Reviewing the Impact of Capacity Building in GFDRR







Acknowledgments

Abigail Baca, Andrea Zanon, Barbara Minguez Garcia, Bouke Ottow, Fouad Bendimerad, Fernando Cortes, Francis Ghesquiere, Francis Nkoka, Iwan Gunawan, Jared Mercadante, Jolanta Kryspin-Watson, Laisa Obando, Luis Tineo, Maite Rodriguez, Manuel Alfredo Lopez Menjivar, Marc Forni, Margaret Arnold, Michel Matera, Mikio Ishiwatari, Oscar Anil Ishizawa Escudero, Philip Karp, Prashant Singh, Prema Gopalan, Ruby Mangunsong, Saurabh Dani, Swarna Kazi.

The report was developed by the University College London's (UCL) City Leadership Initiative (CLI) and Institute for Risk and Disaster Reduction (IRDR). The UCL team was led by Michele Acuto, Research Director and Professor in Diplomacy and Urban Theory, and included Ilan Kelman, Joanna Faure Walker, Louisa Barker, and Zehra Zaidi. The report was developed in collaboration with the Global Facility for Disaster Reduction and Recovery (GFDRR), with support from Andres Gonzalez Flores, and the Social, Urban, Rural and Resilience Global Practice (GSURR), with support from Federica Ranghieri.

The findings, interpretations, and conclusions expressed in this report are entirely those of the authors. The text in this publication may be reproduced for educational or nonprofit uses — in whole or in part, and in any form — without special permission, provided acknowledgement of the sources is made. No use of this publication may be made for resale or other commercial purpose without prior written consent from the authors. All images remain the sole property of the source and may not be used for any purpose without written permission from the source.

Notes: Fiscal year (FY) runs from July 1 to June 30; all dollar amounts are in US (\$) unless otherwise indicated.

Design: Miki Fernandez/ULTRAdesigns, Inc.

Reviewing the Impact of Capacity Building in GFDRR





December 2016



Table of Contents

- p1 Report Overview
- p4 Current Landscape: Stocktake Analysis Overview
- p6 Current Practices: Case Study Overviews
- p8 Planning, Managing, and Sustaining Capacity Building
- p16 Next Steps for GFDRR: An Actionable Plan

Annexes

- p25 Annex A Stocktake: Understanding the Landscape
- p35 Annex B The Case Studies: Taking a Deeper Dive
- p79 Annex C World Bank Capacity Building Resources

World Bank Group President Jim Yong Kim visits Colegio de Alto Rendimiento in Chontabamba, Peru. Photo: Domingo Giribaldi / World Bank

Report Overview

he Global Facility for Disaster Reduction and Recovery (GFDRR) devotes a significant proportion of its resources—up to 24 percent—to capacity-building efforts. In line with its mission, this is aimed at boosting the capacity of developing countries to better understand emerging disaster risks, reduce their vulnerabilities to natural hazards, and adapt to climate change. Capacity-building activities are generally integrated into GFDRR projects to support the overall objectives, rather than standalone projects.

However, despite the level of investment, capacity building is often considered secondary to larger activities. To date, some of GFDRR's capacity-building activities have been perceived as scattered by clients, partners, and colleagues at the World Bank. Moreover, there is little systemic knowledge about the effectiveness and long-term impact of capacity-building activities within GFDRR or, more generally, within the broader disaster risk management (DRM) community. It appears, even anecdotally from current practice, that GFDRR could better leverage the impact of capacity building.

In order to address this analysis and practice gap, this study assesses the effectiveness of capacity building across the GFDRR portfolio. The report evaluated projects active in fiscal years 2014 and 2015 (FY14 and FY15), focusing on "human capacity building – developing and sharing knowledge and skills, as well as consensus and network building. This study is composed of a stocktaking exercise and the development of in-depth case studies. This approach offers a baseline methodology to more strategically capture the role of capacity building in GFDRR, and more broadly, DRM operations.

This report is aimed at a two-fold audience: (i) the World Bank and GFDRR, to encourage better planning and strategic thinking about the value of capacity building; (ii) GFDRR's Consultative Group and DRM community more generally, to highlight the critical role of capacity building in enhancing the effectiveness of operations.

At an operational level, three key questions underline the study and frame its recommendations:

- 1. Planning. How can capacity building be effectively planned?
- 2. Management. How can the impact of capacity building be identified and managed?
- 3. **Sustainability.** How can capacity-building activities be designed to have a lasting impact?

After a summary of the analysis underpinning the report, these three questions are answered with operational recommendations. This section is of use both for program managers [e.g. Task Team Leaders (TTLs)] and grant making facilities (e.g. GFDRR) in order to determine which operational steps and considerations can lead to the most effective and valuable activities.

The following section outlines actionable scenarios for next steps GFDRR can take to improve the value of its capacity-building efforts. Each scenario includes a menu of interventions to choose from and implement. These scenarios include: (i) maintaining an already effective status quo, making slight adjustments to strengthen GFDRR's role as an effective *facilitator* of capacity-building activities—Scenario one; (ii) developing a more carefully planned approach that better captures the value added by capacity building and makes GFDRR a more strategic *enabler* of activities in the field—Scenario two; or (iii) GFDRR becomes a key *provider* of capacity-building activities—Scenario three.

An Actionable Plan on Capacity Building

The report advocates for the second scenario proposed, which is "Moderate Action." The study shows that the current status quo already is effective and capable of adding important value to GFDRR funded activities. The authors, nevertheless, suggest small additional steps to enhance the status quo, becoming more strategic about capacity building. In this scenario, GFDRR is seen as cementing and enhancing its current function as an *enabler*, albeit not a direct *provider*, of capacity-building activities. The interventions under scenario two opt for a more strategic approach, with greater resources and staff time allocated that could further increase the value added. Under this scenario there are four areas of strategic intervention that could significantly enhance the impact of capacity building in GFDRR supported projects: enhancing monitoring and evaluation (M&E) for capacity building; supporting better dissemination of best practices and lessons learned; coordinating and facilitating training and e-learning on DRM; and providing specific guidance, training, and resources for project leaders (e.g. TTLs) to support a well-designed approach to capacity building activities.

The Study and its Methods

The study underlying this report included an initial "stocktaking" review of capacitybuilding activities. This exercise was conducted across a database of 300 GFDRR projects, active during FY14 and FY15, to highlight trends, challenges, and areas for further research. In addition, a set of 10 case studies, selected in terms of geographical location, as well as a variety of project typologies (grant size, length and GFDRR pillars of engagement) were analyzed. (See Annexes A and B)

Both the case studies and the stocktaking inform the answers to the three "key questions" and "next steps" scenarios outlined at the end of the document.

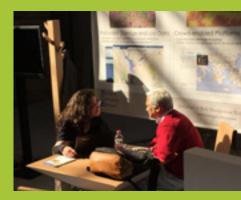
Defining Capacity Building

hereisalackofconsensusabouttheoperational definition of "capacity building;" the phrase hides a vast landscape of activities, ideas, and engagements. A World Bank Institute (WBI) report on Capacity Development (2009)¹ noted that most definitions are very broad, making it difficult to evaluate the outcomes of such work or understand its impact. Definitions can encompass "technical" (tools and infrastructures), "financial" (investments), and "human" (knowledge and skills) capacity. Using this broader definition, an Independent Evaluation Group (IEG) report (2012)² determined that GFDRR "has been, first and foremost, a capacity-building program, which has accounted for 81% of project commiments." While important to make a case for capacity-building assessments, this assessment might need refinement in focus to offer more directly-applicable operational reccomendations.

For this study, capacity building has been defined as the process of developing and strengthening the skills, instincts, abilities, processes, and resources that organizations and communities need to adapt and manage and reduce disaster risks. As such, this report focuses on human capacity. Interestingly, when asked to define capacity building, the TTLs who were interviewed also focused upon human capacity.

The research team identified capacity building as activities that contribute to one or more of the following³: (1) raising awareness; (2) enhancing skills; (3) improving consensus; (4) fostering coalitions/networks; and (5) facilitating decision making. In order to better assess the value of capacity building, operations have been classified as the following activity types: (1) knowledge products; (2) short-term learning; (3) longterm learning; (4) consultations with stakeholders; (5) campaigns; and (6) knowledge exchange, fostering partnerships, and network development.

The project has taken into account two types of capacity-building impact: impact on the project's delivery (shaping the way the project is planned and carried out), and the impact of the project on beneficiaries and partners (shaping the project's outcomes and their effectiveness). In this sense capacity building is, therefore, not always a main goal of a project; rather it can be deployed to enable a project's objective, acting as a tool to support other goals.



Capacity building has been defined as the process of developing and strengthening the skills, instincts, abilities, processes and resources that organizations and communities need to adapt and manage/ reduce natural disaster risks.

¹ WBI (2009) The Capacity Development Results Framework: A strategic and results- orientated approach to learning for capacity development, http://ieg.worldbankgroup.org/Data/reports/gfdrr_gpr.pdf http://siteresources. worldbank.org/CSO/Resources/228716-1369241545034/The_Capacity_Development_Results_Framework.pdf

² IEG (2012) GFDRR Global Program Review, volume 6, issue 2. http://ieg.worldbankgroup.org/Data/reports/gfdrr_gpr.pdf

³ Drawing from the WBI (2009) Capacity Building Results Framework.

Current Landscape: Stocktake Analysis Overview

Figure 1. Average Percentage of Funding for Capacity-building Activities Built into GFDRR Grants Across the FY14 and FY15 Active Portfolio



he study began by taking stock of the landscape of GFDRR engagements in order to understand the overall scope of capacity-building activities.⁴ Following are the key take-away lessons from this exercise:

- **How much does GFDRR invest?** Twenty-four percent of the GFDRR active portfolio in FY14 and FY15 was allocated for capacity building⁵. However, as discussed in the case studies (appendix B), the majority of projects had a significantly higher percentage of capacity building than was indicated in the budget⁵. Capacity building accounting for \$33 million (24 percent of GFDRR funding) is, therefore, a conservative estimate.
- **Is capacity building a project driver?** There are few projects that are driven by capacity building; only a small portion of GFDRR projects dedicate more than 50 percent of their budget towards these activities. The majority of capacity-building activities are supplementary to broader DRM objectives.
- Where are most capacity building-driven projects? The selection of projects driven by these activities are mostly housed within the former GFDRR capacity-building program, created in 2010 in cooperation with the WBI. The program focused on supporting the development of DRM training courses, including a number of e-learning courses. ⁶ As part of the program's strategy, partnerships were formed with prominent players in developing countries for course delivery and marketing.
- How does capacity building align to GFDRR? The largest expenditure, and over half the total budget for capacity-building activities, lies in pillars one (risk identification) and two (risk reduction).
- Why do small projects count? Small projects (in budget size) tend to have substantial capacity-building commitments (41 percent of the projects with over 50 percent of their budget dedicated to capacity building are small in grant size).
- What are key capacity-building activities? The most common capacity-building activities are short-term learning activities and the development of knowledge products. Out of the 300 projects 177 (59 percent) reported having at least one short-term learning activity, and 94 projects (31 percent) reported the development of knowledge products.
- Who benefits from capacity building? The primary beneficiaries of capacitybuilding activities include government and institutional counterparts (191 and 109 of the 300 projects, respectively). The third most common beneficiaries are community groups (63 projects), followed by DRM professionals or technicians as the next most common (50 projects). A smaller proportion of projects are aimed at benefiting the private sector (15 projects) or the wider DRM community (16 projects).

⁴ The full stocktake is available in annex A.

⁵ It is important to note that capacity-building budget per project was calculated using a proxy. Capacity building is not accounted for in a separate project line, therefore, the proxy was calculated by adding the budget line "logistics" (training, workshops, conference facilities and stakeholder consultation) with "dissemination costs" (translation, editing, and publication).

⁶ See Annex C for a list of GFDRR supported training & e-learning courses.

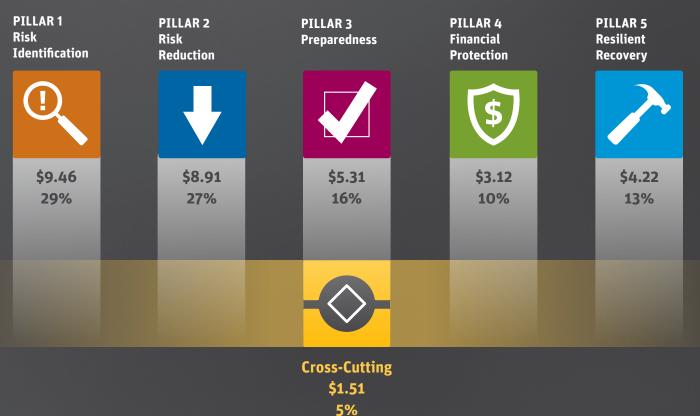
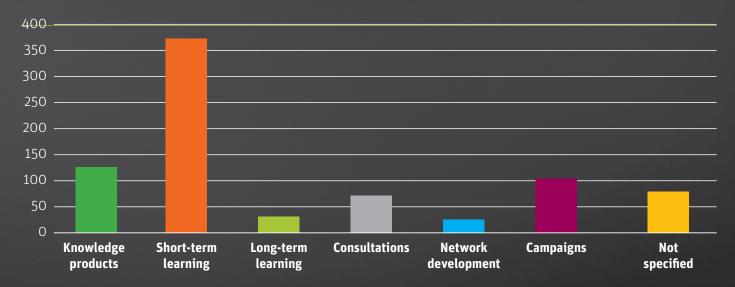


Figure 2. Total Capacity-building Expenditure Across the FY14 and FY15 Active Portfolio Disaggregated by Pillar (in US\$ millions)





Current Practices: Case Studies Overview

This section outlines some of the key findings from the 10 case studies to take a deeper dive in the current capacitybuilding practices of GFDRR projects. The full case studies provide greater depth and can be found in Annex B.

Central America Probabilistic Risk Assessment (CAPRA)

Long-term engagement. The CAPRA initiative was rolled out in Central and South America from 2008 -2016 in three main phases. In the first and second phases, World Bank specialists played a central role in generating risks maps.

Balancing local ownership and technical support. In the third phase, there was a reduction in World Bank involvement in order to encourage local ownership, sustainability and institutional capacity building. This objective needed to be balanced with providing the necessary amount of technical support to participants. The "Knowledge Manager." The World Bank knowledge manager, a role not frequently included within GFDRRsupported initiatives, was crucial to integrating key lessons learned into the project design. The knowledge manager was responsible for interviewing the trainees and reporting back on recommendations and lessons learned.

4 Facilitating Policy Dialogue in Haiti

Convening power. The DRM specialist funded by this grant was able to successfully leverage the World Bank's convening power to facilitate coordination between ministries and international donors and partners.

Knowledge notes. In the project plan, funding was allocated to create knowledge notes. The knowledge notes captured the experience of mainstreaming DRM into sector policies.

El Salvador, Nicaragua See page 36/Annex B

1

2 Honduras, Guatemala See page 41/Annex B

Peru

Haiti

4

See page 50/Annex B

See page 46/Annex B

South-South Cooperation in India, Honduras and Guatemala

Rely on local communities. The sustainability of community-based capacity-building projects was enhanced by working with and through existing community organizations and networks.

Peer support. Peer-to-peer learning networks, and a training of trainers approach were key to accelerate and scale up capacity-building and resilience initiatives.

3 Peru Safer Schools

Rely on previous experiences. Part of this initiative's success can be attributed to utilizing learning from other projects. When creating new plans and tools, the project assessed what knowledge was needed and how existing expertise could be strategically incorporated to support the process.

Integrate capacity building into

institutions. Capacity building is effective when it is linked to an existing institutional process and integrated into existing networks and projects, in this case a government-led census of school infrastructure.

6 Resilient Cities in MENA

Supporting small enterprises. DRM capacity building can occur through supporting small-scale private enterprises

Repeated interactions. To deliver longterm results for DRM, repeat interaction, involving the same participants, is effective.

Flexible project management. enables activities to be planned responding to the participants' needs.

Urban Resilience in Bangladesh

Link across sectors. The institutional foundation established to deliver project outputs—including an advisory committee, scientific consortium, and focus groups—effectively built relationships across government departmental silos.

E-learning and flexible engagements. The use of e-learning tools gave participants with full-time jobs much-needed flexibility. However, no progress indicators were developed, and therefore, the impact on government staff learning cannot be easily determined.



5 Post Disaster Needs Assessment (PDNA) and Recovery Framework in Malawi

Government staff turnover and sustainability. A degree of institutional capacity was lost between the 2012 and 2015 PDNA training, due to government staff turnover. However, the development of a multi-stakeholder network, including non-governmental organizations (NGOs) and international institutions, enabled a means of sustaining a significant proportion of institutional capacity.

DRM champions. DRM champions were identified, and proved to be key actors in carrying forward skills between the different interventions. These champions also provided knowledge for the future and helped to share the methodology with a wider audience.

8 Resilient Recovery and Financial Protection in the Philippines

Train the trainers. From the group of training participants, "training leaders" were assigned who were responsible for evaluating the learning of their peers and provide feedback to organizers. Adjustments were made accordingly, resulting in a responsive and effective program. The training of trainers was crucial to scaling up and sustaining the initiative.

Review capacity-building needs. A capacity review before the training ensured that the workshops were relevant to participants' needs.

Mainstreaming DRM in Indonesia

Broad local ownership. Local ownership of technical assistance outputs, such as the disaster risk financing strategy, was encouraged by engaging a number of stakeholders throughout the life cycle of the project.

Know your (local) partner. WBI worked with the National Agency for Disaster Risk Management (BNPB) to build its capacity to share knowledge with local and district agencies, as well as an international audience. WBI conducted a review of BNPB's capacity, ensuring that it had the human, technical, and financial resources to sustain the knowledge exchange program.

10 Learning from Mega Disasters

Create value that is relevant at the local level. Adopting a participatory process in order to select the content and design, and to create the knowledge notes ensured that they were of value to the targeted countries.

Sustaining (virtual) engagements. The online community of practice was an effective means of scaling the knowledge exchange in order to transfer the lessons to a wider audience. However, despite the growth in membership, the withdrawal of World Bank engagement after the grant end date led to a decrease in member participation.

Planning, Managing, and Sustaining Capacity Building Operational Recommendations for Project Managers and Grant-making Facilities

Research findings from the report not only speak to the value added from capacity building to GFDRR operations, but also to the important need to better plan, monitor, and evaluate its contribution to broader DRM efforts. In particular, the case studies and stocktake analysis highlight a series of answers to the three core questions set out in the introduction:

- (1) How can capacity building be effectively planned?
- (2) How can the impact of capacity building be identified and managed?
- (3) How can capacity-building activities be designed to have a lasting impact?

Below, answers and related operational recommendations for each question have been highlighted. These answers are useful for both program managers (e.g. TTLs) and grant making facilities (e.g. GFDRR) to determine which operational steps and considerations can lead to the most effective and valuable activities.

Question 1 Q1 Answer 1: Designing capacity-building activities in a project proposal

How can capacity building be effectively planned?

Thinking strategically about capacity building from the inception phase of a project; assessing, monitoring, and evaluating throughout; and documenting experiences, can substantially increase projects' impact, especially for smaller initiatives.

Capacity building is not always clearly delineated as "capacity building." These activities can occur outside of specifically identified line items and project proposals—through the process of continual learning, exchange, and acting as part of project implementation. This informal or indirect capacity building can be difficult to document. Tangible outputs or outcomes are challenging to identify. Therefore, assessment throughout the project is necessary.

In this study, it was established that few projects fully monitored activities and outputs (e.g. the number of workshop participants), and even fewer monitored capacity-building outcomes. A handful of projects had a review of a particular training (e.g. the 2012 Malawi PDNA). However, this was not undertaken consistently; a post-training report for the 2015 Malawi PDNA has not been created. These outcomes are not usually included within measurement and evaluation progress reports, and therefore might not be easily accessible or comparable.

A training and needs assessment review was carried out prior to the PDNA training in the Philippines, laying the foundation for future interaction with stakeholders, and allowing capacitybuilding activities to be tailored to the needs of local participants. Capacity reviews should be cognizant of available human, financial, and technical resources. As part of the same project, a review of human capacity was undertaken for the Philippines Project Monitoring and Evaluation System for DRM. However, after a three-day training program, the Office of Civil Defense did not have the information and communication technology capacity for this system to be institutionalized. As a result, the project required an extension.

