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PROJECT PERFORMANCE ASSESSMENT REPORT



THE PHILIPPINES  
Disaster Risk Management  
Development Policy Loan with a  
Catastrophe Deferred Drawdown Option

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**Report No.: 114746**

**PROJECT PERFORMANCE ASSESSMENT REPORT**

**the PHILIPPINES**

**DISASTER RISK MANAGEMENT DEVELOPMENT POLICY LOAN WITH A  
CATASTROPHE DEFERRED DRAWDOWN OPTION  
(IBRD-80850)**

**June 27, 2017**

*Human Development and Economic Management  
Independent Evaluation Group*

## Currency Equivalents (annual averages)

*Currency Unit = Philippine Peso (₱)*

2012	US\$1.00	₱42.59
2013	US\$1.00	₱43.04
2014	US\$1.00	₱43.85
2015	US\$1.00	₱45.09
2016	US\$1.00	₱46.06

## Abbreviations and Acronyms

AAA	analytic and advisory activities
CAS	country assistance strategy
CAT DDO	Catastrophe Deferred Drawdown Option
DBM	Department of Budget and Management
DILG	Department of the Interior and Local Government
DOF	Department of Finance
DOH	Department of Health
DPWH	Department of Public Works and Highways
DRFI	disaster risk financing and insurance
DRM	disaster risk management
DRRM	Disaster Risk Reduction and Management
DSWD	Department of Social Welfare and Development
GDP	gross domestic product
GFDRR	Global Facility for Disaster Reduction and Recovery
ICR	Implementation Completion and Results
IEG	Independent Evaluation Group
ISR	Implementation Status and Results Report
JICA	Japan International Cooperation Agency
LDRRMF	Local Disaster Risk Reduction and Management Funds
LDRRMP	Local Disaster Risk Reduction and Management Plan
LGU	local government unit
M&E	monitoring and evaluation
NDCC	National Disaster Coordinating Council
NDRRMC	National Disaster Risk Reduction and Management Council
NEDA	National Economic and Development Authority
OCD	Office of Civil Defense
OPCS	Operations Policy and Country Services
PMESD	Project Monitoring and Evaluation System for DRM
PPAR	Project Performance Assessment Report
SNAP	Strategic National Action Plan
UNISDR	United Nations Office for Disaster Risk Reduction
WHO	World Health Organization

## Fiscal Year

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<p>This report was prepared by Xiaolun Sun and Kristin Little, who assessed the program in June 2016. The report was peer reviewed by Stephen Hutton and panel reviewed by Chad Leechor. Carla F. Coles and Yasmin Angeles provided administrative support.</p>
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## Principal Ratings

	ICR*	ICR Review*	PPAR
Outcome	Satisfactory	Satisfactory	Satisfactory
Risk to Development Outcome	Moderate	Moderate	Moderate
Bank Performance	Satisfactory	Satisfactory	Satisfactory
Borrower Performance	Satisfactory	Satisfactory	Satisfactory

\* The Implementation Completion and Results (ICR) report is a self-evaluation by the responsible World Bank global practice. The ICR Review is an intermediate IEG product that seeks to independently validate the findings of the ICR.

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**IEG Mission: Improving World Bank Group development results through excellence in independent evaluation.**

### **About this Report**

The Independent Evaluation Group assesses the programs and activities of the World Bank for two purposes: first, to ensure the integrity of the World Bank's self-evaluation process and to verify that the World Bank's work is producing the expected results, and second, to help develop improved directions, policies, and procedures through the dissemination of lessons drawn from experience. As part of this work, IEG annually assesses 20-25 percent of the Bank's lending operations through field work. In selecting operations for assessment, preference is given to those that are innovative, large, or complex; those that are relevant to upcoming studies or country evaluations; those for which Executive Directors or Bank management have requested assessments; and those that are likely to generate important lessons.

To prepare a Project Performance Assessment Report (PPAR), IEG staff examine project files and other documents, visit the borrowing country to discuss the operation with the government, and other in-country stakeholders, interview Bank staff and other donor agency staff both at headquarters and in local offices as appropriate, and apply other evaluative methods as needed.

Each PPAR is subject to technical peer review, internal IEG Panel review, and management approval. Once cleared internally, the PPAR is commented on by the responsible World Bank country management unit. The PPAR is also sent to the borrower for review. IEG incorporates both World Bank and borrower comments as appropriate, and the borrowers' comments are attached to the document that is sent to the World Bank's Board of Executive Directors. After an assessment report has been sent to the Board, it is disclosed to the public.

