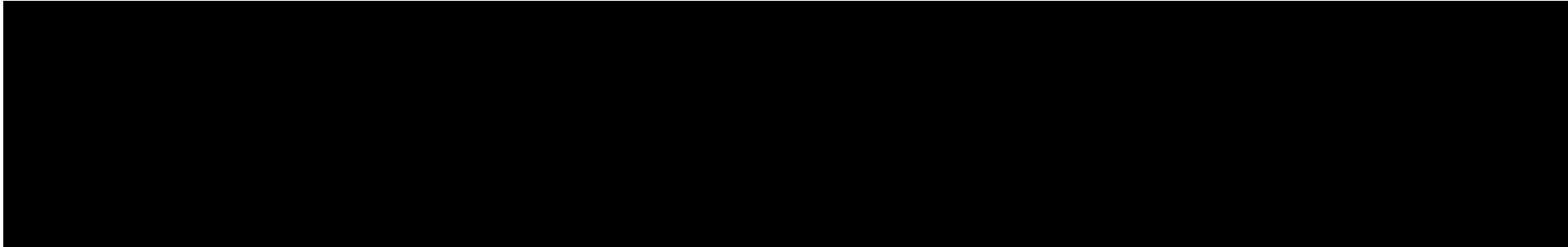


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- It shows that resilience status of the Talalla community has been improved during the project period.
 - Some resilience elements have achieved higher progress
 - The project cannot claim for the progress alone, but it is a result of collective effort all government, non government agencies worked in the area for community resilience during this period
 - However the project has done more contribution for the progress of some elements in comparing to other agencies

CCR as a Project Planning tool

- It provides inputs for project planners to plan new initiatives to improve the less progressed elements so as to have a better resilience community





THANK YOU