Operational Recommendations

Recommendation # 1 Capacity building is more likely to be effective when identified as a goal in the planning stage, and based on

- i) reviews of existing capacity and capacity needs, and
- ii) a consideration of the institutional and external contexts.

Recommendation #2 Following the definition outlined in the introduction, include capacity-building activities within both project design and budget. Identify, which components should be marked as capacity-building activities, including describing expected, informal capacity building, such as continual learning through implementation.

Recommendation # 3 Selecting indicators to monitor throughout project implementation ensures the role of capacity-building activities (and investments) are clearly assessed. This links capacity building to defined outcomes in proposals and allows the TTL and GFDRR to assess progress throughout implementation and upon project completion. See question 3 in this section for further information.

Recommendation # 4 Developing a timeline for capacity-building activities in collaboration with local stakeholders provides a clear project implementation structure for both the project manager and the client.

Recommendation # 5 Including a mid-term review of capacity-building activities enables progress to be monitored and adjustments to implementation to be made accordingly, if necessary.

Q1 Answer 2: Strategically identify activity types and beneficiaries

When developing the project proposal, it is key to identify the most suitable capacitybuilding activities and their beneficiaries, given the objectives and the scope of the project. This means strategically putting capacity building "in context" of the project's overall goal(s), not just as a subsidiary activity. Extensive literature confirms that the activity selection, in terms of time horizon—long term vs. short term, and type ⁷—should follow an assessment of: existing capacities (local and GFDRR); capacity needed (locally);

As defined above: (1) knowledge products; (2) short-term learning; (3) long-term learning; (4) consultations with stakeholders; (5) campaigns; (6) knowledge exchange/fostering partnerships/ network development

and lessons learned from previous actions (supported by GFDRR, and when possible, by other donors and stakeholders). Furthermore, a participatory process of selecting capacity-building activities and beneficiaries encourages ownership of the process and local sustainability of its outcomes.

Operational Recommendations

Recommendation #1 Capacity-building activities can *and should* include a combination of complementary activities (e.g. workshop followed by knowledge products). This is already practiced in part - 75 percent of GFDRR projects with capacity building in their proposals had more than one type of capacity-building activity. However, these activities would benefit from more strategic thinking. Case studies and the stocktake show that, though most common activity is short-term learnings, there is a tendency to combine different activities, targeting different audiences, rather than planning a set of capacity-building activities as connected processes.

Recommendation #2 A clear phase of consultation with the clients—and, ideally, a number of relevant stakeholders—is key to legacy. Formal consultation allows the identification of the most appropriate capacity-building activities and beneficiaries, and enhances the chances that these activities are locally owned and, thus, more sustainable, beyond GFDRR efforts, in the long term.

In the Bangladesh Urban Resilience Project, stakeholder consultations were organized with approximately 40 different government ministries and organizations, academic institutions, and civil society members in order to decide on the composition and coordination of the focus groups. This approach gave participating organizations greater ownership of the process and, ultimately, greater sustainability. Although the focus groups were not intended to continue after the project outputs were created, the multi- stakeholder focus groups continue to have a working relationship, discussing the challenges and opportunities they face. Furthermore, one of the focus groups has formed its own Urban Resilience Unit.

Q1 Answer 3: Where possible, identify and build upon previous capacity-building activities

Continuity of capacity-building activities aids effectiveness. Many case studies built upon previous World Bank implemented capacity-building activities. This is easier when consecutive projects are led by the same TTL. For example, the Malawi 2015 PDNA built upon the 2012 PDNA, expanding upon and increasing the skillset of the participants. Given that many capacity-building activities are short-term learnings, linking activities creates a more sustained capacity building and learning engagement.

Operational Recommendations

Recommendation #1 Consult formally with the regional or country focal point to ascertain whether previous capacity-building activities have taken place, which could compliment the new initiative.

Recommendation # 2 If conducting a capacity review, ascertain whether the targeted beneficiary has already participated in either Bank-led or other capacity-building activities that are relevant to the project initiative.

Q2 Answer 1: Developing M&E as a way to understand impact and create value

There are two main purposes driving M&E for capacity building: i) accountability, and ii) learning to improve performance. Technically speaking, M&E of capacity building should focus on the quality and relevance of efforts and their ability to promote immediate changes. Given that the duration between capacity-building interventions and their outcomes can be long (longer than the project) and stretched across different stakeholders and sectors, M&E generally focuses on the immediate changes in a specific project, organization, or activity. In addition, it must be pragmatic, simple, and its costs should not outweigh the benefits.

Operational Recommendations

Recommendation #1 M&E of capacity building should be included in the project proposal. A description of capacity-building activities—including activity type and beneficiaries, as discussed in question 1—should be outlined, followed by a series of indicators. Inputs and capacity-building objectives should be clearly linked to intended outputs and outcomes (see annex C, figure 3 for further information). These indicators should then be monitored throughout all project phases, through impact evaluation. All projects should include indicators to measure immediate outcomes of capacity-building activities such as "raised awareness." For extra depth, projects can include indicators measuring broader and longer-term outcomes, such as "formulated policies." In order to monitor and evaluate, assessments are generally done at least twice throughout the activity, at the mid-term juncture and upon completion.

Recommendation # 2 Both the progress and final assessment should also seek ways to describe informal capacity building (as discussed above), even if anecdotally. Not everything should be labelled as capacity building. Rather, capacity building should be accepted as both a formal and informal process and described as such.

Recommendation # 3 M&E to improve performance was identified as a key component by many of the TTLs interviewed. Here, M&E is seen as an illustration of changes brought, processes and procedures followed, the level of satisfaction of beneficiaries and partners, etc. Knowledge notes or short reports and briefs, perhaps following a common framework, can help to communicate the main lessons learned. These can then be built upon systematically.

Question 2

How can the impact of capacity building be identified and managed?

Question 3

How can capacitybuilding activities be designed to have a lasting impact?

Q3 Answer 1: Consider whether mechanisms to scale up or sustain the learning can be incorporated.

The outcome of legacy thinking includes a lasting commitment from clients to mainstream DRM into development policies and planning. Mechanisms are needed through which DRM interest, knowledge, and skills can be retained and scaled to create a self-sustaining post-project legacy.

Operational Recommendations

Recommendation #1 Consider whether a training of trainers approach can be incorporated, even after the mid-project review. The trainings offered can focus upon training a smaller group, which would then be equipped to train others in their country.

Recommendation # 2 Training of trainers needs to consider two operational questions:

- i) What knowledge and skills does a person need to be able to train others?
- ii) What structures will be available for the person to pass on knowledge to others in his/ her country?

In the Philippines, a training-of-trainers module was included within the 2011 PDNA program. Upon project completion, "champions" were identified and tasked with rolling out PDNA trainings across government authorities as well as to Local Government Units (LGUs). The module was designed to equip the "champions" with the necessary skills and knowledge to train others. Another GFDRR project ran a DRM capacity building program across LGUs. Establishing these DRM structures and processes in LGUs was critical for an effective PDNA training rollout.

Recommendation # 3 Consider whether (and what) knowledge products can be produced by the project (e.g. manuals or e-learning modules), which can help to create institutional memory.

The WBI worked with BNPB in Indonesia to create learning modules to be used both internally and to scale learning to local DRM agencies. Internally, the modules allow knowledge to be passed onto new staff, thus creating institutional memory.

Recommendation # 4 When organizing a knowledge exchange, consider how the community of practice will be sustained.

- Create an online community of practice. This could require additional funding for a community of practice manager after the project end date. Alternatively, local community of practice coordinators could be designated.
- ii) Organize a follow up event to ensure another opportunity to develop relationships and share knowledge.

Q3 Answer 2: Where possible/appropriate include non-governmental local partners

Projects that identify and target key local actors, and encourage a participatory approach to capacity building, result in greater ownership of processes and outcomes by local stakeholders.

In a number of case studies, including key actors from government, universities, and civil society strengthened the outcomes of the project and resulted in long-term shifts in the local risk management landscape. Including non-governmental actors is particularly useful in situations when there is high staff turnover in government institutions. Non-governmental actors, such as civil society and academia, often have relatively lower turnover rates. Therefore, they can be competent at taking ownership of the project and ensuring its continuation.

Operational Recommendations

Recommendation # 1 When possible identify a local delivery partner to assist in project outputs and project legacy.

In the Peru Safer Schools Project, a team of engineers were contracted to develop retrofitting solutions. These engineers were selected from the Pontifical Catholic University of Peru and the Japan-Peru Center for Earthquake Engineering Research and Disaster Mitigation based at the National University of Engineering in Peru. Support was also provided from Universidad de los Andes in Colombia. Using knowledge from local academic platforms helped create an enabling environment for DRM and facilitated relationships between the Universities and the Ministry of Education. Local expertise, rather than that provided by an external consultant, is often a more trusted knowledge source.

Recommendation # 2 When possible include a number of local stakeholders in capacity-building activities.

In Malawi, a degree of institutional capacity was lost between the 2012 and 2015 PDNA training due to ministry staff turnover. However, the development of a multi-stakeholder network, including local NGOs and international institutions enabled a means of sustaining a significant proportion of institutional capacity.

Q3 Answer 3: Maintaining a flexible approach

Processes of consultation, learning, and knowledge exchange require an adaptive approach, but must also retain focus on, and commitment to, the long-term project goals. Factors to account for include differing rates of learning and changes in the external environment (e.g. sudden political or environmental events) and changes in institutions (e.g. leaders, and personnel). While not advocating for doing away with project planning—a cornerstone to the previous key question—a degree of flexibility might ensure that capacity-building activities are responsive to their beneficiaries and contexts while retaining the fundamental goals.

Operational Recommendations

Recommendation #1 Periodically review the utility and applicability of capacitybuilding activities in order to adjust capacity-building efforts during the course of the project without losing focus on the main project goal(s). Document the adjustments made in project progress reviews.

Recommendation # 2 Including a "knowledge manager" or a facilitating agency for knowledge management and project development (e.g. the World Bank) can ensure that learning is monitored, and that observations are integrated into project implementation.

For the CAPRA initiative, the World Bank hired a knowledge manager who was responsible for interviewing the trainees and reporting back on lessons learned. Throughout its duration, these lessons were integrated into project implementation, and included the format of capacity-building activities. This feedback process significantly altered the course of the CAPRA initiative by shifting from a Bank-led process to a locally owned approach.

By contrast, for the Philippines PDNA training, local knowledge managers were selected by the consultant, who drew from a pool of workshop participants. The objective was for these individuals to become future PDNA trainers. Their secondary role was monitoring the learning of their peers and feeding this information back to the implementing consultant. This allowed the consultant to adapt capacity building activities to the needs of the participants throughout the implementation of the project, resulting in more effective and locally owned DRM capacity.



St. Lucia: Discussing the surface water and slope stability issues and potential drainage solutions at a community meeting. Photo credit: David Ramos

Monitoring learning activities

(synthesized from the Capacity Development Results Framework)

Learning activities, for monitoring purposes, are actions taken, or work performed, by which inputs are converted into specific outputs. Activities, such as providing training, conducting a workshop, etc. are designed to deliver outputs that enable learning objectives and outcomes to be achieved.

Inputs are the financial, human, and other resources mobilized to support activities undertaken by a capacity-building program.

Input indicators measure the quantity (and sometimes the quality) of resources provided for program activities. For capacity building, these can include: funding (counterpart funds, co-financing, grants); human resources (number of person-years for client/partner agencies, consultants, and technical advisers); equipment, materials, and supplies, or recurrent costs of these items (e.g. textbooks).

Outputs are the products and services resulting from a learning activity designed to generate learning outcomes. The key distinction between outputs (specific goods or services) and learning outcomes is that the former typically takes the form of an increase in supply of knowledge and information. In contrast, learning outcomes reflect behavioral changes resulting from the use and application of acquired knowledge and information.

Output indicators measure the quantity (and sometimes the quality) of the goods or services created or provided through the use of inputs. In capacity building, these might include the number of people trained, the number of new courses offered, and the number of new consultations conducted.

Objectives can be thought of as an indicator for a given outcome. Capacity building outcomes are reached through the articulation of learning objectives.

Outcomes are changes that occur in an individual or a group of individuals such as improvements in knowledge and skills; changes in motivation and attitude with respect to a particular issue; occurrences in the broader organizational or social environment, which are embodied in improved processes or new products and services.

Existing World Bank Resources: The Capacity Development Results Framework

The WBI produced **"The Capacity Development Results** Framework" (2009) which provides the theoretical basis behind, and a framework for designing, implementing, monitoring, managing, and evaluating capacity development in development programs. The framework includes learning outcomes and objectives, which are a useful for project managers.

apacity building has already added much, and has the potential to add even further, to GFDRR projects. The overview of the stocktake and case studies have demonstrated the reach, substantial investment, and variety of activities at hand when we consider capacity building as a component of GFDRR operations.

But what now for GFDRR? How can the "value added" functions of capacity building be enhanced in future projects? This section outlines three possible roadmaps for further action by GFDRR, ranging from simple consideration (scenario one), to a more strategic approach (scenario two), to full investment (scenario three). The research team outlines here what seems the most effective action plan of the three. The authors believe that the **second scenario**, focused on strategic "wins" without a major overhaul, would lead to the most effective benefits. The final decision, however, rests with GFDRR and its consultative group.

Scenario One Business as usual: "Maintain the status quo" —GFDRR highlights its position as effective facilitator of capacity-building activities

While the status quo could be easily criticised by an external, uninitiated eye, the current state of capacity building in GFDRR projects is already encouraging. As has been demonstrated throughout the in-depth case studies, significant value is added to GFDRR projects through capacity-building activities. The authors believe three minimal interventions could further sustain this effective status quo and ensure GFDRR continues to benefit from capacity-building activities. These potential next steps do not require substantial or strategic adjustments, as in the other two scenarios, but rather are thought of as using current resources, and are focused on GFDRR enhancing M&E, supporting better dissemination of best practices and lessons learned, and continuing the coordination and facilitation of training and e-learning.

Intervention 1: M&E

Systematic M&E of capacity building is critical to ensuring that capacity building is deployed in a strategic rather than ad hoc manor. A systematic M&E framework for accountability will ensure that capacity-building activities are clearly linked to defined objectives and outcomes in project proposals and both the TTL and GFDRR can determine the extent to which progress towards these has been achieved during project implementation and at the project close. Equally, a continued review and analysis effort—as represented by this report—is fundamental to maintaining an effective appreciation of the value added of capacity-building activities. Equally, it is central to avoid path dependencies, unnecessary duplications, and unexpected negative externalities to these activities.

Suggested next steps for GFDRR:

- Include capacity building within M&E requirements. This includes ensuring that it is accounted for in the proposed budget. Requirements should include a description of capacity-building activities, including activity type and beneficiaries (as discussed in the section on capacity-building planning above) in project proposals. Outputs such as number of participants trained should be monitored; equally, a selection of capacity-building indicators for TTLs to choose from should be integrated into the GFDRR M&E framework the indicators outlined in the Capacity Development Results Framework provide one possible model (see figure 3, annex C). In this scenario the indicators should focus on immediate outcomes of capacity-building activities such as "skills gained" and "improved consensus" (for examples see outcomes 1-4 in figure 3, annex C).
- Continuation and formalisation of the current systematic assessment exercise (as represented in this report) to allow for overall GFDRR strategic planning on capacity building. With M&E indicators in place, a more effective assessment of impact can be undertaken. With more detailed data, it would be possible to analyze which capacity-building activities are the most effective across the GFDRR portfolio and prioritise investments accordingly. At a later date, a longitudinal assessment of trends will enable a more strategic overview.

Intervention 2: Sharing knowledge, best practices and lessons learned

Dissemination of lessons learned and better communication on current activities can improve capacity-building activities at an operational level. Equally, the roles played by GFDRR, as facilitators and convener, as well as the support given to multiple capacity-building activities and their outcomes should be explained and highlighted, in order for TTLs to be able to make better use of these resources.

Suggested next steps for GFDRR:

- Integrate more clearly a section on capacity building in GFDRR's annual report, flagging the value added of these activities for the broader GFDRR portfolio.
- Dissemination of lessons learned (including the case studies in annex B) and better communication on current activities can improve capacity-building activities at an operational level. One platform for these lessons could be The Resilience and Disaster Risk Management (DRM) Global Solutions Group's (GSG) recently launched knowledge platform, but there are several other venues that could be explored.

Intervention 3: Coordinating and facilitating training and e-learning

The delivery of capacity-building assistance to clients is offered through multi-year programmatic engagements with key institutions. This decentralized delivery mode of capacity-building efforts includes training, mentoring, knowledge sharing and South-South collaborations among different partners. Partners are involved in developing core curricula, localizing these core curricula to specifics of the countries, and also in delivering training activities. GFDRR partnership with national, regional, and international organizations contributes to efficient use of scarce resources by reducing duplications and overlaps in developing training materials and tools, allowing joint and coordinated capacity-building interventions based on the comparative advantages of partners, and leveraging resources by creating a pool of shared capacity-building assets — training materials and standardized learning packages, knowledge and guidance notes, multimedia products — accessible in public domain.

Suggested Next steps for GFDRR:

- These partnerships need to be maintained to ensure the sustainability of these initiatives.
- GFDRR could also play the role of coordinator/facilitator of 2 DRM courses delivered through the World Bank internal learning platform Online Learning Consortium (OLC).

Scenario Two Moderate action taken: be strategic

GFDRR enhances its position as a strategic enabler of capacity-building activities

Between continuing business as usual and offering a major capacity-building-oriented overhaul, the research team would like to recommend this scenario, which should, based on the evidence above, provide the most effective pathway. In this scenario, GFDRR is seen as cementing and enhancing its current function as an *enabler*, albeit not a direct *provider*, of capacity-building activities. There are four areas of strategic intervention that could significantly enhance the impact of capacity building in GFDRR supported projects. The first three interventions are organized similarly to scenario one, but also include additional activities: enhancing M&E, supporting better dissemination of best practices and lessons learned, and coordinating and facilitating training and e-learning. The fourth intervention focuses on providing support to the activities promoted by project managers (TTLs).

Intervention 1: M&E

Moving beyond "business as usual," this scenario includes a more extensive review of potential capacity-building M&E frameworks. Additional outcome indicators would be incorporated into the M&E framework to measure the extent to which new knowledge (1) gets used, and (2) effects the broader organizational, socio-political, or policy environment. A review of other capacity-building M&E frameworks should be conducted in order to ensure the most effective indicators are selected. Given that M&E is critical to encouraging and monitoring effective capacity building, this is a strategic investment of time and resources.

Suggested next steps for GFDRR:

- Include capacity building within M&E requirements. This includes ensuring that it is accounted for in the proposed budget. Requirements should include a description of activities, including type and beneficiaries (as discussed in the section on planning, above). Outputs, such as number of participants trained, should be monitored. A selection of capacity-building indicators for TTLs to choose from should also be integrated into the M&E framework. In scenario 1, indicators focus upon measuring the immediate outcome of capacity-building activities. However, in order to add more depth and greater understanding of capacity-building legacy, indicators should include broader, and longer term outcomes such as "formulated policy" (for examples, see outcomes 5 and 6, annex C, table C1).
- Continuation and formalization of the current systematic assessment exercise (as represented in this report) to allow for overall GFDRR strategic planning on capacity building. With M&E indicators in place, a more effective assessment of impact can be undertaken. With better data, it would be possible to analyze which capacity-building activities are the most effective across the GFDRR portfolio, and prioritize investments accordingly. At a later date, a longitudinal assessment of trends will enable a more strategic overview.

Recommended Scenario

Intervention 2: Sharing knowledge, best practices, and lessons learned

Hosting a capacity-building forum for TTLs, project staff, and managers provides an important space for interactive knowledge sharing.

Suggested next steps for GFDRR:

- More clearly integrate a section on capacity building in the annual report, flagging the value added of these activities for the broader GFDRR portfolio.
- Dissemination of lessons learned and better communication on current activities can improve capacity-building activities at an operational level. The recently launched Resilience and Disaster Risk Management Global Solutions Group knowledge platform might provide a channel for doing so, but there are several other venues that could be explored.
- A regular capacity-building forum for TTLs (internal to the Bank), project staff, and managers, would allow for a more structured exchange on on-going efforts and options.