### **About the IEG Rating System for Public Sector Evaluations**

IEG's use of multiple evaluation methods offers both rigor and a necessary level of flexibility to adapt to lending instrument, project design, or sectoral approach. IEG evaluators all apply the same basic method to arrive at their project ratings. Following is the definition and rating scale used for each evaluation criterion (additional information is available on the IEG website: <http://ieg.worldbankgroup.org>).

**Outcome:** The extent to which the operation's major relevant objectives were achieved, or are expected to be achieved, efficiently. The rating has three dimensions: relevance, efficacy, and efficiency. *Relevance* includes relevance of objectives and relevance of design. Relevance of objectives is the extent to which the project's objectives are consistent with the country's current development priorities and with current Bank country and sectoral assistance strategies and corporate goals (expressed in poverty reduction strategy papers, country assistance strategies, sector strategy papers, and operational policies). Relevance of design is the extent to which the project's design is consistent with the stated objectives. *Efficacy* is the extent to which the project's objectives were achieved, or are expected to be achieved, taking into account their relative importance. *Efficiency* is the extent to which the project achieved, or is expected to achieve, a return higher than the opportunity cost of capital and benefits at least cost compared to alternatives. The efficiency dimension is not applied to development policy operations, which provide general budget support. *Possible ratings for outcome:* highly satisfactory, satisfactory, moderately satisfactory, moderately unsatisfactory, unsatisfactory, highly unsatisfactory.

**Risk to Development Outcome:** The risk, at the time of evaluation, that development outcomes (or expected outcomes) will not be maintained (or realized). *Possible ratings for risk to development outcome:* high, significant, moderate, negligible to low, not evaluable.

**Bank Performance:** The extent to which services provided by the Bank ensured quality at entry of the operation and supported effective implementation through appropriate supervision (including ensuring adequate transition arrangements for regular operation of supported activities after loan/credit closing, toward the achievement of development outcomes. The rating has two dimensions: quality at entry and quality of supervision. *Possible ratings for Bank performance:* highly satisfactory, satisfactory, moderately satisfactory, moderately unsatisfactory, unsatisfactory, highly unsatisfactory.

**Borrower Performance:** The extent to which the borrower (including the government and implementing agency or agencies) ensured quality of preparation and implementation, and complied with covenants and agreements, toward the achievement of development outcomes. The rating has two dimensions: government performance and implementing agency(ies) performance. *Possible ratings for borrower performance:* highly satisfactory, satisfactory, moderately satisfactory, moderately unsatisfactory, unsatisfactory, highly unsatisfactory.

## **Preface**

This is the Project Performance Assessment Report (PPAR) of the Philippines Disaster Risk Management Development Policy Loan with a Catastrophe Deferred Drawdown Option (CAT DDO). The loan was approved in September 2011 and closed in October 2014. This report presents findings from an in-depth review of the project documents, discussions with World Bank country teams in Washington, D.C. and Manila, and interviews with government officials and other stakeholders during an evaluation mission to the Philippines in June 2016. The cooperation and assistance of all parties consulted are gratefully acknowledged, as is support of the World Bank office in Manila.

The assessment aims first to serve an accountability purpose by verifying the project's success in achieving the intended outcomes. Secondly, as part of a cluster of PPARs on development policy loans with a deferred drawdown option, including CAT DDO, the report draws lessons to inform the design and implementation of this type of instrument in the Philippines and other World Bank Group client countries.

Following standard IEG procedures, the report is sent to government officials and agencies in the Philippines for review and feedback. Comments from the Region have been taken into account. The Borrower had no comments.

## Summary

This Project Performance Assessment Report (PPAR) evaluates the Philippines Disaster Risk Management Development Policy Loan with a Catastrophe Deferred Drawdown Option (CAT DDO). The loan of US\$500 million was approved in September 2011, fully drawn down in December 2011 when the disbursement trigger was met, and closed in October 2014. The PPAR reviews the performance of this operation based on IEG and Operations Policy and Country Services (OPCS) guidelines on program evaluations.

The Philippines CAT DDO aimed to enhance the capacity of the Government of the Philippines to manage the impacts of natural disasters. To this end, the program supported objectives in three policy areas: (i) strengthening the institutional capacity for disaster risk management (DRM) efforts; (ii) mainstreaming DRM into development planning; and (iii) better managing the government's fiscal exposure to natural hazard impacts. The operation was complemented by a technical assistance program from the World Bank Global Fund for Disaster Risk Reduction (GFDRR) to provide targeted support in these areas.