Intervention 3: Coordinating, facilitating, and developing specific training and e-learning

Beyond maintaining the current, existing partnerships and delivery channels, including with the Tokyo DRM Hub and the Tokyo Distance Learning Center (TDLC) (as described in the previous scenario), this intervention advocates for additional efforts devoted to the development of specific courses, to serve several training purposes. These new courses could be developed with international partners and delivered through the OLC.

- Coordinate and facilitate two existing training/e-learning courses on the basics of DRM ("Introduction to DRM" and "Safe and Resilient Cities"), all existing courses on PDNA, and new programmed courses on gender and DRM, as well as social impact assessment and DRM. These courses should be updated frequently to capture the changes in the political and international agenda, as well as new case studies, or innovative tools and practices. The coordination and facilitation activities could be assured internally by GFDRR, while update and integration of new concepts/tolls might need additional support.
- GFDRR could provide support to partners in the development of new DRM courses, as long as they are complementary to, and not duplicative of, the existing DRM courses. GFDRR could assist in disseminating and communicating these courses when needed, or as per specific agreements.
- Develop further basic training on needs assessments and planning for capacity building. This could be provided for TTLs and Bank staff to encourage more explicit appreciation of existing efforts and also help them to plan to ensure future capacity-building value.

Intervention 4: Supporting activities promoted by project leaders (TTLs)

This intervention focuses upon providing guidance, training, and resources for TTLs in order to support a well-designed approach to capacity-building activities. These activities could suggest the recruitment of a dedicated expert to knowledge and capacity-building advising and management.

Suggested next steps for GFDRR:

- Provide support in the selection of capacity-building activities and the implementation of M&E indicators. The socialisation of a new M&E system will require time and guidance. Support in selecting activities can contribute to a more strategic deployment of activities, moving beyond the idea of capacity building as a subsidiary component.
- Access facilitation to networks and expert rosters. GFDRR's facilitation of expert networks is recognized as one of the most effective capacity-building activities. Expert rosters have proved useful for identifying appropriate experts. Updating and disseminating these would ensure full advantage is taken of this valuable resource.
- Pilot more in-depth needs assessments in up to four projects in the next fiscal year, developing a closer appreciation of how capacity building shapes legacy and further investments.
- Develop a toolkit of resources for TTLs, outlining the most effective ways to conduct various capacity-building activities (e.g. a South-South knowledge exchange). The best practices established in the pilot capacity-building needs assessment could be Included within this toolkit.

Scenario Three Major action taken: GFDRR becomes a key provider of capacity-building activities

GFDRR could, in principle, consider shifting capacity building to the core of its activities. Doing so would require the creation of a unit/function. This would necessitate a significant allocation of funding and resources, including a team of capacity-building experts. The work by GFDRR on capacity building would have to be advertised and viewed as central in the eyes of both internal audiences (the World Bank and the plethora of project partners for GFDRR), as well as in those of the broader DRM community. This centralization would need to take place on two levels:

- The new unit/function would support and supervise capacity-building activities. In so doing, it would provide guidance on both identifying suitable activities—dependent upon the project and context—and designing, implementing, and delivering capacity-building activities. This would require a more extensive formalization of capacity-building planning and monitoring, making capacity-building assessments mandatory before each project/ activity starts, and embedding them into current planning, monitoring, and reporting frameworks.
- GFDRR would take a more distinctive position in the DRM community as a provider of capacity-building services. This scenario implies significant additional human and financial resources to be addressed, specifically to capacity development on DRM through this unit. On the basis of the practices and lessons discussed above, this scenario seems unlikely and a more complex transition from the status quo. While the authors of this report would certainly be available to provide more information as to possible steps towards scenario three, the research team would like to place greater emphasis on the other two possible scenarios, and encourage GFDRR and donor thinking in those very feasible, directions (scenario one and two), setting GFDRR as facilitator or even a strategic enabler of capacity-building efforts.

In conclusion, the authors are advocating for scenario two, in which GFDRR builds upon and cements its current function as an enabler of capacity-building activities. This more strategic approach could bring better scoping of activities and support to TTLs as well as enhancing legacy thinking when designing capacity-building activities.

Table 1 summarizes the three scenarios and outlines the organizational structure that would be required in order for each scenario to be successful, including: the necessity to add specific functions to those that already exist; the type of activities that would be included; and partnerships and collaborations with clients and external partners.

Table 1: A summary of the 3 scenarios for GFDRR

,	Organizational structure	Activities	Partnerships
Scenario 1 Business as usual	No changes	 Activities 1) M&E for accountability of project/activities; 2) Development and dissemination of knowledge notes to document selected project/activities; 3) Coordination and facilitation of existing e-learning and training through existing partnerships. 	1) Maintain existing partnership for e-learning deliveries; 2) Assure key partnership with clients and local partners for specific capacity-building activities within projects.
Scenario 2 Moderate action	One expert on capacity building and knowledge management	1) M&E for accountability of project/activities and impacts; 2) Development and dissemination of knowledge notes as a systematic practice for every capacity-building activity; 3) Coordination and facilitation of existing e-learning and training, plus additional courses to be developed on a needs basis; 4) Support activities of TTL: advise and support on capacity-building activities selection, access roster and networks, piloting capacity- building needs assessment, implementation of effective M&E.	1) Maintain existing partnership for e-learning deliveries and activate new ones for new courses to be developed; 2) Assure key partnership with clients and local partners for specific capacity-building activities within projects.
Scenario 3 Major action taken	Capacity-building unit/ function to support/supervise capacity-building activities, and provide guidance on how to: identify activities; design, implement and deliver capacity building; and disseminate and communicate outcomes and lessons learned.	 Several toolkits to be developed, including one for capacity-building needs assessment to be operated before any project/ activity; 2) Training and e-learning courses on an ad hoc basis; 3) M&E for accountability and impacts; Extensive dissemination and communication activities to present capacity-building outcomes. 	 For specific projects: client/ partners and local experts; For capacity-building global initiatives: new partnerships to be activated for global initiatives (not related to specific projects) with selected partners, e.g. the United Nations, academic institutions, Foundations, etc.

ANNEX A

STOCKTAKE: UNDERSTANDING THE LANDSCAPE

An Overview of the Global Facility for Disaster Reduction and Recovery's Capacity-building Activities

The team began by taking stock of the overall landscape of The Global Facility for Disaster Reduction and Recovery's (GFDRR) active portfolio of projects. There were three main purposes for this exercise:

- 1. Understand the level of engagement on capacity building by isolating a capacity building component in projects supported by GFDRR funds;
- 2. Allow for comparison to other current and former projects;
- 3. Offer recommendations that are evidence-based, replicable, and effective in further enhancing the value capacity building brings to GFDRR investments.

Summary of Findings

Key takeaway lessons from the exercise are:

- Twenty-four percent of GFDRR active portfolio in FY14 and FY15 was allocated for capacity building;
- The largest expenditure and more than half the total budget for these activities was in risk identification (pillar 1) and risk reduction (pillar 2);
- Capacity building in risk identification (pillar 1) accounts for 29 percent of the overall capacity-building budget, more than financial protection (pillar 4), resilient recovery (pillar 5) and cross-cutting combined;
- The majority of GFDRR projects tend to have a short lifespan somewhere between one and three years, which makes implementation of long-term capacity building a challenge;
- There are few projects that are driven¹ by capacity building; only a small portion of GFDRR projects dedicate more than 50 percent of their budget towards capacity-building activities;
- Small projects (in budget size) tend to have substantial capacity-building commitments (41 percent of those with more than 50 percent of the overall budget in this area);
- The most common capacity-building activities are short-term learning activities (34 percent of projects) and knowledge products (18 percent).

Developing the Stocktake

The research supporting this report was constructed primarily on a review of the current GFDRR portfolio of projects. In particular, the University College London-World Bank team tasked with this review analyzed 300 GFDRR grants active during FY 2014 and FY 2015².

In this study, capacity building was identified as activities that contribute to one or more of the following areas outlined in Box A1³.

¹ Projects driven by capacity building are defined as those that have over 50% of their budget dedicated specifically to capacity building activities.

² The team's analysis included the review of project documents, including those housed within the results-based management system (RBMS).

³ Drawn from: WBI (2009) The Capacity Development Results Framework: A strategic and results- orientated approach to learning for capacity development, <u>http://siteresources.worldbank.org/CSO/Resources/228716-1369241545034/</u> <u>The Capacity Development Results Framework.pdf</u>. It is important to note that capacity-building budget per project was calculated using an approximation as capacity building is not accounted for in a separate project line. The approximation was calculated by adding the budget line 'logistics' (training, workshops, conference facilities, and stakeholder consultation) with 'dissemination costs' (translation, editing, and publication). Capacity-building accounting for \$33 million (24% of GFDRR funding) is, therefore, a conservative estimate.

Box A1: Types of Capacity-building Activities

- A. Knowledge products (e.g. issue analyses, country studies, evaluations)
- B. Short-term learning (e.g. workshops, training sessions)
- C. Long-tern learning (e.g. courses, e-learning, university programs)
- D. Consultations with stakeholders
- E. Campaigns
- F. Knowledge exchange (e.g. fostering partnerships, developing networks)

This assessment of capacity-building activities summarizes the following:

- The level of investment in different areas (geographically, thematically);
- The type and length of the engagements;
- The beneficiaries targeted across GFDRR's portfolio of projects.

Because capacity-building outputs (e.g., number of participants trained, knowledge products created), objectives (e.g., stakeholder agreement reached) and outcomes (e.g., policies formulated) were often not thoroughly documented, this stocktake cannot compare or comment on the impact and outcomes of these activities.

How Much Does GFDRR Invest in Capacity Building?

Out of more than \$137 million in GFDRR commitments (during FY14 and FY15) that were reviewed under this study, approximately \$33 million (24 percent) was dedicated to capacity-building activities. This shows that capacity building is a substantial part of the GFDRR portfolio (figure A1).

The overall picture of current GFDRR capacity-building activities points to a need for a committed, strategic and well-planned future focus on capacity building.

How much does GFDRR invest?

The overall picture of GFDRR capacity building activities builds a clear case for serious, systematic and forward-looking attention to capacity building. Out of more than \$137 million committed during financial years FY14 and FY15, approximately USD33 million (24 percent of GFDRR funding) was dedicated to capacity building activities. This shows that capacity building is a substantial part of the GFDRR portfolio.

It is important to note that capacity building budget per project was calculated using a proxy as capacity building is not accounted for in a separate project line. The proxy was calculated by adding the budget line 'logistics' (training, workshops, conference facilities and stakeholder consultation) with 'dissemination costs' (translation, editing, and publication). Capacity building accounting for \$33 million (24 percent of GFDRR funding) is, therefore, a conservative estimate.

Significantly, out of the 300 GFDRR grants analyzed for this study, roughly a third (109/300) supported large-scale projects for a total of \$6,956,009,900. This points to a connection between capacity-building activities and broader investments in key areas, and highlights the *potential* value added of capacity building (for capacity-building legacy and impact see

Figure A1. Average Percentage of Funding for Capacity-building Activities Built into GFDRR Grants Across the FY14 and FY15 Active Portfolio



'key questions' 2 & 3 in the main body of text). This evidence further supports the case for a committed, strategic, and well-planned future focus on capacity building. Table A1 is a breakdown of large-scale projects (directly supported by GFDRR grants) by region:

Table A1: Connecting GFDRR Grants and Wider Investments Across the FY14 and FY15 Active Portfolio⁴

Region	Supporting Projects Amount (in US\$ Millions)
Africa (AFR)	\$2231.72
East Asia Pacific (EAP)	\$591.33
Europe and Central Asia (ECA)	\$449.34
Latin America and Caribbean (LCR)	\$1580.09
Middle East and North Africa (MNA)	\$0.91
South Asia (SAR)	\$2101.10
GLOBAL	\$1.51
Grand total	\$6956.01

Where Does GFDRR Invest?

The 24 percent average project budget dedicated to capacity-building activities in each GFDRR grant is fairly consistent across all regions of operation for the Bank (table 2).

- The highest percentage of capacity-building financing is in the Middle East and North Africa (MENA) region, at just over 30 percent (despite being the lowest funded region in terms of overall grant amounts).
- The lowest percentages are in the East Asia Pacific (EAP) region and South Asia (SAR) region at about 1 percent and 19 percent respectively.

Global projects are slightly above the average, with nearly 30 percent dedicated to capacity building—a clear statement to the value of these activities at both localized regional levels and international cross-cutting activities. Table A2 provides a breakdown of average percentage of budget for capacity building by region:

Table A2: Average Percentage of Budget for Capacity Building Across Regions Across the FY14 and FY15 Portfolio

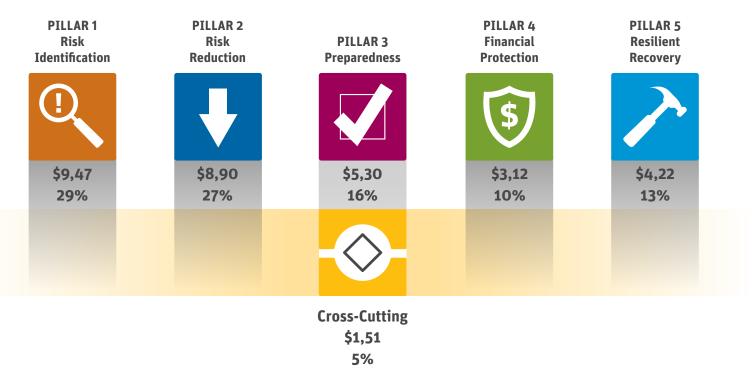
Regions	Total Grant Amount (in US\$ Millions)	Amount of Grant for Capacity Building (in US\$ Millions)	Percentage of Budget for Capacity Building
AFR	\$ 49,81	\$ 13,09	26%
EAP	\$ 32,40	\$ 5,98	18%
ECA	\$ 5,74	\$ 1,34	23%
LCR	\$ 15,59	\$ 3,88	25%
MNA	\$ 4,59	\$ 1,38	30%
SAR	\$ 11,77	\$ 2,20	19%
GLOBAL	\$ 17,77	\$ 5,26	30%

⁴ These figures represent the amount, in World Bank investments, that was directly supported by GFDRR grants (either through direct co-financing or for preparation purposes), and categorized as such in the World Bank's internal system. Therefore, these figures do not include other large-scale World Bank, or external investments that may have resulted as a result of GFDRR engagements.

How Does Capacity Building Align to GFDRR Pillars and Engagements?

While a characteristic of GFDRR is the relative consistency of capacity-building funding, it is noteworthy that the largest expenditure and more than half the total budget for these activities lies in risk identification (pillar 1) and risk reduction (pillar 2). Risk reduction accounts for 29 percent of the overall capacity-building budget; this is more than the investment in financial protection (pillar 4), resilient recovery (pillar 5), and cross-cutting activities⁵ combined (figure A2).

Figure A2: Total Capacity-building Expenditure Across the FY14 and FY15 Active Portfolio Disaggregated by Pillar (in US\$ millions)



The frequency of capacity-building activities across different GFDRR supported projects was also plotted (figure A3). Capacity building investments appear to be the most frequent across GFDRR engagements in the form of strategic and preparatory work for risk reduction. Within Pillar 1, during FY14 and FY15, risk assessments and data and information sharing capacity-building activities were each twice as frequent as hazard mappings. Within Pillar 3, contingency planning capacity building is more frequent than each of early warning systems and forecasting and service delivery.

⁵ Cross cutting activities are those which link to more than one pillar of action.

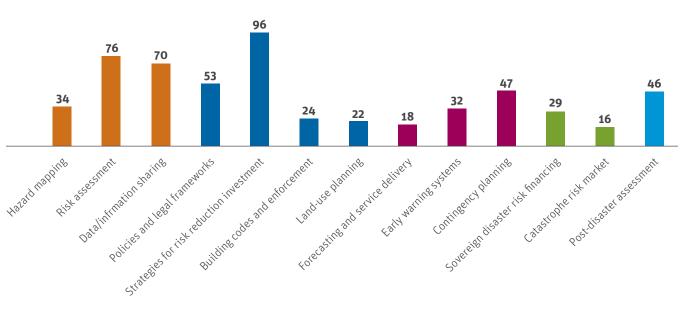


Figure A3: The Number of Capacity-building Activities by Output Types Across the FY14 and FY15 Active Portfolio

What Is the Average GFDRR Project Lifespan?

In terms of project timeframes, the majority of GFDRR projects tend to have a lifespan somewhere between one and three years (30 percent between one and two years, and 29 percent between two and three years). This could make long-term capacity building implementation challenging. As we highlight below, these timeframes are often at odds with political, legislative and even academic cycles, and might present some important challenges to the effective deployment of capacity-building schemes by GFDRR. Nonetheless, as in the case of the Malawi Post-disaster and Recovery Framework project which lasted 17 months (although did build on previous work) or Women 4 Resilience in MENA) project that lasted 14 months, short time frames are not always a limitation to what can be achieved. As we detail more explicitly in Annex B.

What Are Key GFDRR-Supported Capacity-building Activities?

The most common capacity-building activities are short-term learning activities and the development of knowledge products. Out of the 300 projects 59 percent reported including at least one short-term learning activity and 31 percent reported including knowledge products. Long-term learnings and campaigns are the least common capacity-building activities. Out of the 300 projects 10 percent reported including a long-term learning activity and eight percent reported including a campaign. However, it is noteworthy that long-term learning activities and campaigns have a longer life span thus the frequency is expected to be lower (figure A4).

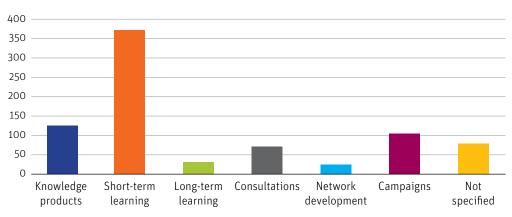


Figure A4: The Number of Different Activity Types Across the FY14 and FY15 Active Portfolio

Who Are the Beneficiaries of GFDRR-supported **Capacity-building Activities?**

The range of beneficiaries on the ground who are targeted by capacity-building efforts is also wide. An analysis shows that a large proportion of projects are primarily focused on government and institutional counterparts (191 and 109 of the 300 projects respectively). The other most common beneficiaries are community groups (63 projects) and DRM professionals or technicians (50 projects). Only a minority of projects are aimed at benefiting the private sector (15) or the wider DRM community (16).

Unpacking the Stocktake

While knowing the overall landscape of where and how GFDRR's capacity-building efforts are being targeted is useful, the correlation of the categories of projects provide some of the most important early conclusions on the role of capacity building in GFDRR supported projects. In order to compare the categories, the research team classified projects by *budget* size, project *duration*, and percentage of budget dedicated to capacity building (box A2).

Box A2: A Categorization of Projects by Budget Size, Duration, and Percentage of Budget Dedicated to Capacity Building

	Budget Categori	ategories (in US\$ Millions [
0	Small	\$ 0.01-0.2M	One y
I	Medium-Small	\$ Ο 2-5M	Rotw

Meanum Small	ψ 0.2 μη
Medium-Large	\$ 0.5-1M
Large	\$1-5M
Outlier	\$ <0.1M or >5M

tion Categories year or less Between one and two years Between two and three years More than three years Outliers

Percentage of Budget Categories Up to 10% 10-25% 25-50% Over 50%

Comparing Budget, Duration, and Activity Type

Comparing budget size to the duration of projects shows that 53 percent of medium-small projects last between one and two years. This means that the typical timeframe available for capacity-building efforts is somewhat short (below one year) and unlikely to surpass legislature, political and even academic terms.

The majority of large projects tend to last at least two years or more, with 41 percent lasting between two and three years and an encouraging 36 percent lasting more than three years with possibilities for long-term capacity-building exercises. It appears that projects lasting less than a year are unusual, (only 11 percent of the total) although as we discuss further in Annex B, it might be premature to equate length of a project to its potential capacity-building effectiveness.