These objectives were highly relevant to country conditions both at the time of appraisal and closing, and remain relevant today. They were well aligned to government development plans and consecutive World Bank Group strategies. Design of the program had substantial relevance for achieving the objectives: the choice of instrument ensured attention from the highest level of government to DRM issues; the contingent line of credit allowed the Philippines to tap into untied resources quickly in the event of catastrophic disasters; the reform program included appropriate actions to put into motion the government's increasing focus on preparedness and resiliency; the program's policy matrices provided a plausible causal chain, linking the prior actions to the expected outputs and outcomes; and the parallel technical assistance supported key elements of the policy program.

Overall outcome is rated satisfactory, reflecting high relevance of the objectives, substantial relevance of program design, and substantial efficacy in achieving the goal of enhancing the capacity of the country to manage the impacts of natural disasters. The relevant agencies demonstrated high ownership of the DRM reform agenda, and there was considerable progress in all three areas of the policy program. The weakest spot is with the design and implementation of a monitoring system to track disaster financing where weak institutional capacity handicapped the Office of Civil Defense. There has been continuous progress since program closing.

Risk to Development Outcome is moderate. Focused technical assistance reinforced the program elements to a large extent. The government's and the World Bank's interest in increasing the country's resiliency to disasters continues through subsequent disasters. The second CAT DDO has been approved and will carry on with the DRM agenda. The current World Bank portfolio includes other complementary support, while many development partners also continue to support the government's efforts to strengthen its DRM capacity.

Lessons gleaned from the review are:

- **The CAT DDO proved to be a useful instrument in the Philippines for achieving the dual objectives of supporting fundamental DRM reforms and providing quick-release financing for disaster recovery and reconstruction.** Being a budget support operation, it drew the highest level of attention to the DRM agenda and changed the dynamics of the World Bank’s dialogue with the country. This has facilitated a deeper and more comprehensive discussion about DRM and allowed the World Bank to contribute its expertise at the macro level.
- **As with all policy reforms, in-depth analytical work and well-targeted technical assistance were critical for achieving results.** The World Bank’s knowledge of DRM in general and of disaster risk financing, particularly, was recognized by all stakeholders consulted for this evaluation. Combined with careful analysis of the Philippines’s specific risk exposure and the social impact of natural disasters, this knowledge base provided the elements for appropriate program design. To ensure proper program implementation, a technical assistance program specifically designed to support the CAT DDO policy actions was critically important.
- **In the context of this operation, there were multiple confusions over the purposes of a CAT DDO and the use of the loan proceeds, which call for further clarification in World Bank documents and better communication.** Both the World Bank and the government saw the loan as a contingent line of credit to provide partial financing in the aftermath of severe natural disasters; however, the government also stressed the budget support nature of the loan. In addition, there were inconsistencies between World Bank literature on the use of different disaster risk financing instruments and the Program Document of this operation in terms of the types of disasters for which the CAT DDO resources were intended. These confusions have led to disagreement on whether the government used the loan appropriately. Further clarification in World Bank documents and better communication between the World Bank and the counterparts would improve program design and facilitate its implementation.

Auguste Tano Kouame  
Director  
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# 1. Background and Context

1.1 A relatively high exposure to natural disasters partially explains the stubbornly high poverty and inequality in the Philippines. Between 1995 and 2015, the Philippines suffered a total of 274 natural disasters, behind only the United States (472), China (441), and India (288).<sup>1</sup> It is also the fifth most vulnerable country in terms of disaster risk implications for development capacity.<sup>2</sup> On average, earthquakes, tropical and non-tropical cyclone-induced wind and/or precipitation cause fatalities of more than 1,800 people<sup>3</sup> and about \$4.6 billion in damage to assets each year.<sup>4</sup> Weather-related catastrophic disasters have increased in frequency, and their economic impact has become more devastating over time as assets and overall exposure increase. Secondary and indirect impacts of these disasters on the economy further increase costs. Financial shocks of this magnitude are a brake on the Philippines' growth and poverty reduction efforts.

1.2 Many Filipinos live just above the poverty line and move in and out of poverty because of high vulnerability to climatic, disaster, financial, and price shocks. Unfortunately, and perhaps not coincidentally, the poorest regions of the country are the most vulnerable to storms and flooding, which have worsened with changing weather patterns (World Bank 2015d). Average annual spending on disaster relief accounts for 69 percent of social expenditure in the Philippines, compared to 22 percent for developing countries overall and 1.5 percent in high-income countries (UNISDR, 2015).<sup>5</sup> Achieving sustainable development is difficult when such a large portion of social protection, public health, and public education investment is needed to maintain the status quo.