Regardless of size and length, there are few projects that are *driven* by capacity building; only a small portion of GFDRR projects dedicate more than 50 percent of their budget towards capacity-building activities (approximately eight percent of projects reviewed). And, those projects that budget more than 50 percent of their budget for capacity-building activities tend to be small in overall budget size, such as the Malawi PDNA and Recovery Framework project.⁶

Project budget size	Percentage of Budget for Capacity-Building Activities				
	Up to 10%	10-25%	25-50%	Over 50%	Grand Total
Large	27.91%	41.86%	25.58%	4.65%	100%
Medium-Large	26.32%	31.58%	36.84%	5.26%	100%
Medium-Small	19.67%	50.82%	21.31%	8.20%	100%
Small	30.61%	34.69%	20.41%	14.29%	100%
Grand Total	25.71%	40.00%	26.19%	8.10%	100%

Table A3: Overall Project Budget Size Compared to the Percentage Invested in Capacitybuilding Activities Across the FY 14 and FY15 Active Portfolio

Moreover, when we consider jointly the length of projects and the percentage of budget dedicated to capacity building, those that budget more than 50 percent for capacitybuilding activities tend to be longer in length, with 43 percent of those over 50 percent lasting between two and three years and 36 percent lasting over three years. When we consider this in relation to the types of activities conducted, we find the majority of activities are short-term learning activities (59 percent of projects reported having at least one short-term learning), followed by knowledge products (31 percent reported knowledge products). This seems to be driven more by the length of the project than the activities needed. Very little network development takes place in projects that last less than a year (only six percent of projects undertaking network development are less than one year in length). This might have implications for the long-term effectiveness of capacity building as the case studies flag in Annex B. In the main body of text, the answers to key question 2: 'How can we build sustainability and a lasting impact from capacity building?' propose means by which the legacy and impact of short-term learnings can be multiplied.

⁶ See Annex B for a case study of capacity building activities in this project.

The majority of capacity-building activities take place in projects with higher and medium budgets, respectively at 42 percent and 33 percent, signalling a need for a wider commitment when this activity is deemed necessary. Approximately 43 percent of long-term learning activities take place in projects with a medium-large budget.

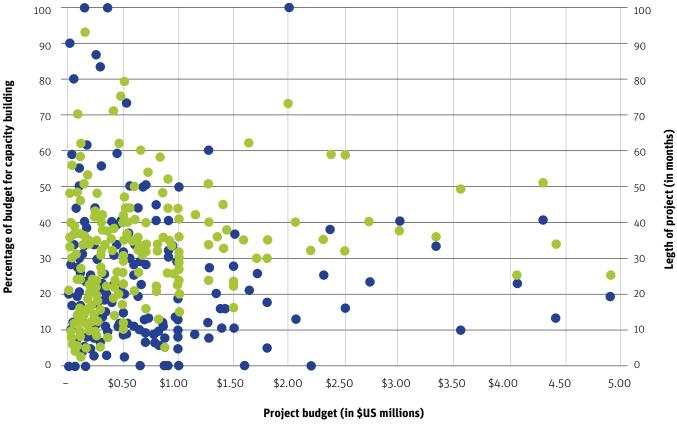


Figure A5: Overall Project Budget Compared with the Percentage of Budget for Capacity Building and Project Duration Across the FY14 and FY15 Active Portfolio

% of budget for capacity-building activities

Geographies of Capacity-Building Budget

GFDRR-supported capacity-building activities vary geographically; therefore, we should also consider regional differences in the ways in which GFDRR has been investing. From an initial stocktake of GFDRR efforts, some counter-intuitive lessons emerge. For instance, while in FY14 and FY15 there were large budget projects in MENA, over 66 percent of MENA projects had at least a quarter of their budget dedicated to capacity building. With approximately 11 percent of projects dedicating 50 percent or more of their budget to capacity building, MENA is the third highest region behind ECA (about 13 percent) and global projects (about 14 percent).

Global and ECA projects have a more balanced budgetary allocation for capacity building as measured by project allocation spread. The former is showing a fairly even allocation between the lowest number of projects (about 14 percent dedicated to capacity building over 50 percent of total budget) and the highest (approximately 31 percent dedicated to capacity building between 10 and 25 percent of total budget). On the contrary, regions like MENA or LCR and EAP (respectively with 49 percent and 46% of projects dedicating between 10 and 25 percent of total budget to capacity building) all show specific investment focuses in the type of projects put in place.

Regions	Percentage of Budget for Capacity-building Activities			
	Up to 10%	10-25%	25-50%	Over 50%
AFR	22.41%	37.93%	32.76%	6.90%
EAP	35.90%	46.15%	15.38%	2.56%
ECA	25.00%	37.50%	25.00%	12.50%
GLOBAL	38.89%	30.56%	16.67%	13.89%
LCR	14.29%	48.57%	31.43%	5.71%
MNA	0.00%	33.33%	55.56%	11.11%
SAR	33.33%	38.10%	19.05%	9.52%
Total	26.64%	39.72%	25.70%	7.94%

Table A4: Percentage of Budget for Capacity Building Compared with Region

ANNEX B

THE CASE STUDIES: TAKING A DEEPER DIVE

Developing the Case Studies

Annex A reviewed the broader landscape of capacity building across the Global Facility for Disaster Reduction and Recovery (GFDRR) fiscal year 2014 and 2015 portfolio (FY14 and FY15), this annex takes a deeper dive into ten case studies. The case studies presented provide useful insights into the potential that capacity building holds in GFDRR supported projects. This section does not seek to provide a comprehensive overview of all types of GFDRR supported projects, but rather a chance for the reader to better understand capacity building in context. To provide a diverse sample, the case studies were selected in terms of geographical location as well as a variety of project typologies: grant size (cost), proportion of capacity-building activities, multiple phases or single take, length, and pillar of engagement. Task Team Leaders (TTLs) were also consulted as to which projects would be interesting to research in more depth.

Central America Probabilistic Risk Assessment— A Case Study in Technical Capacity Building





Duration **3.5** years March 2013–September 2016

Capacity-building activity types

 Knowledge products, short-term learning, knowledge exchange



Capacity-building beneficiaries

- Government/public officials
- Professionals/technicians

- The presence of a knowledge manager, a role not frequently included in GFDRR funded projects, was crucial to integrating key lessons learned into the project design.
- When possible, involving Disaster Risk Management (DRM) champions from the beginning of the project was critical in disseminating risk assessment results to decision-makers.
- A community of practice coordinator could ensure long-term sustainability of knowledge networks.

DRM has begun to emerge as a priority for many national governments in Latin America. However, mainstreaming DRM into development policies and programs remains a challenge. In response, in 2008, several trust funds financed through GFDRR and the Spanish Fund for Latin America and the Caribbean (SFLAC) supported the development of the Central America Probabilistic Risk Assessment (CAPRA) Program. The CAPRA initiative started as a partnership between the Center for Coordination of Natural Disaster Prevention in Central America (CEPREDENAC), the United Nations International Strategy for Disaster Reduction (UNISDR), the Inter-American Development Bank (IADB), and The World Bank. The main objective of CAPRA was to provide countries in Central America with an online disaster risk assessment platform to help understand and quantify disaster risk. Training on how to use the platform was provided to government officials and DRM experts.

The CAPRA initiative was an eight-and-a-half-year program that recently came to an end. The project was rolled out in three phases. The first phase (2008-2010) focused on creating the software platform and generating disaster risk information for six Central American countries. The second phase (2010-2013) shifted focus to building institutional capacity by engaging governments as owners of the risk analysis process and results. This was then operationalized through Technical Assistance Projects (TAPs) for targeted government agencies. Additionally, during this phase the program was extended to several South American countries. In phases one and two, the World Bank played a leading role in both the development of the software and the generation of the risk assessments. In the third and final phase (2013-2016), with funding from The Australian Department of Foreign Affairs and Trade (DFAT) through GFDRR, and a recipient-executed trust fund from SFLAC to CEPREDENAC, five TAPS were implemented. In this phase the CAPRA initiative refocused in Central America. CEPREDENAC was responsible for coordinating the TAPs in Panama, Guatemala, Nicaragua and El Salvador. The World Bank's role was limited to providing training and technical assistance to local teams. The TAPs in El Salvador and Nicaragua will be the focus of this case study.

Problem Addressed

Both Nicaragua and El Salvador are active members of CEPREDENAC, an inter-governmental network established to strengthen disaster prevention and preparedness at a regional level. Nicaragua is considered a DRM leader in Central America due to its legal framework that takes a comprehensive and multi-sectoral approach to DRM. El Salvador also has a comprehensive legal and institutional structure for DRM. However, both countries have the challenge of generating, refining, and interpreting disaster risk information that can be integrated into policies and programs within changing built, socio-economic, and natural environments.

Proposed Activities and Outputs⁷

In order to support governments in overcoming this challenge, the CAPRA program was developed. The CAPRA program uses a modular, free platform for probabilistic risk assessment of natural hazards. Specific areas requiring disaster risk information were identified based on the priorities of the requesting government institution. For Nicaragua, a seismic risk

⁷ A similar approach to El Salvador and Nicaragua was adopted across all phase three TAP projects.

Knowledge Management

he World Bank knowledge manager role, a role not frequently included within GFDRR-funded projects, was crucial to the success of the project and fulfilled responsibilities that the TTL did not have capacity to undertake. The knowledge manager was responsible for interviewing the trainees and reporting back on recommendations and lessons learned for integration into the project design. Having a knowledge manager to review progress and effectiveness was particularly important given the geographical and temporal scale of this project. Throughout the project, lessons learned were integrated, significantly shifting the course of the CAPRA initiative. Major shifts included the reduction of the World Bank's involvement in developing the risk assessments, as well as adjusting the structure of the TAPs to have a more flexible approach.

model focusing on the health, education, and housing sectors in Managua was proposed. The local TAP team included members from the National System for Prevention, Mitigation and Disaster Response (SINAPRED) and the National Institute of Territorial Studies (INETER). For El Salvador, a seismic risk model was proposed for the metropolitan area of San Salvador, city of Santa Tecla. The local TAP team included the Ministry of Environmental and Natural Resources (MARN), the Ministry of Public Works (MOP), and the University of El Salvador.

The TAPs were composed of a series of technical capacity-building activities that included: training courses on CAPRA software, regional workshops for knowledge exchange, and a final workshop to disseminate the results achieved. The desired outcomes of these activities were: build institutional capacity to conduct risk analysis, and improve risk understanding for decision-making in order to develop risk reduction programs, and lastly build a regional community of practice (CoP) of experts in disaster risk assessments hosted on the online CAPRA platform.

Capacity Building Shaping the Project

Core workshops on how to use CAPRA software were provided for the TAP teams. These were then supplemented by webinars, and if further help was needed in a particular area, additional targeted training was provided by World Bank consultants. For example, the Nicaragua team was given supplementary technical training for generating vulnerability curves after the core training sessions. This flexible approach to project management and learning was adopted to account for differing capacity levels of participants – a lesson learned from phase two of CAPRA and integrated into phase three TAPs. Furthermore, this signals a shift from bank-led TAPs to a format guided more by local institutions and universities.

However, the Professor of Civil Engineering, responsible for leading the creation of the risk maps in El Salvador, argued that the core training was not sufficient for understanding how to use the CAPRA software and how to run and interpret risk assessments. Rather, he maintained that the World Bank consultants were not always available to address questions from the team and, given the complexity of concepts and tools, the consultants should have been more accessible to provide supplemental training. The University of El Salvador team consequently sought support from technical experts from international

academic institutions. In the absence of effective monitoring and evaluation (M&E) for capacity-building activities, this could be a reflection of a broader accessibility issue, but could also be a 'false negative' emerging from an individual experience – thus further reinforcing the need for M&E mechanisms to appreciate the real value, or limitations, of capacity building in the field. The idea behind a reduction in World Bank involvement was to encourage ownership, sustainability, and institutional capacity building. El Salvador's experience, including collaboration with international academic institutions, can also be seen as contributing to local ownership of the learning process and project outputs by reducing the team's dependence on technical assistance; however, based upon the feedback from the Professor at the University of El Salvador, and lacking any other clear M&E data, ownership needs to be balanced with providing the necessary amount of technical support to participants.

The TAP in El Salvador was one of the most effective in building technical risk analysis capacity, largely due to the involvement of the University of El Salvador in the TAP team alongside members from the Ministries. The university already had the theoretical knowledge and expertise necessary for launching the workshops. Conversely, Nicaragua did not have involvement of an academic institution and lacked available human resources from government agencies. Therefore, the risk map was of a lower quality and the team were unable to take full advantage of capacity-building activities.

The involvement of universities can help bridge capacity gaps by building a platform of local expertise connected to the government. For example, at the University of El Salvador engineering postgraduate students collaborated with teams to collect data for risk modelling and were involved in the data analysis. This extended expertise beyond TAP participants. Furthermore, the Technological University of Panama (UTP) has established a diploma course in the CAPRA methodology in order to grow the pool of local expertise and contribute to the legacy of the initiative.

Three regional workshops took place in Managua, Guatemala City, and San Salvador during 2014 and 2015. The first focused on developing vulnerability curves, the second discussed how to run the risk analysis, and the third ran creative sessions on how to communicate to non-technical audiences and provide visibility to the technical output of risk modelling. This creative session used role-playing exercises where World Bank consultants played the role of different ministries and had the teams presented the technical outputs of their models. After this session, there were significant improvements in the participants' ability to pass on technical knowledge more effectively to decision-makers. These three workshops supported the learning process of the TAP teams by enabling peer-to-peer knowledge exchange and development a regional CoP. For example, the team in Guatemala, that was just starting to engage with the CAPRA project, was able to learn from teams further along in the learning process, particularly the team in El Salvador. In addition, the presence of World Bank consultants at the regional workshops provided a crucial source of technical expertise.

To ensure that a connection was made between the TAP results and decision-making processes, when possible, ministries were involved throughout the implementation of the TAP. Ideally, meetings were held with different ministries at the outset to help form the local TAP teams. Involving technical participants from ministries early made it easier to explain

findings and discuss the methodological process in later stages. At the end of each TAP, there was a presentation of results to relevant ministries. This strategy created champions of the CAPRA process within government ministries and increased government trust in the outputs. In El Salvador, for example, participants from the Ministry of Environmental and Natural Resources (MARN) were actively involved in promoting CAPRA results within their own and other ministries.

The CAPRA online platform provided a means of consolidating and sharing knowledge products created throughout the eight-and-a-half-year engagement, and an important virtual space where TAP teams could communicate.

The Legacy of Capacity Building

Building upon the TAP process, the World Bank, supported by GFDRR financing, provided a number of client countries with technical assistance to develop sector-specific risk reduction programs. For example, in El Salvador, a Safer Schools project took advantage of the data and expertise developed through previous TAPs and worked with the local team (The Ministry of Education and MARN) to develop a detailed seismic risk assessment of the entire school infrastructure.

The regional workshops and online platform were intended to strengthen partnerships and support the creation of a formal CAPRA web-based Community of Practice (CoP). Despite these intentions, only an informal CoP around CAPRA emerged and interactions have reduced over time. A CoP manager likely could have ensured long-term sustainability of knowledge networks. It was hoped that CEPREDENAC would take this role, however, they were unable to due to internal restructuring. The online platform ECAPRA is due to be taken offline since the project has concluded. For the legacy of the project to live on, its tools and modules need to remain available. The CAPRA team recently launched an Open Call for Expression of Interest for transferring the CAPRA website to an institution interested in hosting the site and maintaining the CAPRA community. The objective is to keep the website and all the current content open and freely available. These resources, even if they are static, are essential to building sustained capacity.

Leveraging

The World Bank, with financial support from GFDRR, is financing a project in El Salvador that will use CAPRA data to assess the risk exposure of the country's education infrastructure. The main partners are the Ministry of Education and MARN. In addition, a TAP in Peru, from phase 2 of CAPRA, which assessed the seismic risk of schools across the Metropolitan Area of Lima and Callao, created interest amongst the Ministry of Education. This led them to request support from the World Bank to conduct a national disaster risk assessment of all school infrastructure, develop the National School Infrastructure Plan, and create a Seismic Retrofitting Program.

South-South Knowledge Exchange—Building Women's Leadership in DRM





Duration **3.5** years January 2010–June 2013

Capacity-building activity types

 Knowledge exchange/ partnership development, short-term learning Budget break down not provided in project documents

Pillars



Capacity-building beneficiaries

- **Citizens/communities**
- Government/public officials
- Civil society organizations

- The sustainability of community capacity building projects can be enhanced by working with and through existing community organizations and networks.
- Peer-to-peer learning networks and a "training of trainers" approach were key to accelerating and scaling up capacity building and resilience initiatives.
- Local organizations can be highly effective in leveraging funds for further resources.

In 2010, the Building Women's Leadership and Fostering Collaborations toward Community Disaster Resilience project was launched by GFDRR, the World Bank, and Grassroots Organizations Operating Together in Sisterhood (GROOTs). The project was implemented in high-risk regions of India (by Swayam Shikshan Prayog), in Guatemala (by Fundación Guatemala), and in Honduras (by WAGUCHA). This project was a standalone capacity building project and sought to support women from resource-poor communities in their efforts to shape disaster resilience agendas and practices on the ground. The initiative allowed Grassroots Women's Organizations (GWOs) to demonstrate their skills as builders of community resilience, helping them to engage in effective partnership with local and national government to innovate and scale up locally led DRM initiatives. A key component of this project was the creation of knowledge exchange platforms between policy makers and practitioners, both within and across the three countries. This case study focuses upon building capacity among local communities, specifically GWOs. Although the initiative spread across three countries, the main focus will be upon activities undertaken in India.

Problem Addressed

Across the three countries, two common gaps in current government DRM practices were identified:

- The prevailing tendency to conflate DRM with emergency preparedness and response measures, which fail to address the long-term vulnerabilities embedded in poverty;
- The failure to recognize or facilitate innovative community resilience strategies, often led by women's groups, and their proactive leadership amongst local communities.

Proposed Activities and Outcomes

The overarching goal of the project was the facilitation of women's leadership and forging of partnerships to drive the demand for the implementation of locally-driven resilience practices, which reduce community vulnerability. A series of core activities were implemented through local civil society organizations (CSO), the activities were adapted to the context of the respective countries. The core activities included:

- The training of GWOs and local authorities in disaster risk mapping in order to develop local resilience plans;
- Providing financing for, and scaling up of, a Community Resilience Fund (CDRF), established in 2008, to give seed funding to GWOs to demonstrate community resilience practices;¹¹
- Facilitation of relationships with GWOs and government institutions through activities such as workshops and information fairs; and
- The development of local, national, and international knowledge sharing platforms.

¹¹ In 2008, ProVention Consortium supported SSP in partnership with Huairou Commission and National Alliance for Disaster Risk Reduction (NADRR) India to create the CDRF. The pilot initiative took place in high-risk areas of eight states across India – it was coordinated by SSP and CSO and was endorsed by the Indian National Disaster Management Authority (NDMA).

The project built upon the idea that if GWOs were provided with knowledge and financial resources, this would give them the confidence and legitimacy to leverage newly-built partnerships with government institutions, and to advocate for scaling up and integrating community resilience practices in local, national and regional DRM plans.

Capacity Building Shaping the Project

The GROOTS network member Swayam Shikshan Prayog (SSP) along with three supporting CSOs, were responsible for project implementation in India. SSP and the other CSOs had previously worked with and helped to form GWOs as their basic building blocks of project implementation. These pre-existing networks were utilized as the organizational structure for this project. Over the three-year project time frame, SSP and its local partners worked with 350 GWOs across their network, spread across 70 villages. Fifteen hundred women were trained to become community resilience leaders.

The first phase of the project included the training of GWOs, alongside representatives from local authorities, to conduct risk and vulnerability mapping. The outputs of these interactive exercises included the creation of 70 village maps and community-led resilience plans. This project was centred upon the belief that local communities that live in hazardous regions hold existing capacity and local knowledge in disaster resilience practices. As a result, the disaster risk maps and subsequent planning documents built upon community resilience practices and existing social networks.

Through the disaster risk mapping exercise, women were organized and trained to analyze the root causes contributing to their vulnerability to natural hazards and climate change. This was a foundational step towards identifying concrete actions that GWOs, in collaboration with local authorities, could undertake to increase community resilience. The Executive Director of SSP noted that it was important to include local authorities from the beginning in the mapping and then planning process. In Guatemala and Honduras, the same approach was adopted.

The CDRF provided GWOs with an opportunity to operationalize concrete solutions for strengthening ecosystem management and reducing the impact of disasters on their livelihoods. In India, over the three years, grants totalling close to \$51,000 were distributed to 50 community-driven models of disaster resilience. This acted as seed funding for GWOs to experiment and demonstrate simple yet effective ideas, including the development of seedbanks, vegetable cultivation for food security, and re-forestation. Because the funds were modest, it encouraged GWOs to negotiate, match, and leverage resources from government schemes.

An important component of this project was facilitating relationships between the GWOs and local and state government institutions. In these resource-poor communities, the efforts of GWOs to build community resilience would not be sustained without long-term partnerships with local, district, or state governments. SSP and the supporting CSOs facilitated this relationship through workshops, including on collaborative risk mapping. However, there were two key obstacles to overcome in building these partnerships. First, women were considered inexperienced by government agencies resulting in resistance to women-led initiatives. Second, it was difficult to shift the government's mind-set from disaster response to risk reduction and resilience. These obstacles were countered through:

involving local government officials from the outset, starting with the risk mapping; the demonstration of women's leadership skills through their CDRF projects; coverage of the women's innovative projects in the media to generate public support.

These measures were ultimately successful. During the project timeline, the increase in local partnership between GWOs and local government at the district and local levels unlocked resources from 20 government development schemes to fortify community resilience efforts. In addition, the GWOs persuaded state technical institutes and universities to provide specialized training to support their initiatives.¹² These training linkages ensured that more than 750 rural women gained skills related to sustainable agriculture, nutrition, sanitation, and primary healthcare. Furthermore, successful rounds of negotiation between GWOs and local government bodies led to the formation of six disaster task forces that were linked with the District Disaster Management Authorities for relief, and other disaster management activities. Women resilience leaders received public acknowledgement for their roles as information providers and conduits between communities and government.

There was also a "training of trainers" component to the project, which spread the impact of the capacity-building activities. In collaboration with SSP and supporting CSOs, the womenled disaster task forces developed a dedicated training manual and provided peer-to-peer training at village, district, and block levels. In a three-year period, they trained a further 900 women.

An innovative way of enabling knowledge exchange was the creation of model villages, which were "live classrooms" for learning. Fifteen to 20 villages, that had effectively demonstrated community resilience practices and succeeded in leveraging funding to scale their projects, were identified as model villages. Selected GWOs members travelled to these model villages, "their purpose was to serve as laboratories for learning and replication of community resilience strategies."¹³

Peer learning networks acted as dialogue platforms and were key to accelerating and scaling up resilience initiatives. Learning exchanges were organized at local to national level in Guatemala, Honduras, and India. Peer learning was focused on adaptive agriculture practices, sustainable livelihood initiatives, disaster task force, and preparedness by grassroots communities, and local partnerships to strengthen resilience initiatives.

The Legacy of Capacity Building

Although creating systemic changes and building partnerships is a long-term process, "the project, in a short three-year period, built new paradigms and triggered behavior change for local women resilience leaders."¹⁴ The women who participated in the initial training, rollout training, and subsequent initiatives have continued their roles as community leaders in DRM. In India, three years after project completion, GWOs continue to work with local authorities in order to scale up their community resilience initiatives, and peer-to-peer

¹² These were poverty alleviation and employment guarantee and entitlement schemes, not specifically allotted to the local disaster agendas and disaster management offices of districts.

¹³ Manisha Gupta (2013) Building Women's Leadership and Fostering Collaborations for Community Disaster Resilience: Process Innovations and Case Studies from India, p. 22. <u>http://disasterwatch.net/resources/WB-SSP-resilience-report2013.pdf</u>

¹⁴ *Ibid*, p. 6.

Certification of Grassroots Women as Disaster Risk Reduction and Development Practitioners in Guatemala

In Guatemala, a different partnership framework was developed between the GWOs and government institutions. Impressed by the women's groups who had created local risk maps and resilience plans, the National Coordinator for Disaster Reduction in Guatemala (CONRED), supported by Fundación Guatemala, supplemented these efforts by training seven GWOs in disaster preparedness, prevention recovery, and emergency response. The women were then certified as local development agents for Disaster Risk Reduction. As a result, the women have been recognized as local leaders in disaster resilience and response. For example, they have access to CONRED information, allowing them to prepare their communities when a disaster is predicted. Furthermore, their traditional and technical knowledge is acknowledged by CONRED, and is used to inform the incorporation of community interventions into the Disaster Risk Reduction National Policy.

The GWOs worked with Fundación Guatemala to create a certification training curriculum. The "training of trainer" approach has resulted in approximately 200 women being certified in Guatemala. Additionally, through coordination with the Central American Center for Natural Disaster Prevention, this model of certification has spread beyond national boundaries to Honduras and Nicaragua, and is now also being considered by the government of Panama, India and Nepal.

training sessions are still occurring. Part of this legacy can be attributed to the continuing role played by GROOTS members, and, in the case of India, to SSP. This highlights the value of conducting capacity building projects with existing community organizations and networks. The women were able to achieve more sustainable outcomes and project legacy due to their established community networks.

Furthermore, selected GWO leaders, whose participation was funded by GFRR, presented their work at Grassroots Academies at the Global Platform for Disaster Risk Reduction in 2011 and 2013. This was an opportunity to convene grassroots community experts to share practices and lessons learned. Local authorities and national government members also participated in these international knowledge exchanges.

Leveraging

This project support formalized sub-granting funds to create numerous Women's Federation Managed Community Resilience Funds in Guatemala, Honduras, and India. These community financial mechanisms have grown and continued to run successfully, entirely managed by Women's Federations, to support grassroots innovations for resilience practices. GROOTS International and the Huairou Commission have created operational guidelines globally for the CDRF and training programs for managers and monitoring systems. The CDRF is now working to build capacity in community resilience in 25 countries.

Peru Safer Schools—A Case Study of Learning from Other Projects

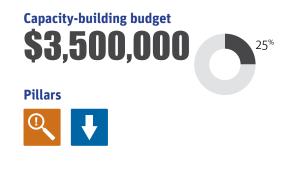


^{Budget} \$14,000,000

Duration
2 years
October 2014–December 2016

Capacity-building activity types

 Short-term learning, knowledge exchange/partnership building



Capacity-building beneficiaries

- Government/public officials
- Professionals/technicians

- Part of this project's success can be attributed to the learnings gleaned from other projects.
- Capacity building is effective when it is linked to an existing institutional process and integrated into existing networks.
- When creating new plans and tools, assess what knowledge is needed and how existing expertise can be strategically incorporated to support the process. Capacity building is improved when the process is based on quality, relevant information and technology.

As part of a long-standing collaboration, GFDRR and the World Bank have been working with the Government of Peru to strengthen the country's technical and institutional capacity for assessing and understanding disaster risk, and integrating risk-related data into decisionmaking processes. From 2010 to 2013, the Geophysical Institute of Peru, in partnership with the World Bank, developed new national-level seismic probabilistic hazard maps and models using the Probabilistic Risk Assessment Program (CAPRA), a free resource for risk analysis and decision-making. The results from the assessment demonstrated that only approximately 8 percent of school buildings in the cities of Lima and Callao complied with seismic-resistant design standards, and raised awareness regarding the risk of structural failure of school buildings in the event of an earthquake. In 2013 and 2014 the Ministry of Education (MINEDU) conducted the first nationwide School Infrastructure Census of an estimated 50,000 public school facilities to evaluate their current structural and functional condition. Nearly 65 percent of Peru's public schools are located in rural areas, where the large majority of schools are built with adobe or other artisanal materials and often do not meet structural standards or building regulations).

The results from the census highlighted the magnitude of existing school infrastructure challenges, which the government will need to address. MINEDU requested technical assistance from the World Bank to support them in the formulation of the first National Plan for School Infrastructure (NPSI). In addition, part of the technical assistance activities support the development of a Seismic Retrofitting Program (SRP) for school infrastructure. With financing from the GFDRR grant, the World Bank is able to provide support to MINEDU in mainstreaming DRM throughout the lifecycle of Peru's national school infrastructure.

Problem Addressed

MINEDU faces the challenge of defining an articulated intervention strategy that addresses both short-term infrastructure needs, as well as medium- and long-term measures for better planning, efficiency, and sustainability of school infrastructure.

Proposed Activities and Outputs

To address these challenges, National Plan for School Infrastructure was proposed to guide the construction, rehabilitation, replacement, improvement, and maintenance of school infrastructure nationwide, as well as help to prioritize the required public investments that will be needed to implement this plan. This plan includes a seismic risk assessment of public school infrastructure at the national level, which builds on the seismic risk assessment for the Lima Metropolitan area, completed in 2014, as part of another World Bank technical assistance activity.

In addition, the proposed SRP included the following components: (i) a proposal for the National Building Regulation to incorporate Incremental Retrofitting to school infrastructure; and (ii) A proposal for a Methodology of Structural and Functional Visual Inspection of public school infrastructure.

The project also aimed to build the capacity of MINEDU. The main capacity element of the project proposal included a series of workshops. These aimed to provide support to MINEDU

for developing an increased understanding of the sectors' infrastructure challenges and the methods that could be employed to integrate risk information into their decision processes.

Another aim of the project was fostering, maintaining, and building knowledge partnerships between MINEDU and seismic experts. This was to be operationalized through contracting a team of engineers from the Pontifical Catholic University of Peru (PUCP) and the Japan-Peru Center for Earthquake Engineering Research and Disaster Mitigation (CISMID) of the National University of Engineering of Peru to develop retrofitting solutions for the SRP and to promote knowledge exchange throughout the implementation of the project. In addition, the Japanese International Cooperation Agency was engaged to provide expertise in seismic retrofitting techniques.

In the medium and long term, the project is expected to contribute to the reduction of existing risks by informing and guiding the retrofitting and construction of over 30,000 Peruvian schools.

Capacity Building Shaping the Project

A team of World Bank consultants was hired to review the National School Infrastructure Census and support MINEDU in developing the NPSI. This was done in collaboration with General Directorate for School Infrastructure, National Program for School Infrastructure, and the Secretariat for Strategic Planning departments within MINEDU. The participation of key stakeholders and relevant agencies in the formulation of the NPSI was critical in order for the government to have ownership of the technical reports that helped inform the plan.

The following workshops have been conducted with MINEDU: (i) territorial planning of school infrastructure (Colombia experience), (ii) management of school infrastructure (Europe and Central Asia countries experience), (ii) design standards and norms for school infrastructure (Brazil experience). These have been based upon lessons learned from international experiences.

Experts from the PUCP and UNI, with support from Universidad de los Andes were contracted to design innovative retrofitting solutions for the SRP. They were given the task of identifying best practices and design solutions for retrofitting existing buildings. This was a strategic move by World Bank specialists to build on existing expertise and develop partnerships between MINEDU and the universities. The collaboration with the engineering community provided MINEDU with the support and complimentary expertise necessary to implement the program once it is ready. The participation of PUCP and UNI also gave them the opportunity to contribute to the safer schools' agenda to make school facilities and the communities they serve more resilient to natural hazards. A team of renowned engineering professors at both institutions have led the research for the SRP, and engineering students within the faculty also gained exposure to the project. It is expected that this will feed into student theses and future academic research. Such engagement with universities can be a way of building local DRM expertise. Meetings between MINEDU and the universities have fostered a working partnership and created a space for collaboration. The project manager is confident that this will lead to future collaborations.

The partnership between the World Bank and the Government of Japan has been timely and key to this project. The PUCP and UNI benefited from the provision of Japanese expertise

in retrofitting techniques. This knowledge exchange was coordinated through JICA. Documents such as 'Learning from Mega disasters' were provided and shared at committee meetings. The project manager noted that capacity building is contingent upon the quality of information available and the provision of expert knowledge by JICA was very useful in this project. However, it is important to note that when presented to the MINEDU engineers and architects, the information was too technical and beyond their capacity.

The project is ongoing and there are plans for a study tour to Japan for MINEDU officials to deepen their understanding of implementing a sound risk-informed sector strategy if additional funds are available.

The legacy of capacity building

Integrating capacity building into the process of developing the NPSI and SRP is having a tangible impact on fostering long-term DRM networks in Peru. Building on existing expertise through participatory engagement has consolidated the capacity and knowledge built through prior initiatives in Peru and should sustain future engagement by GFDRR.

Leveraging

The NPSI is in its final stages of development and the MoE is committed to supporting its implementation.

Haiti—A case of Facilitating Coordinated Policy Dialogue



^{Budget} \$450,000

Duration **3** years August 2012–June 2015

Capacity-building activity types

 Knowledge products, consultation with stakeholders



Capacity-building beneficiaries

- Government/public officials
- Professionals/technicians
- Civil society organizations

- DRM policy dialogues were enabled through the establishment of two forums, one technical and donor working group, and another multi-stakeholder group chaired by the Government of Haiti (co-chaired by Ministry of Planning and Ministry of Interior and Local Authorities).
- The DRM specialist funded by this grant was able to successfully leverage the World Bank's convening power to facilitate coordination between line ministries and international donors and partners.
- Raising awareness amongst other World Bank practices about the importance of integrating DRM into their projects has provided leverage to expand the World Bank's post-disaster portfolio.

According to the World Bank's Natural Disaster Hotspot study, Haiti has one of the highest exposures to multiple natural hazards. The physical vulnerability of the population is exacerbated by extreme poverty, urbanization, and an unregulated construction sector. Furthermore, political instability has weakened institutions and governance mechanisms including the National Disaster Risk Management System (SNGRD).

This GFDRR grant is framed within a wider International Development Association (IDA) funded Disaster Risk Management and Reconstruction project. The wider project aims to facilitate a coordinated response by providing strategic and institutional support to the Government of Haiti's (GoH) national DRM system, supporting disaster preparedness and community response and the rehabilitation of the critical transport infrastructure. This grant, alongside two other GFDRR grants, worked towards the first component, supporting Haiti's national DRM system.⁸

Problem Addressed

Haiti faces institutional and governance challenges in preventing and responding to natural disasters. The SNGRD has no legislative authority or assigned budget to support its activities, and most line ministries do not have the legal mandate, strategic framework, or technical capacity to effectively fulfil their DRM roles and responsibilities. Furthermore, a lack of inter-ministerial cooperation is a significant challenge. National and sub-national risk reduction activities rely heavily on human and international financial resources from various donors and are often implemented by the United Nations (UN) and international non-governmental organizations (INGOs). The country is in great need of assistance for developing its DRM system and legislative framework.

Proposed Activities and Outcomes

The main objective of this grant was to strengthen the GoH's institutional capacity to mainstream DRM through improved in-country dialogue and strengthened donor cooperation. The grant co-funded a World Bank DRM specialist to be based in Port-au-Prince for three years. The specialist was tasked with supporting inter-ministerial dialogue and external donor coordination. The first activity proposed under this grant was the establishment of two working groups—one donor working group and another multi-stakeholder working group chaired by GoH.

These activities were proposed in order to support two other interconnected GFDRR grants. The first of these grants was created to provide technical assistance to GoH on a DRM legal framework, revising the national DRM plan, and creating a monitoring and evaluation (M&E) system to track progress. The grant in this case study aimed to support these activities by coordinating multi-stakeholder dialogue and building a consensus for action through the two working groups. The second of these grants aimed to provide country-based technical assistance to introduce a DRM approach in select line ministries and government agencies. The grant in this case study aimed to support these activities by facilitating inter-

⁸ This grant has closed, yet the two other GFDRR supported grants are still active. The amounts stated in the project grant and text in this section refer only to this grant that has now closed.

ministerial dialogue. The project proposal included developing knowledge notes to capture the experience of mainstreaming DRM into sector policies and investments.

Capacity Building Shaping the Project

All of the components of this project were capacity-building activities, contributing to fostering partnerships, improving consensus, and facilitating a coordinated response.

First, two working groups were launched and subsequently supported for the three-year project duration. The first working group established was a DRM technical and donor working group. This platform was a space where external funding outside of the government budget was discussed. In order to ensure participation and encourage sustainability a rotating chair model was formed, starting with the World Bank, followed by the European Union (EU), United States Agency for International Development (USAID) and so on. The second working group created was the multi-stakeholder GoH chaired working group. This group included the general directors of line ministries, international partners, donors, private sector representatives and academics. These working groups were critical for facilitating the coordinated response necessary to support the GFDRR grants, a number of activities under the wider IDA grant as well as other donor initiatives. Furthermore, the donor and technical working group also strengthened World Bank relationships with other donors in Haiti.

With regards to the GFDRR grants, under the first one, UNDP was responsible for providing support to SNGRD in creating a legal framework, revising the DRM plan, and developing an M&E system. To begin the process of building multi-stakeholder consensus around these deliverables, the World Bank DRM specialist facilitated discussion around developing a coordinated DRM strategy, as a result a common advocacy note was created outlining the DRM challenges and opportunities. Following this setting of a joint agenda, the working groups discussed how to revise the National Plan and create a legal framework. As a result of these discussions an agreement was effectively reached on the changes to be made; however, implementing these actions has not yet been possible due to postponed elections.

The second GFDRR grant provided technical assistance in order to introduce DRM approaches into the housing and urban development, education, and health sectors. Many of the proposed activities required inter-ministerial cooperation. For example, in order for the Ministry of Health to validate and disseminate guidelines for disaster resilient health infrastructure, the guidelines needed to be officially approved by the Ministry of Public Works as an annex to the Haitian Building Code. The TTL noted the challenge of working in a context of low institutional capacity with little inter-ministerial cooperation. The DRM specialist funded by this grant played an instrumental role in supporting coordination across line ministries. This included organizing and coordinating daily inter-ministerial meetings. As a result of previous projects, the World Bank has good relationships with many ministries, including the Public Works and the Health Sector involved in this project. The DRM specialist was able to successfully leverage the World Bank's convening power to facilitate coordination between these ministries, bringing them together to work on building codes and standards.

In order to capture the knowledge learned in mainstreaming DRM into different line ministries, knowledge notes were created. These have recently been peer reviewed at the

"This grant enabled the delivery of better results in World Bank operations as it helped to build institutional capacity and cooperation."

Task Team Leader (TTL)

World Bank and are soon to be presented at the GoH chaired working group. The TTL noted that this working group is an effective platform to discuss DRM with different line ministries.

The Legacy of Capacity Building

This project created two platforms which facilitated the multi-stakeholder dialogue and coordination necessary for creating a stronger system for DRM in Haiti. Although meeting less frequently, both working groups are still functioning and supporting DRM initiatives - those supported by GFDRR and beyond. The working groups can run at a low cost and are proving to be self-sustainable. One of the reasons for the reduced frequency of the GoH chaired working group meetings is a result of political fragility rather than the organizational design.

With regards to the inter-ministerial dialogues facilitated, since the DRM specialist has left Porte-au-Prince the amount of dialogue has scaled down. The TTL noted the challenge of building inter-ministerial relationships. The knowledge notes are a means of capturing and re-applying the knowledge learned through this process.

Another forthcoming component of the IDA grant includes the provision of technical assistance to strengthen national capacity to conduct risk assessments and collect risk data. The GoH chaired working group helped to initiate interest amongst ministry general directors for these next steps.

Leveraging

The TTL noted that having a DRM specialist on the ground was critical to raising awareness amongst other World Bank practices about the importance of integrating DRM into their projects. Subsequent IDA funded projects have integrated resilience considerations in project implementation.

Malawi Post-disaster Needs Assessment and Recovery Framework—A Case Study of A Sustained Capacity Building Engagement



- This case study highlights the effectiveness of sustained interventions, which progressively build capacity.
- The development of a multi-stakeholder network, including non-governmental organizations (NGOs) and international institutions was crucial to the sustainability of capacity building.
- DRM champions were identified and proved to be key actors in carrying forward skills and knowledge for future interventions, including dissemination to a wider audience.

GFDRR has supported the Government of Malawi (GoM) in identifying and mitigating disaster risk. In January 2015, devastating flooding resulted in 170 deaths and over 230,000 displaced people in 15 districts across the country. The Government of Malawi, through the Department of Disaster Management Affairs (DoDMA), requested international assistance to conduct a post-disaster needs assessment (PDNA) and develop a Recovery Framework for prioritizing and implementing recovery and reconstruction investments. This initiative aimed to build on previous capacity building and was supported by GFDRR, the EU, the UN), and the World Bank. The response effort was led by the Office of the Vice President and coordinated through the National Disaster and Preparedness and Relief Committee (NDPRC), which included focal points from various line ministries, NGOs and international institutions.

Problem Addressed

The GoM did not have sufficient capacity to assess and respond to one of the worst flood events in decades in Malawi. Expertise was required in conducting a PDNA exercise and in formulating a comprehensive response and recovery strategy.

At the time of the 2012 PDNA training, DRM specialists from the World Bank noted the ad hoc nature of impact assessment activities in the GoM, despite an institutional DRM framework for disaster response being established by Malawi's Disaster Preparedness and Relief Act (1991). The Act sets out clear lines of responsibility between relevant ministries, government departments, and a small number of NGOs; however, these protocols were not followed during emergency situations and during a disaster, DoDMA was largely dependent on the ad hoc availability of individual personnel.

Proposed Activities and Outcomes

The aim of the project was to undertake a PDNA exercise in order to provide a multi-sector assessment of the socio-economic impact of flooding in Malawi. This assessment would later be used to develop a Recovery Framework. The combined activities proposed to identify immediate response needs after the flood emergency and facilitate future risk reduction through mainstreaming DRM into national policies.

Two capacity-building activities were conducted to equip and train government staff and other stakeholders with the necessary skills to undertake the proposed activities. These included PDNA training and support for the multi-stakeholder NDPRC, and hosting multi-stakeholder workshops at the national and district levels in order to develop the Recovery Framework.

Capacity Building Shaping the Project

The PDNA training conducted for the 2015 flooding followed and built upon a previous GFDRRfunded PDNA training in 2012. The foundation laid by the 2012 training was vital in shaping the outcome of the 2015 intervention, demonstrating the importance of building on previous capacity building.

An important component of the 2012 capacity building exercise was the development of relevant partnerships for a multi-stakeholder post-disaster impact assessment response.

This included conducting training that brought together 33 technical participants from 18 line ministries and departments, and organizations such as UNDP, Malawi Red Cross Society and the Malawi Institute of Engineers. As noted by the technical consultant on the project, the convening power of GFDRR was crucial in bringing stakeholders together and building consensus on a unified approach. Each line ministry, department and NGO assigned a focal point as an organizational lead for future impact assessments. Furthermore, specific institutional mechanisms were developed. For example, the DRM specialist found that data availability varied greatly across sectors so data collection guides were created for different ministries. These actions contributed towards the creation of a foundation of institutional capacity.

An advantage of conducting training in the absence of a real-time disaster event (as was done in the 2012 training) is that the World Bank DRM specialists could build capacity without immediate time pressure. During high-impact disaster events such as the 2015 floods, PDNA training is, by necessity, an exercise of speed. The timeframe for the 2012 activities allowed for a more iterative process whereby the training program could be adapted to incorporate participants' needs. For example, based on feedback collected through training evaluation forms and observations, a deficit in fieldwork skills and data analysis was noted. World Bank DRM specialists then organized a disaster simulation exercise based on fieldwork and provided extra training on data analysis.

Although the foundation laid down by the 2012 capacity-building exercise was extremely useful for the PDNA training in 2015, the scale of the 2015 event combined with the loss of institutional capacity due to staff turnover in government departments resulted in the need for further capacity building in 2015. As part of the activities of the 2015 project, the World Bank sent DRM specialists to train over 75 individuals to conduct the PDNA exercise. This included 20 members, mostly from government departments, who had previously been involved in the 2012 training and were now assigned the role of team leaders for the PDNA exercise. The sector-specific guides for data collection, created in 2012, were operationalized to facilitate the assessment.

The varied capacity of different line ministries to absorb the methodology was noted as a potential risk in the project proposal. Individuals who had already taken part in the 2012 exercises were significantly more experienced and required considerably less supervision in developing the PDNA. NGOs generally have a lower rate of staff turnover. So, to some degree, the loss of institutional capacity in government departments was offset by the involvement of NGOs and international institutions in the 2012 training. In this project, the same NGO participants were involved in both rounds of training and were, therefore, able to carry forward skills acquired during the 2012 capacity-building exercises. Institutional staff turnover is a common challenge for capacity-building projects, and the engagement of capacity-building activities.

The policy of the World Bank to train local stakeholders as PDNA specialists, rather than conduct the exercise and deliver the results to the GoM, was also an effective capacity-building strategy for adding long-term value and capacity to local systems for resilient recovery.

The individuals involved in the PDNA training exercises were also part of the team responsible for the development of the Recovery Framework workshops. This was crucial to the

The Training of the Trainers: Internal PDNA Training

he World Bank Disaster Risk Management specialists providing training and support for the GoM had themselves received internal PDNA training. The bank specialists noted that these trainings were effective in providing necessary skills and tools for leading PDNA trainings. However, drawing from his experience in Malawi, a World Bank DRM specialist noted that there was limited capacity to practice effectively what had been learned in a fieldwork scenario before the 2015 Malawi PDNA. A key recommendation from this case was to enhance the process of staff capacity building, potentially by coupling recently trained World Bank staff, with more experienced colleagues on fieldwork missions.

effectiveness of the workshops and development of the framework as the PDNA information provided the foundations of the framework. In this way, the teams were already familiar with the content.

However, significant capacity still had to be built in the new skills of generating a strategy for action and investment from this data. In order to address this deficit in capacity, two strategies were adopted by the TTL in order to make sure that the engagement was effective. There was consistent and iterative engagement surrounding the workshops, as well as the provision of templates for different sections of the Recovery Framework.

The Legacy of Capacity Building

The legacy of the 2012 and 2015 trainings is evident. The development of the institutional structure and the PDNA methodology taught in 2012 and operationalized in 2015 has been taken up at the national level. Furthermore, there is a clear link between the development of the Recovery Framework and DoDMA's subsequent operations and investments. This project has further contributed to capacity building on a wider scale through knowledge sharing. Some of the participants of the 2012 and 2015 trainings have presented the Recovery Framework as an example of best practice at the International Recovery Forum in Japan. Furthermore, the World Bank consultant who supported the Malawi Recovery Framework applied the lessons learned in Malawi to other projects, such as the recovery process in Nepal, following the 2015 earthquake.

Leveraging

As noted above, there was a link between the Recovery Framework and DoDMA's actions and investments. This was the basis for additional funding from GFDRR to institutionalize some of the policies and next steps recommended in the Recovery Framework.

"The team dynamic continued building upon existing networks as a continuum."

Task Team Leader (TTL)

Resilient Cities and Women in Middle East and North Africa—Brokering Innovation





Duration year

March 2014–June 2015

Capacity-building activity types

 Knowledge exchange/ partnership development, short-term learning, long-term learning



Capacity-building beneficiaries

- **Citizens/communities**
- Government/public officials
- Private sector
- Civil society organizations

- The project demonstrated the importance of "legacy thinking;" the project design considering sustainability from the beginning, while being flexible to participants' needs.
- To deliver long-term results for DRM, repeat interaction involving the same participants and continuous and sustained capacity building efforts are effective.
- DRM capacity building can occur through supporting small-scale private enterprise.

The Middle East and North Africa (MENA) region has been affected by 388 disasters in the past 35 years. Rapid urbanization has led to 62 percent of the population living in cities, and increased vulnerability of people and economic assets to disaster events. In addition, the region has the highest gender inequalities in the world. Despite progress towards gender parity in education and health, only 21 percent of women participate in the labor market. Socially constructed gender roles contribute to differences in the vulnerability of women and men to disaster risks.

GFDRR and the World Bank are working together to build resilience in the MENA region. As part of these efforts, two activities were organized. Both were designed to facilitate innovation. First, a multi-stakeholder Resilient Cities Forum was organized, with participation from mayors and deputy mayors from 15 cities in MENA, city representatives from Latin America, the Caribbean, Europe and Central Asia, the East Asia Pacific regions, local and international NGOs, and the private sector (specifically big data, technology, and risk financing companies). Second, a Women Entrepreneurship Resilient Cities (WE'Resilient Cities) competition was organized, based in Beirut, Cairo, and Djibouti. This innovative event was the result of a strong public-private partnership between the World Bank, the International Finance Corporation, Johnson & Johnson, Instituto Empresa Business School, the Center for Mediterranean Integration, the MENA Early Stage Investment Facility, and Smart Data Science.

Problem Addressed

Given the ongoing political turmoil in the region, responding to natural disasters is often a low priority for governments, the private sector, and individuals alike. Although several MENA countries have engaged in DRM efforts, none have established a comprehensive national DRM framework, or integrated DRM into development plans. However, a number of regional DRM initiatives have emerged over the last few years, mainly facilitated by intergovernmental organizations.

Proposed Activities and Outcomes

In order to help cities in MENA increase resilience to shocks, a Resilient Cities Forum was proposed with a goal of raising awareness and fostering regional multi-stakeholder partnerships. This interregional and cross-regional knowledge exchange aimed to provide an opportunity for sharing urban resilience practices from major cities around the world. The forum was designed to bring together disparate stakeholders from government, the private sector, civil society, and women's groups. For example, MENA city mayors would have the chance to share the opportunities and challenges they face in enhancing their cities' resilience.

In addition, a pilot capacity-building initiative was proposed to encourage innovative business solutions to urban risk, led by female-owned or run enterprises. Business support packages to turn urban resilience efforts into scalable businesses were to be offered to three teams chosen by the selection committee for having the best business ideas. These packages included a financial reward of \$100,000, funded by private sector partners, and one year of mentoring after the competition. A crash course in marketing and business, run by the world-leading Instituto Empresa Business School was planned for the twelve semi-finalists. This was in addition to orientation workshops for discussing urban resilience and building skills, such

"We are building the knowledge capital to be able to convert risk in cities into job creation"

Task Team Leader (TTL)

as writing business proposals, for all competition entrants. To attract participants and raise awareness of urban resilience to a wider audience, a digital campaign was planned.

Capacity Building Shaping the Project

The Resilient Cities Forum took place in Marseille in June 2014. The forum was effective in enabling knowledge exchange and raising awareness of the importance of building urban resilience. For example, city representatives from Dhaka, and the partnering consultant EMI, presented the Resilient City Master Plan that is currently being implemented (see *Urban Resilience Bangladesh - A Case of Capacity Building Through Structured Delivery* in this annex). Although EMI had proposed this strategy to the mayor of Beirut in the past, the presentation by Dhaka city officials, and the surrounding discussions at the forum, were critical in securing Beirut's decision to develop a Resilient City Master Plan.⁹ The involvement of NGOs in these discussions was crucial for the integration of local knowledge and citizen needs to be included in city level planning.

The forum had a format that encouraged networking; there was discussion for approximately six hours per day with remaining time being flexible for social interaction, which helped foster the development of new connections and partnerships. For example, discussions occurred between the Mayor of Djibouti and a big data company, and between the Mayor of Beirut and a risk finance company. In order to capture the information shared and lessons learned for future use, knowledge notes were created after the event and disseminated to event participants digitally.

The WE'Resilient Cities competition had more than 150 teams enter from Beirut, Cairo, and Djibouti, with over 200 women attending the orientation workshops. Given the political context in these cities, the word "risk" was rarely associated with natural hazards, thus presenting a communication challenge. Therefore, the project team used the language of "resilient" and "safe" cities rather than "disaster risk management." The team started a digital #sheisresilient campaign to encourage the public to engage in urban resilience conversations online. Although effective in reaching a large number of entrepreneurs, the TTLs thought that including experts who had more experience in social media, as well as NGOs with greater community links, could have helped achieve a greater impact.

The orientation workshop introduced participants to the concept of resilience, outlining key regional resilience challenges and opportunities that can be tackled through business solutions. The following crash course in marketing and business equipped the semi-finalists with important skills and resources. A flexible approach in project implementation allowed for greater effectiveness. For example, the project team provided resources and training to facilitate video submissions, as preferred by some entrepreneurs, in addition to traditional written proposals. As well as skill development, the involvement of private sector partners and industry leaders in risk management was an invaluable networking opportunity for the entrepreneurs to gain advice and build future connections.

The Legacy of Capacity Building

"It is important to integrate a broad range of actors into risk management at city level, including decision makers, the private sector, civil society and citizens"

Task Team Leader (TTL)

⁹ This Resilient City Master Plan was supported by GFDRR.

The development of sustained partnerships and networks was also one of the proposed outcomes of the Resilient Cities Forum. Although there was initial interest and individual connections, the forum did not result in sustained partnerships on a large scale. To deliver long-term results, repeat interaction involving the same participants and continuous and sustained capacity building efforts are needed.

The We'Resillient Cities competition, on the other hand, is an example of "legacy thinking" integrated throughout a project. In order to ensure sustainability, workshops included sessions on how to retain momentum beyond the competition. For the three winning enterprises, the business packages of funding and mentorship ensured that appropriate support was given during and after the event. In order to improve their scalability and access to capital, these enterprises were connected to local, regional, and international financial institutions, such as Lebanon BLC Bank and the Goldman Sachs Foundation, that focus on promoting women's entrepreneurship. A year after the project end date, these social enterprises are thriving. Its success highlights the importance of including long-term capacity building in the design and implementation stage of a project cycle.

Leveraging

Based on the success of the We'Resillient Cities competition, GFDRR plans to expand the program to 30 other MENA cities to promote the creation of resilient start-ups. The winners of the last competition will act as mentors and participate in training the new participants.

Urban Resilience Bangladesh—A Case of Capacity Building Through Structured Delivery





Duration A years

February 2012–December 2016

Capacity-building activity types

 Knowledge products, learning short-term, learning long-term, consultation with stakeholders, knowledge exchange and fostering partnerships.



Capacity-building beneficiaries

- Government/public officials
- Professionals/technicians
- Civil society organizations

- The integration of capacity-building activities in every component of this project enhanced the relevance and sustainability of its outcomes.
- The institutional foundation established to deliver project outputs, including an advisory committee, scientific consortium, and focus groups effectively built relationships across government silos.
- The use of e-learning tools gave participants with full-time jobs flexibility. However, there were no metrics or indicators developed alongside this shortterm capacity-building activity, therefore, the effectiveness and impact on government staff learning cannot be easily measured.

Bangladesh is one of the most disaster-prone countries in the world; over the years, the government of Bangladesh, alongside international development institutions and civil society, has invested heavily in protecting coastal areas from floods and cyclones. In addition to these hydro-meteorological hazards, there is a medium to high level of seismic risk across the country. Yet, despite this seismic risk, the National Plan on Disaster Management (2010-2015) lacks a comprehensive vision for a national earthquake strategy. This could be, in part, because the threat of earthquakes is less visible and not present in the living memory of the country's inhabitants, and is harder to predict. Adding to matters, the concentration of people and assets in urban areas makes cities particularly vulnerable to seismic risk. Dhaka, for example, has 15 million people living in the metropolitan area, 28 percent of which are classified as poor. Nearly 300,000 new migrants move to the city each year, and land use planning has failed to keep up with the pace of urban growth.

GFDRR and the World Bank are in the last year of a multi-phase project to build institutional capacity to mitigate the impact of earthquakes in Bangladesh, with a specific focus on the city of Dhaka. The project outputs were organized through structured delivery: defined as the creation of temporary organizational structures such as focus groups; these were composed of multiple stakeholders. This case study will focus on the first phase of this project, which sought to create the knowledge base and build the institutional environment required for developing a comprehensive approach to earthquake risk management.

Problem Addressed

The institutional structure of city-level governance is highly complex in Bangladesh. In Dhaka, up to 50 different agencies have jurisdiction over the functions of urban planning, governance, and public service provision. Roles and responsibilities are not clear, and the complex institutional environment is a barrier to the effective inclusion of DRM in policy and planning. The government requires substantial assistance in improving knowledge and awareness of seismic risk in urban centers, and the development of clear and collaborative institutional structures for managing earthquake vulnerability.

Proposed Activities and Outcomes

The objective of the first phase of this multi-phase project is to establish the enabling environment required to develop a comprehensive approach to managing earthquake risk. The final outputs of the wider project will be a Risk Management Master Plan for Dhaka and a National Earthquake Risk Management Strategy for Bangladesh. This enabling environment includes building an institutional foundation for the deliverables of this and subsequent project phases. The proposed structure includes an advisory committee, a scientific consortium, and focus groups.

In order to build a knowledge foundation, a training program was proposed with an emphasis on earthquake risk, limiting the physical and social vulnerability of high-density settlements, and risk-sensitive land use planning.

To further engage stakeholders and build on existing knowledge, a participatory process between the consultant, the Earthquakes and Megacities Initiative (EMI), and three

designated focus groups was proposed to create (i) a Hazards Vulnerability and Risk Assessment (ii) a Land Use Planning Guide, and (iii) a Legal and Institutional Framework Guidebook. These outputs constitute the preliminary elements for a Dhaka City Earthquake Risk Management Plan and build the foundations for the National Earthquake Strategy. In addition, the project planned for a fourth focus group to work with EMI to develop an information, education and communication campaign, as well as a software platform for existing earthquake vulnerability data.

Capacity Building Shaping the Project

Developing a rigorous organizational structure was crucial to engage and coordinate a multitude of stakeholders. This was needed as previous projects demonstrated that only limited success could be achieved if the activities focused only on individual ministries or technical experts, and failed to consider the larger governance system. In addition, working with a large number of stakeholders was critical in raising awareness of seismic risk and urban development.

Stakeholder consultations were organized with approximately 40 different government ministries and organizations, academic institutions, and civil society members in order to decide on the composition and coordination of the focus groups. This approach gave participating organizations greater ownership of the process. Four multi-stakeholder focus groups were formed around the thematic project outputs. Over the course of the project, 60 focus group meetings were organized. These focus groups helped to build working relationships across ministries, thus breaking down previously engrained silos.

Building a knowledge foundation included the delivery of a training course for the Land Use Planning focus group; over 30 technical specialists from various government ministries and departments; and some representation from the private sector, academia and civil society. The training materials were designed to promote land use planning, disaster risk assessment, and mainstreaming of risk reduction into detailed area plans for Dhaka. This training course was delivered through a combination of face-to-face learning and e-learning. The use of e-learning tools gave participants with full-time jobs needed flexibility. As there were no metrics or indicators developed alongside this short-term capacity-building activity, the effectiveness and impact on government staff learning cannot be easily determined. However, the TTL and EMI noted that the project was effective in building basic skill sets through the training program. As a result of increased exposure to DRM concepts, the participants expressed an interest in taking other DRM e-learning courses. However, the low starting capacity of some of the participants meant that the training did not necessarily result in advanced technical learning.

In addition to more targeted training and learning activities, capacity building was integrated across all elements of the project. Focus group participants were able to share knowledge, participate in discussions, and contribute their own experiences towards defining and developing project outputs. Not only did the integration of capacity building and focus group input into the reports add significant value to the project outcomes, it also created an increased sense of ownership among stakeholders. Rather than solely delivering a report, the focus group participants had the opportunity to learn the methodology and tools from the EMI practice leaders.

The lack of a data platform to store and manage hazard and vulnerability data previously limited the integration of earthquake risk into development planning. The organizational structure established was crucial to the effective delivery of the data platform. First, meetings were organized with the advisory committee, composed of key decision makers, in order to explain the significance of data sharing. This ultimately led the creation of a memorandum of understanding to authorize data centralization. Then, the scientific consortium, in participation with the focus group, supported the data collection and validation. In the process, the focus group learned how to use the platform, resulting in knowledge being spread across different ministerial technical experts, which was crucial to the sustainability of the platform.

The Legacy of Capacity Building

The reports produced in this phase, alongside additional outputs developed by a recovery response focus group in the second phase, have contributed to the Dhaka City Earthquake Risk Management Plan and have built the foundations for the National Earthquake Strategy.

Although the focus groups created by this project are no longer meeting after project completion, their legacy continues. The time frame of this project did not allow for the development of institutionalized partnerships, but the multi-stakeholder participants built working relationships and continue to communicate and discuss challenges and opportunities they face in integrating urban resilience into urban planning and development practices. Furthermore, the land use planning focus group, the main recipient of the blended training course, has formed an Urban Resilience Unit. This institutional change signals government investment and ownership of the initiative. Additionally, the data platform is still being populated with a certain degree of supervision. While it is still a work in progress, the platform is one of the greatest achievements of the project.

Leveraging

This project laid the foundation for the design of the \$173 million Urban Resilience Project (URP). The URP will provide government agencies with facilities and equipment to significantly improve emergency response capacity, as well as institutional resources to incorporate disaster risk into development planning. By providing access to improved emergency preparedness and response services, the URP will benefit the approximately 17 million people living in the cities of Dhaka and Sylhet. This project is in its first phase and laying the foundation for investments to be made in the coming years.

Resilient Recovery and Financial Protection in the Philippines—A Case of Legacy Building





Duration **2.5** years September 2011–March 2014

Capacity-building activity types

 Short-term learning, knowledge exchange



Capacity-building beneficiaries

- Government/public officials
- Professionals/technicians

- The training of trainers strategy can increase the project's impact and legacy.
- Developing institutional ownership by engaging government ministries and agencies from the beginning assists in project sustainability.
- Clear resource assessment is necessary for capacity-building activities to be effective.

The Philippines is ranked fourth in terms of exposure to at least three hazards, fourth in mortality risk, and ninth in impact to GDP, with an estimated 79% of GDP tied to areas of risk. This grant was part of a wider World Bank engagement that aims to enhance the capacity of the Philippines to manage the impacts of natural disasters through: (i) strengthening institutional capacity; (ii) mainstreaming DRM into development planning; and (iii) managing the government's fiscal exposure to natural hazard impacts. The activities supported by this GFDRR grant contributed to all three of these objectives. The grant included training on PDNAs, the development of a transparent monitoring and evaluation system for ex-ante and post-ante disaster expenditure (PMESD), and support to develop a national Disaster Risk Financing and Insurance Strategy (DRFI). This case study focuses on the PDNA training, PMESD and DRFI and whether these activities effectively established a legacy post projection completion.

Problem addressed

Disaster risk management is integrated into the general policy of the state. However, analytical studies point to weak institutional capacities and a limited budget as major gaps in implementing existing laws. These weaknesses were highlighted when Tropical Storm Ondoy and Typhoon Pepeng consecutively hit the country in 2009. Upon the request of the Philippine Government, the World Bank supported the mobilization of local and international experts, private sector and civil society representatives and development partners in undertaking a PDNA. The PDNA emphasized the necessity for ex-ante measures to prevent and/or mitigate the impact of disasters. In response, the 2010 Disaster Risk Reduction and Management (DRRM) Act was passed. The act promotes a proactive approach to DRM emphasizing preparedness and mitigation. The new law established a National DRRM Council, an interagency council responsible for disaster preparedness, prevention and mitigation, response and rehabilitation, and recovery. Institutional capacity must be built in the National DRRM Council in order to support this new more proactive approach to DRM.¹⁰ In addition, the Philippines employs a policy of staff rotation which means that personnel are moved often with little notice, meaning that DRM positions are led frequently by inexperienced staff.

In terms of budget, funding for DRM in the country has been inadequate, making the government reliant on donor support to promote DRM policies and programs.

Proposed Activities and Outcomes

The proposed activities responded to the problems outlined above. Their overlying objective was to enhance the capacity of the Philippines to manage the impacts of natural disasters.

As noted above, the 2009 tropical storms highlighted the weak institutional DRM capacity. In the wake of the storms, a PDNA was conducted with the World Bank and partners. In order to support DRM capacity, the use of a common methodology for future assessments is needed as well as training for government staff. Therefore, under this grant, PDNA training

¹⁰ The National DRRM Council does not implement activities; daily operations are carried out by the Office of Civil Defence

of officers and staff of the Office of Civil Defense (OCD) and members of the NDRRMC was proposed. The objective was to build the capacity of national and regional entities to undertake post-disaster assessments to inform recovery and reconstruction

The development of a PMESD was also proposed, in order to enable the government to better manage resources for DRM through a system that allows the monitoring of funding, expenditure, and progress of DRM and/or response programs and projects. Part of this project component included training on the use of the PMESD.

The grant also supported the development of a national DRFI strategy. The ultimate objective was to reduce the fiscal burden of natural disasters on the public and private sectors through catastrophic risk financing measures.

Capacity Building Shaping the Project

The aim of the PDNA training was to build government capacity in resilient recovery. Over a three-day period, 62 OCD staff and NDRRM members were trained in the use of PDNA sector-specific guidance notes.

In order to effectively build the necessary capacity, a training and needs assessment review was conducted by the implementing consultancy, Deltares. However, despite time dedicated to this activity, it was difficult for the Deltares' team to identify the correct people within the OCD with whom to consult. The difficulty in coordinating with the OCD for this process was a result of institutional restructuring in the wake of Typhoon Pablo (Bopha) two months prior. As a result of this lack of information, when the training began, the Deltares consultants had overestimated the amount of experience participants had in fieldwork. When this capacity gap was identified, Deltares adapted the training accordingly to include a day of fieldwork.

Given the high rate of staff rotation, one important element of the PDNA training was the development of sector-specific guidance notes. These tools captured much of the knowledge shared in the training and could be learned and used by different generations of OCD and NDRRM staff.

Another critical element of the training that increased the project's impact and legacy was the training of trainers. From the pool of 62 participants, 16 "training leaders" were identified. After the training, these individuals were responsible for rolling out the PDNA training across government authorities as well as to Local Government Units (LGUs). Specific modules were integrated into the three-day program which helped provide the trainers with the necessary resources and skill set to achieve this. Furthermore, these 16 participants also played an important role in the three-day training. The "training leaders" were responsible for "continuously evaluating how applicable and useful what was being taught, presented, and learned was to the participants" (Deltares training leader). With this information, an iterative process of feedback integration took place across the delivery of the training.

The PMESD training was interlinked with the PDNA training. The PMESD software tracks the movements of funds against actual identified needs on the ground. Given that the PDNA participants are responsible for assessing post-disaster needs on the ground, it is crucial that they are familiar with this system. However, despite the completion of the PMESD training, there was not sufficient Information and Communications Technology (ICT)

"Conducting a capacity review enables training to be focused upon the participant's needs"

Deltares training leader

capacity or budget to host the software. A departmental capacity review was conducted before the training, including an analysis of human resources. However, capacity-building activities should also be cognizant of available financial, technical, and policy resources. The World Bank team worked on the PMESD beyond the project end date in order to ensure the software was installed and operationalized.

An international expert and local consultant were hired to facilitate the development of the national DRFI strategy. As this was the first step in building finance resilience to natural disasters, it was necessary to raise government awareness of the importance of risk financing tools and their effective use. Therefore, this process began with a forum where international experts were invited to demonstrate different strategies to the Department of Finance. After the forum, the Ministry of Finance became very engaged in the development of the action plan, working with the consultant to decide which strategies would work best for them. This demonstrates the institutional ownership of this agenda. As will be discussed below, the Ministry of Finance requested technical assistance for implementation of the strategy.

The Legacy of Capacity Building

The PDNA training program was followed by the training rollout and application of the methods by staff of NDRMC member's agencies during PDNAs conducted after Typhoons Pablo and Yolanda. The PDNAs constituted the real-life application of the training. Guidelines and materials developed under this grant have been continually used in the PDNAs led by OCD, including in response to Typhoon Yolanda in 2013. Furthermore, drawing on the sector guidelines, multi-sectoral disaster preparedness drills and training are conducted periodically by the member agencies of the NDRRMC as part of the National DRRM Plan's long-term goal on disaster preparedness.

Leveraging

Based on the DRFI strategy and supporting capacity building activities, the Ministry of Finance requested technical assistance in implementing the strategy. A GFDRR supported project providing this technical assistance began in 2014 and will end in 2017. The DRFI strategy was key to leveraging the second Disaster Risk Management Development Policy Loan with a Catastrophe-Deferred Drawdown Option (CAT DDO2), approved in 2015, which provides \$500 million to strengthen investment planning and regulations to reduce disaster risks and help manage the financial impacts when disasters strike.

Indonesia—A Case of Building Local Ownership of Processes and Outputs





Duration 5 years October 2010-December 2015

Capacity building activity types

 Short-term learning, knowledge exchange/partnership development, knowledge products



Capacity building beneficiaries

- Citizens/communities
- Government/public officials

Summary

- Local ownership of technical assistance outputs, such as the Disaster Risk Financing strategy, was encouraged by engaging a number of stakeholders throughout the life cycle of the project.
- In order for initiatives to be locally owned, local stakeholders must have the capacity (human, technical, financial) to sustain and/or scale processes and outputs.

Description

According to the Indonesian National Disaster Management agency (BNPB), over the last 30 years, there have been on average 289 significant natural disasters per year in the country, with an average annual death toll of approximately 8,000. Since the 2004 Tsunami, the Government of Indonesia has taken a proactive approach in addressing disaster risks, including the creation of the BNPB in 2008. The GFDRR grant focused upon in this case study (2010-2015) supported the second phase of a project established in 2008 to assist Indonesia mainstream DRM.

Partners in this project included, the Japan International Cooperation Agency (JICA), the Australian Agency for International Aid (AUSAID), the Department for International Development (DFID), the United States Agency for International Aid (USAID), European Commission (EC), United Nations Development Program (UNDP), Forum Komunikasi Winongo Asri (FKWA), the National Agency for Disaster Authority (BNPB), selected Provincial Disaster Management Agencies (BPBDs), and the Ministry for National Development Planning (BAPENAS).

The first phase of the project focused upon analytical and policy work, for example, supporting the formulation of the Indonesian National Action Plan for Disaster Risk Reduction (NAP-DRR 2010-2012). Activities in the second phase supported the movement of plans and policies into implementation. The activities in the second phase have focused upon the national, provincial, and local scale, as well as on four out of five GFDRR pillars of action. This case study will focus upon a number of the activities conducted, and whether local ownership of the processes and outputs has been achieved.

Problems Addressed

GFDRR's engagement in Indonesia began in 2008, the same year that the BNPB was established, in order to support the agency fulfill their mandate. While annual DRM allocation increased significantly in 2010, signalling a national realignment of priorities, post-disaster reconstruction was largely funded through the reserve of the state's general treasury, which requires parliamentary approval. At the time of project implementation, the budget available through this mechanism was insufficient to deal with a major catastrophe or a series of moderate to severe disasters in a given fiscal year.

Proposed Activities and Outcomes

The proposed activities are summarized in figure B1. The primary objective of the proposed activities was to build Indonesia's resilience to disaster and climate change impacts through multi-level development investments. The project aimed to build national government, regional government, local government and community capacity to carry out risk identification, reduction, and response. The strategy leveraged existing priority government programs and projects — starting with those financed by the World Bank and other donor agencies — especially those in areas identified as high priority in the NAP-DRR 2010-2012.

This case study will focus upon the policy dialogue occurring in conjunction with the development of the disaster risk finance strategy and the development of the Indonesia Scenario Assessment for Emergencies (InaSAFE).

Figure B1. Proposed Multi-Scalar Activities to Build Indonesia's Resilience to Disaster and Climate Change Impacts

Risk Identification	 Continue the development of a national level risk assessment Support a risk review of 6 Indonesian mid-sized cities
Risk Reduction	 Technical assistance for the development of national and regional disaster response and management policies and legal frameworks A Safer Schools initiative Co-financing community and local government capacity building in DRM
Preparedness	Part of a partnership to develop InaSAFE: free software that produces realistic natural hazard impact scenarios, the software will generate an impact summary including the estimated number of the population that will need to be evacuated.
Financial Protection	Continue technical assistance to support the development of a comprehensive risk financing strategy
Resilent Recovery	Community-based settlement rehabilitation and reconstruction project

Capacity Building Shaping the Project

Project outputs included a report outlining options for a national Disaster Risk Financing strategy. Report development was led by a World Bank team, which included specialists from GFDRR. A series of policy dialogues took place in conjunction with the disaster risk financing analytical work. This was due, in part, to the fact that the production of the analysis required continuous engagement with different ministries, including the Ministry of Finance, BNPB, and the Ministry of Home Affairs, among others. Furthermore, these dialogues created awareness of the importance of disaster risk financing among a number of ministries. There was also a three-day knowledge sharing event organized through Jakarta Association of Southeast Asian Nations (ASEAN), providing an opportunity for member states, academics, and the private sector to discuss risk financing, highlighting examples of best practices and lessons from international experience.

An innovative component of the project was the creation of InaSAFE, a free software that produces realistic natural hazard impact scenarios for better planning, preparedness, and response activities.¹⁵ The software provides practical tools for local officials to develop

¹⁵ InaSAFE was conceived and initially developed by the Indonesian National Disaster Management Agency (BNBP) and the Australian Agency for International Development, through the Australia-Indonesian Facility for Disaster Reduction and GFDRR.

actionable contingency plans. To calculate probable impacts, the analysis requires the input of two parameters, hazard, and exposure (people or critical assets, such as schools, hospitals and bridges). The sources of data required by InaSAFE include hazard data from technical agencies, demographic information from the national census and community knowledge captured through participatory mapping tools such as OpenStreetMap.¹⁶

With the collaboration of the Humanitarian OpenStreetMap Team and the United Nations Office for the Coordination of Humanitarian Affairs (UN-OCHA), participatory mapping tools were used to collect high-resolution data on critical infrastructure in Jakarta. The collected information was analyzed using InaSAFE during the 2012 Jakarta flood contingency planning. This information can now be openly accessed and used for future emergency planning. In order to extend the initiative, the tool was designed so that anyone with basic computer skills can upload data and generate the hazard impact scenarios. During the project duration, 1,300,000 buildings were mapped in just under three years. This was, in part, a result of training on the use of the tool hosted by GFDRR and its partners that took place across five provinces, with over 130 participants from local disaster management agencies, universities, and civil society.

In order to ensure scalability of the initiative training materials have also been developed and made available on the InaSAFE platform so that anyone can learn how to download the software, use it for contingency planning, and upload information.

The Legacy of Capacity Building

The recommendations from the *Disaster Risk Financing Strategy - Options for Consideration* and subsequent policy discussions have been adopted by the government, highlighting that the capacity-building objective of raising awareness was achieved and that the government took ownership of the initiative. However, the institutional complexity of implementing a disaster risk financing strategy (involving more than five agencies) still poses a challenge. Determining leadership of the initiative, given the absence of a clear-cut mandate from any particular agency, is a particular challenge. Continued support through policy dialogue and consensus building is planned through the World Bank's Disaster Risk Financing and Insurance Program (DRFI).¹⁷

Since its development, InaSAFE has been used to produce estimated impact assessments, including for earthquakes in Yogyakarta, a tsunami in Padang, and for community-level scenarios for Jakarta flood emergency planning. Furthermore, taking advantage of its open-source development, experts in the Philippines have developed a tool, known as WebSAFE, which meets local needs in that country. InaSAFE is also used in China, Malawi, and some European countries, such as Portugal, and the United Kingdom.

"A Disaster Risk Financing strategy is a complex multisectoral subject; building a diverse pool of champions was key to creating ownership of the initiative and support for implementation"

Task Team Leader (TTL)

¹⁶ This exercise was able to demonstrate the potential of combining crowd-sourced data with the formal Government data collection processes. While the future of such participatory exercises may not necessarily lead to a single data collection system, the collaborative process has helped build an interface between crowd-generated data, and government process in data compilation for contingency planning and broader disaster risk management (e.g., for asset exposure mapping).

¹⁷ The Program is co-sponsored by the World Bank, GFDRR, the Swiss State Secretariat for Economic Affairs, the Ministry of Finance of Japan, and the Ministry of Foreign Affairs of the Netherlands.

BNPB Leading Knowledge Exchange

ne of the objectives of this project was to build the capacity of provincial and local disaster risk management agencies. One activity implemented by the World Bank Institute [currently known as Leadership Learning and Innovation], built the capacity of BNPB to capture and share DRM knowledge. While receiving technical support and DRM knowledge from the World Bank, GFDRR, and UNDP consultants, it was important for BNPB to capture this knowledge and take ownership of the knowledge sharing process.

The WBI conducted a capacity review using their "Capacity Assessment Framework for Knowledge Hubs." WBI found that BNPB lacked systematic documentation and internal sharing of operational experience, significant loss of institutional memory through high turnover of managers, and insufficient training of new managers. WBI found that knowledge sharing between BNPB and more than 400 provincial and local disaster risk management agencies was limited due to the insufficient capture of lessons learned and the lack of training capacity.

In order to meet these capacity deficits, WBI worked with BNPB to develop DRM modules and learning materials that could be delivered through video conferencing. BNPB, aware of its capacity needs, had previously built a DRM training center, although it was not being effectively used. However, this demonstrates that the project was responsive to the agenda of BNPB. Local ownership of project processes and outputs is more likely when the program is driven by client demand. Furthermore, the program developed linkages between BNPB and national universities and NGOs to encourage sustainability.

WBI and BNPB worked together to develop PDNA training modules. The Learning Center was launched in 2014 and is acting as a hub of internal and external DRM training. The PDNA modules are being rolled out to provincial and local disaster risk management agencies across Indonesia. Capturing lessons learned and best practice is often not prioritized by government agencies; to ensure that this process continues, BNPB is currently developing an incentive system to reward those who create best practice examples and lessons learned from operational experiences, both at local and national levels.

Mega Disasters—A Case of Building Transferable and Scalable Knowledge Resources





Duration **2.5** years
November 2011–March 2014

Capacity-building activity types

 Knowledge products, long-term learning, short-term learning, knowledge exchange



Capacity-building beneficiaries

- Government/public officials
- Professionals/technicians

Summary

- Adopting a participatory process of creating knowledge notes ensured that the content was of value to the targeted countries.
- Knowledge resources transferable to other contexts can be produced and should be aimed for.
- The online CoP was an effective means of scaling the knowledge exchange to transfer lessons to a wider audience. Despite the growth in membership, the lack of sustained World Bank engagement after project completion led to a decrease in member participation.

Description

Many countries can better protect themselves from major disasters by adopting—and adapting as necessary—some of the measures taken by Japan, and by understanding the strengths and weaknesses of Japan's response to the 2011 Great East Japan Earthquake (GEJE). To help countries do this, the *Learning from Mega Disasters* initiative provides data, analysis, and insights drawn from GEJE in printed and web-based format, in face-to-face activities, and seminars presented through the Global Development Learning Network (GDLN) and the Tokyo DRM hub. The main objective of the *Learning from Mega Disasters* project was to leverage Japan's extensive knowledge on DRM for the benefit of developing countries that are vulnerable to disasters, in order to make progress towards mainstreaming DRM policies in these countries.

Problem Addressed

In many respects, Japan is at the cutting edge of DRM. For example, Japan has great expertise in seismic retrofitting techniques, flood risk management, landslide and slope stability, risk assessment and early warning systems, and land use planning. Given the high institutional, economic, and technical capacity of Japan, the main challenge for this project was to create knowledge resources that could translate to countries at different stages of development. Equally, in order to have a far-reaching impact the knowledge resources had to be adaptable and scalable by design.

Proposed Activities and Outcomes

The first component of the project included the production of knowledge notes highlighting the strengths and weaknesses of Japan's response to GEJE. The project aimed to disseminate these knowledge notes in a multitude of ways: first, as a report to contribute to the UNdriven Sendai dialogues; second, the creation of a CoP in order to house these knowledge notes and host interactive video conferencing sessions and online discussions; third, through a capacity-building program across several pilot countries among World Bank clients, including workshops and training sessions on specific sets of knowledge notes run by Japanese experts, World Bank consultants and other partners.

Capacity Building Shaping the Project

Thirty six knowledge notes were produced covering almost all aspects of the Japanese DRM system including, structural and non-structural measures, emergency response, reconstruction planning, hazard and risk information, risk financing, and recovery and relocation. The knowledge notes were prepared by more than 30 Japanese and international experts. The World Bank Institute (WBI) effectively coordinated the collaboration of the Tokyo DRM Hub, The Tokyo Development Learning Center (TDLC), the World Bank East Asia & Pacific Regional Unit and GFDRR to produce these notes. There was also consultation with over 50 advisors and reviewers internationally. This consultation included academic experts, the private sector, international and local NGOs, and a series of GDLN video conferences with stakeholders from developing countries.

A key means of addressing knowledge exchange between different contexts was the participatory process adopted in the creation of the knowledge notes. During the process of

"The main challenge we had to address is how to exchange knowledge between different contexts"

Task Team Leader (TTL)

multi-stakeholder consultation, at the mid and final stages of creating the knowledge notes, six GDLN video conferences were organized with experts from developing countries. In these sessions, the authors of the knowledge notes presented the key findings and a World Bank discussant facilitated the conversation. These sessions were identified by the World Bank task team as critical to incorporating different developing countries perspectives and ensuring the lessons learned were transferable across multiple contexts. As the World Bank DRM specialist noted, "the participants were able to communicate what was of value from the Japanese experience and what was not."

These knowledge notes were used as a basis for a pilot capacity-building program across six developing countries - Armenia, Kenya, Indonesia, Philippines, Sri Lanka and Uganda. In order to identify countries where the lessons from the project would have particular relevance, consultations took place with World Bank regional coordinators and GFDRR DRM specialists. Generally, the countries identified were those where capacity building could leverage future DRM technical assistance. The next step was to consult with client governments to identify thematic clusters that would be relevant for their level of DRM capacity.

For example, in the case of Uganda, a mission to Kampala was organized for this purpose. The Office of the Prime Minister, EU, and JICA were consulted and a knowledge exchange strategy was developed so that the content and target audiences were responsive to gaps in Uganda's capacity. The first workshop was targeted at technical officials from national line ministries and representatives from vulnerable districts, and focused on specific DRM tools such as risk mapping and early warning systems. The second was targeted at members of parliament and more generally aimed to raise awareness among decision makers.

In the case of Armenia, the country was undertaking structural and non-structural measures to mitigate earthquake damage, therefore, it was decided that the activities carried out under the capacity development program would focus on structural measures and building codes, and target the research and technical expert communities at the national level. This program was delivered remotely through GDLN sessions.

The cases of Uganda and Armenia show how prior consultations with the client allows for capacity-building programs to be tailored to the content that is most applicable and useful for the receiving country. The fact that the program could be delivered remotely in Armenia also highlights the flexibility and scalability of the knowledge products.

In order to disseminate the lessons learned to a wider audience, an online CoP was established. This was an innovative and experimental activity as it was the first web-based CoP at the World Bank. The web platform hosted a blended learning program: documents on key lessons learned were posted, followed by GDLN sessions and subsequent interactive discussion boards. In 2014 the online CoP reached 1000 members—80 percent were from outside the World Bank, and 40 percent actively participated in e-discussions. To ensure that these e-discussions were sustained, initially World Bank DRM specialists were actively involved in managing the CoP and instigating discussions. Then, in order to encourage a change of ownership from the World Bank to the members, ten external experts were identified from the CoP as discussion facilitators and theme coordinators. The TTL noted that this platform was extremely active during the project and was a powerful means of scaling knowledge dissemination.

The Legacy of Capacity Building

The *Learning from Mega Disasters* project has accelerated the process of mainstreaming DRM in a number of developing countries. Taking the example of the capacity-building program in Uganda, the objective of the workshops was to leverage the Japanese experience in mainstreaming DRM to inform actions in Uganda. The current DRM specialist working in Uganda confirmed that this objective was met, he noted that following *Learning from Mega Disasters* workshops awareness of the importance of DRM has increased significantly. For example, in these sessions the issue of trans-boundary disaster management was discussed, subsequently the East African Disaster Risk Reduction Parliamentarian Platform was established, organized by the Government of Uganda with the support of GFDRR and the World Bank. Furthermore, since the program, in 2015 a GFDRR supported technical assistance project to form a risk assessment and resilient action plan began implementation.

The CoP is still functioning and membership has grown to over 1000 members. This highlights the effectiveness of the tool as a means of scaling knowledge exchange. However, the TTL noted that this CoP is not as active as it used to be, as the project funding ended and World Bank DRM specialists were no longer there to manage the community and participation in e-discussion forums has sensibly decreased.

Future Leveraging

These knowledge notes have been disseminated internationally to and by World Bank consultants. They have been used to inform multiple projects, for example, the Bangladesh Urban Earthquake Resilience Project and the Peru Safer Schools Project.

ANNEX C

WORLD BANK CAPACITY BUILDING RESOURCES



レジリエンス・ダイアログ ~災害に強い社会に向けて~



Sendai Japan 2015.3 14/18

WCDRR



GFDRR _____

政策担当者と防災実務者によるパブリック・フォーラムボスト2015年開発目標に向けた指期性強化

BRINGING RESILIENCE TO SCALE FOR POST-2015 GOALS

The Resilience Dialogue in Sendai, Japan was one of GFDRR's flagship events at WCDRR. From left to right: Thomas Staal, Assistant Administrator, USAID; Helen Clark, Administrator, United Nations Development Programme; P.K. Mishra, Principal Secretary to the Prime Minister, India; Anote Tong, President, Kiribati; Rachel Kyte, Vice President and Special Envoy for Climate Change, World Bank Group; and Claus Sørensen, Director-General, Directorate-General for Humanitarian Aid and Civil Protection. Photo credit: World Bank

World Bank and GFDRR Disaster Risk Management (DRM) Training and E-learning Resources

GFDRR's Existing Learning Tools and Resources:

- "Introduction to Disaster Risk Assessment." Developed with the Global Practice for Social, Urban, Rural and Resilience (GPSURR), and tested on World Bank users, the course, which is based on a 2014 GFDRR publication, provides users with an introduction to the methodology, best practices, and case studies of disaster risk assessments (see: http://understanding_risk.org).
- Post Disaster Needs Assessment (PDNA) and Disaster Recovery Framework (DRF). These are one-day workshops that have no specific calendar but are offered at least three times a year internally for Bank staff, and for clients based on demand.
- Gender and Disaster Risk Management (DRM). As part of GFDRR's gender action plan, the purpose of this workshop is to increase the understanding and capacity of DRM staff to integrate gender and women's empowerment in DRM activities. The workshop is currently in the pilot stage but will be available for Bank staff this fiscal year.
- Think Hazard! (see: www.thinkhazard.org), a free and open-source online tool that allows users to assess their project's exposure to eight types of adverse natural events —earthquake, flood, landslide, wind, storm surge, drought, volcanic eruption, and tsunami. The tool also highlights how these hazards may evolve with climate change. Since its launch on May 17, thinkhazard.org had 42,000 page views and more than 6,700 sessions. GFDRR is working with the Office of the Public Service Commission (OPSC) and the DRM community to ensure that the tool can be used in operational screening, as well as with partners from the EU, UNDP and other bilateral and multilateral institutions to embed Think Hazard! within their own screening systems. Future plans also include improving the datasets in Think Hazard! as well as improving the user experience and user resources.
- Natural Disaster Risk Management Program (NDRMP). The NDRMP offers an educational model for practitioners who are looking at building their career and/or improving their skills in disaster risk management (DRM). It consists of an introductory course plus a selection of nine specialized online courses. GFDRR are currently at the early stages, conceptualizing what the new course would look like, and although the course will be primarily hosted at EMI Consulting's platform, GFDRR have discussed the possibility of offering the content through the Open Learning Campus (OLC).

Box C1: E-learning Courses Developed by the GFDRR Capacity-Building Program

The former GFDRR Capacity Program was tasked with the development of a series of online training courses.

- (1) Climate Change and Disaster Risk Management:
 - Climate Change and Disaster Risks (latest revision 2009)
- (2) Natural Disaster Risk Management:
 - Comprehensive Disaster Risk Management Framework #1 (2010)
 - GFDRR Natural Disaster Risk Management Safe Cities (2010)
 - Gender Aspects of Disaster Recovery and Reconstruction #1 (2009)
 - Community Based Disaster Risk Management (2008)
 - Damage and Reconstruction Needs Assessment (2007)
 - Earthquake Risk Reduction (2007)
 - Financial Strategies for Managing the Economic Impacts of Natural Disasters
 - Risk Analysis
 - Risk Sensitive Land Use Planning (2009)
- (3) Market Based Risk Management:
 - Innovative Market-Based Risk Management Framework (2007)
 - Market Based Commodity Price Risk Management (2008)
 - Weather Risk Management for Agriculture (2008)

Other DRM online courses and learning materials available through OLC

OLC has the following DRM related courses:

- Understanding Risk
- Introduction to Damage Loss and Needs Assessment (DALA)
- Disaster Risk Assessment
- Webinar-World Bank Disaster Risk Financing Products
- Webinar- World Bank Financing Risk Management Products FY16
- Introduction to Disaster Risk Management (They have both a self-paced and a facilitated course)
- Safe and Resilient Cities (Both self-paced and facilitated course)

OLC has other DRM resources, including:

- Podcasts
- Videos
- Knowledge notes
- BITE size learning

Communities of Practice and Other Resources

- OPEN DATA FOR RESILIENCE INITIATIVE (GFDRR)
- CITY RESILIENCE PROGRAM
- DISASTER RESILIENCE ANALYTICS AND SOLUTIONS (D-RAS) SWAT TEAM
- DISASTER RISK FINANCE (DRF) COMMUNITY OF PRACTICE
- **HYDROMET, CLIMATE SERVICES AND RESILIENCE COMMUNITY OF PRACTICE**
- INCLUSIVE COMMUNITY RESILIENCE PROGRAM
- PILOT PROGRAM FOR CLIMATE RESILIENCE (PPCR)
- RESILIENT RECOVERY COMMUNITY OF PRACTICE
- RESPONDING TO DISASTERS TOGETHER (R2D2) COMMUNITY OF PRACTICE
- SAFER SCHOOLS PROGRAM
- SMALL ISLAND STATES RESILIENCE INITIATIVE
- URBAN FLOODS COMMUNITY OF PRACTICE (UFCOP)

Details about each CoP can be accessed at:

http://globalpractices.worldbank.org/gsg/RDRM/pages/en/FocusAreas.aspx

World Bank Capacity-Building Resources for Project Managers/ Task Team Leaders

The Capacity Development Results Framework

The World Bank Institute (WBI)¹⁸ for learning and development produced 'The Capacity Development Results Framework' (2009)¹⁹. The document provides a definition of capacity development, the theoretical basis for developing a framework, and the framework itself which provides an approach for designing, implementing, monitoring, managing, and evaluating capacity development in development programs. The document was created by WBI to provide an overarching construct for defining and assessing the results of its capacity development programs. The definition of capacity building used in this report.

¹⁸ Now the Leadership, Learning and Innovation Department (LLI)

¹⁹ WBI (2009) The Capacity Development Results Framework: A strategic and results- orientated approach to learning for capacity development, http://siteresources.worldbank.org/CSO/Resources/2287161369241545034/The_ Capacity_Development_Results_Framework.pdf.

The framework developed seeks to respond to the common failure of measuring the results of capacity development work, and the common failure to build monitoring of capacity development outcomes and impact into the design and monitoring and evaluation systems of projects. The report provides information on how to conduct an impact evaluation. An impact evaluation is the:

Systematic identification of the effects—positive or negative, intended or not—on individual households, institutions, and the environment caused by a given development activity, such as a program or project. In the context of capacity development, impact evaluation can look at the extent to which new knowledge gets used and the effects that use of knowledge has on the broader organizational, sociopolitical, or policy environment.²⁰

The report provides a framework for evaluating the impact of capacity development including learning outcomes, result indicators and the corresponding evidence methods required to gather data.

An adapted version of this framework could be adopted by the program leaders/task team leaders of GFDRR supported projects. If program leaders use a generic set of indicators this can improve cross-project comparability, however, the indicators may need to be adapted according to the nature of the project. The framework has been outlined in table C1. More information can be found in the Capacity Development Results Framework (p. 84-89) including the different methods for collecting evidence for these indicators, their advantages and disadvantages, as well as their relative costs.

For more models, methods, and tools, see Evaluation Resources, available at: <u>http://go.worldbank.org/AKJPBQFODO</u>.

5. rormulated		· ·
1. Raised awarenessParticipant attitude improved Participant confidence improved Participant motivation improved2. Enhanced skillsNew skills/knowledge acquired New skills/knowledge applied3. Improved consensus/ teamworkDiscussion initiated/resumed/activated Participatory process initiated/expanded Consensus reached Collaboration increased/improved Collaboration increased/improved4. Fostered coalitions/networksDiscussion initiated/resumed/activated Participatory process initiated/improved Collaboration increased/improved Informal network(s) created/expanded Formal partnerships or coalitions created/expanded Stakeholders involved in process5. FormulatedStakeholders involved in process Policy/strategy needs assessment completed Stakeholder agreement reached	Learning outcomes	Generic learning objectives
Participant confidence improved Participant motivation improved2. Enhanced skillsNew skills/knowledge acquired New skills/knowledge applied3. Improved consensus/ teamworkDiscussion initiated/resumed/activated Participatory process initiated/expanded Consensus reached Collaboration increased/improved4. Fostered coalitions/networksDiscussion initiated/resumed/activated Participatory process initiated/improved Collaboration increased/improved5. FormulatedStakeholders involved in process Policy/strategy needs assessment completed Stakeholder agreement reached		Participant understanding of an issue or situation improved
Participant motivation improved2. Enhanced skillsNew skills/knowledge acquired New skills/knowledge applied3. Improved consensus/ teamworkDiscussion initiated/resumed/activated Participatory process initiated/expanded Consensus reached Action steps/plan formulated/improved Collaboration increased/improved4. Fostered coalitions/networksDiscussion initiated/resumed/activated Participatory process initiated/improved Collaboration increased/improved5. FormulatedStakeholders involved in process Policy/strategy needs assessment completed Stakeholder agreement reached	1. Raised awareness	Participant attitude improved
2. Enhanced skills New skills/knowledge acquired New skills/knowledge applied 3. Improved consensus/ teamwork Discussion initiated/resumed/activated Participatory process initiated/expanded Consensus reached Action steps/plan formulated/improved Collaboration increased/improved 4. Fostered coalitions/networks Discussion initiated/resumed/activated Participatory process initiated/improved 5. Formulated Stakeholders involved in process Policy/strategy needs assessment completed Stakeholder agreement reached		Participant confidence improved
2. Linialiceu skitts New skills/knowledge applied 3. Improved Discussion initiated/resumed/activated 9. articipatory process initiated/expanded Consensus reached Consensus reached Action steps/plan formulated/improved Collaboration increased/improved Collaboration increased/improved 4. Fostered Discussion initiated/resumed/activated Participatory process initiated/improved Discussion initiated/resumed/activated Participatory process initiated/improved Informal network(s) created/expanded Formal partnerships or coalitions created/expanded Stakeholders involved in process Stakeholders involved in process Policy/strategy needs assessment completed Stakeholder agreement reached		Participant motivation improved
3. Improved Discussion initiated/resumed/activated Participatory process initiated/expanded Consensus reached Consensus/ Action steps/plan formulated/improved Collaboration increased/improved Collaboration increased/improved 4. Fostered Discussion initiated/resumed/activated participatory process initiated/improved Discussion initiated/resumed/activated Participatory process initiated/improved Informal network(s) created/expanded Formal partnerships or coalitions created/expanded Stakeholders involved in process Policy/strategy needs assessment completed Stakeholder agreement reached Stakeholder agreement reached	2. Enhanced skills	New skills/knowledge acquired
3. Improved consensus/ teamwork Participatory process initiated/expanded Consensus reached Action steps/plan formulated/improved Collaboration increased/improved 4. Fostered coalitions/networks Discussion initiated/resumed/activated Participatory process initiated/improved Informal network(s) created/expanded Formal partnerships or coalitions created/expanded 5. Formulated Stakeholders involved in process Policy/strategy needs assessment completed Stakeholder agreement reached		New skills/knowledge applied
3. Improved Consensus reached consensus/ Action steps/plan formulated/improved 4. Fostered Collaboration increased/improved 4. Fostered Discussion initiated/resumed/activated Participatory process initiated/improved Informal network(s) created/expanded Formal partnerships or coalitions created/expanded Stakeholders involved in process 5. Formulated Policy/strategy needs assessment completed Stakeholder agreement reached		Discussion initiated/resumed/activated
consensus/ teamwork Consensus reached Action steps/plan formulated/improved Collaboration increased/improved 4. Fostered coalitions/networks Discussion initiated/resumed/activated Participatory process initiated/improved Informal network(s) created/expanded Formal partnerships or coalitions created/expanded Stakeholders involved in process Policy/strategy needs assessment completed Stakeholder agreement reached	2 Improved	Participatory process initiated/expanded
teamwork Action steps/plan formulated/improved Collaboration increased/improved 4. Fostered Discussion initiated/resumed/activated Participatory process initiated/improved Informal network(s) created/expanded Formal partnerships or coalitions created/expanded Stakeholders involved in process Policy/strategy needs assessment completed Stakeholder agreement reached	-	Consensus reached
4. Fostered Discussion initiated/resumed/activated Participatory process initiated/improved Informal network(s) created/expanded Formal partnerships or coalitions created/expanded Stakeholders involved in process 5. Formulated Policy/strategy needs assessment completed Stakeholder agreement reached	=	Action steps/plan formulated/improved
4. Fostered coalitions/networks Participatory process initiated/improved Informal network(s) created/expanded Formal partnerships or coalitions created/expanded Stakeholders involved in process Policy/strategy needs assessment completed Stakeholder agreement reached		Collaboration increased/improved
4. Fostered coalitions/networks Informal network(s) created/expanded Formal partnerships or coalitions created/expanded Stakeholders involved in process Policy/strategy needs assessment completed Stakeholder agreement reached		Discussion initiated/resumed/activated
Formal partnerships or coalitions created/expanded Stakeholders involved in process Policy/strategy needs assessment completed Stakeholder agreement reached	4. Fostered	Participatory process initiated/improved
5. Formulated Stakeholders involved in process	coalitions/networks	Informal network(s) created/expanded
5. Formulated Policy/strategy needs assessment completed Stakeholder agreement reached		Formal partnerships or coalitions created/expanded
5. rormulated		Stakeholders involved in process
	5. Formulated	Policy/strategy needs assessment completed Stakeholder agreement reached
	policy/ strategy	Action steps/plan formulated
Monitoring and evaluation plan designed		Monitoring and evaluation plan designed
Policy/reform/strategy/law proposed to decision-makers		Policy/reform/strategy/law proposed to decision-makers
Implementation steps formulated		Implementation steps formulated
6. Implemented Monitoring and evaluation initiated	6. Implemented	Monitoring and evaluation initiated
strategy/plan Implementation steps initiated	strategy/plan	Implementation steps initiated
Implementation know-how improved		Implementation know-how improved

Table C1: Framework for Evaluating the Impact of Capacity Development²¹

The Art of Knowledge Exchange

The World Bank also published 'The Art of Knowledge Exchange,' a planning guide for implementing and measuring a results-oriented knowledge exchange initiative. The report is part of the wider Organizational Knowledge Sharing Program (OKS). The report provides a framework for developing a knowledge exchange including the following steps:

- 1. **Anchor** the initiative including defining the development goal based upon a review of institutional challenges;
- 2. **Define** the initiative including identifying ideal participants, knowledge providers and intermediate outcomes;
- 3. **Design and develop** the initiative including selecting participants, verifying the objective and outcomes and organizing a delivery team;
- 4. **Implement** the project by guiding the participants, building relationships and tracking the results;
- 5. **Measure and report** the results, including synthesizing and reporting implementation data.

The OKS program has also produced a selection of useful notes for practitioners, providing guidance upon when different knowledge exchange instruments such as conferences, expert visits, and competitions are most appropriate. (see: <u>http://knowledgesharingfordev.org/</u><u>resource-library/art-knowledge-exchange</u>).



Capacity-Building has been defined as the process of developing and strengthening the skills, instincts, abilities, processes and resources that organizations and communities need to adapt and manage/reduce natural disaster risks.



The Global Facility for Disaster Reduction and Recovery (GFDRR) is a global partnership that developing countries better understand and re vulnerabilities to natural hazards and adapt to change. Working with over 400 local, national, and international partners, GFDRR provides gra-financing, technical assistance, training, and kr sharing activities to mainstream disaster and c Recovery (GFDRR) is a global partnership that helps developing countries better understand and reduce their vulnerabilities to natural hazards and adapt to climate change. Working with over 400 local, national, regional, and international partners, GFDRR provides grant financing, technical assistance, training, and knowledge sharing activities to mainstream disaster and climate risk management in policies and strategies. Managed by the World Bank, GFDRR is supported by 36 countries and 10 international organizations.