## Disaster Risk Management

1.3 Despite the frequency and severity with which the Philippines suffers from natural hazards, there was little attention to disaster risk management (DRM) prior to 2009. In 1941, a Civilian Emergency Administration was established to execute disaster response. Its focus, however, was on short-term forecasting, early warning and evacuation, and post-disaster relief. A 2009 International Red Cross/Red Crescent Society/ProVention Consortium report noted that “disaster-related budgetary allocations in the Philippines were primarily intended for post-disaster response, in the form of annually appropriated national and local government calamity funds.”<sup>6</sup> Because these resources tended to be insufficient, unplanned reallocations of government budgetary resources were often the primary source of relief and rehabilitation funding.

1.4 This began to change with Tropical Storm Ondoy and Typhoon Pepeng, which hit the country in October 2009 and caused extensive damage to regions that account for more than 60 percent of the country's economy, including metro Manila.<sup>7</sup> The strong negative impact on the capital city was a turning point in DRM in the Philippines. In 2010, the government enacted the Philippine Disaster Risk Reduction and Management (DRRM) Act (Republic Act 10121), which called for a coherent, integrated, and proactive approach to DRM across levels and sectors of government, and among vulnerable communities. It sought to mainstream disaster risk reduction (DRR) into development policies and processes, and expand the focus of disaster management from

ex-post actions and funding for emergency response, relief, and recovery to include ex-ante actions and funding for risk reduction, preparedness, and prevention.

1.5 This shift of focus is reflected in the use of the National Calamity Fund: prior to 2010 it was used for post-disaster activities; after the enactment of the DRRM Act, the fund became the National DRRM Fund, and 70 percent of its resources could be allocated for pre-disaster preparedness activities. That same year, the government adopted the Strategic National Action Plan (SNAP) for Disaster Risk Reduction through Executive Order No. 888. The SNAP was the Government's 10-year plan (2009–19) to achieve the commitments made under the Hyogo Framework for Action, a global disaster reduction policy framework led by the United Nations (UNISDR, 2007).<sup>8</sup>

## **World Bank Strategies**

1.6 Through the years, the joint World Bank/government focus within DRR has shifted from knowledge sharing to DRM capacity building. A decade ago, the World Bank's FY06–08 country assistance strategy (CAS) addressed disaster risk with a knowledge-sharing program of distance learning—virtual courses on project and procurement management and DRM for national and local agencies. In 2005, the National Disaster Coordinating Council, in partnership with the World Bank Institute and three Philippine-World Bank Knowledge for Development Center universities, launched an online course in disaster risk management.<sup>9</sup> It was the first of its kind in the Philippines and the first for the World Bank Group at the country level.

1.7 Strategic Objective 4 of the FY10–12 CAS, whose effective period was extended to FY13 by the FY11 CAS Progress Report, and was intended to enable more inclusive growth by helping the Philippines to “reduce vulnerabilities by expanding and rationalizing the country's social safety net, improving DRM, piloting climate change adaptation measures and expanding climate change mitigation programs.”<sup>10</sup> While retaining an emphasis on the knowledge agenda, this CAS made a shift from offering virtual courses on DRM to a much more comprehensive approach, envisioning a Catastrophe Disaster Drawdown Option (CAT DDO) and related technical assistance funded through the Global Facility for Disaster Reduction and Recovery (GFDRR) and trust funds.

1.8 The FY15–18 Country Partnership Strategy identifies high exposure and vulnerability to current and growing disaster and climate change risks as a development constraint under Engagement Area 4, and recommends that the response should be to increase physical and financial resilience to natural disaster and climate change impacts.<sup>11</sup> It supports the government's strategy of convergence by continuing to move away from a sector focus with standalone projects and programs to programmatic and multi-sectoral approaches. New World Bank financing will be for development policy operations and Program-for-Results lending. This yet more comprehensive approach to disaster risk involves heavy emphasis on disaster risk financing.

## 2. Objectives, Design, and Their Relevance

2.1 The Program Document and the Loan Agreement both stated that the objective of the loan was “to enhance the capacity of the Government of the Philippines to manage the impacts of natural disasters” (World Bank 2011b and World Bank 2011c). To achieve this objective, the CAT DDO supported three aspects of the government’s DRRM framework: (i) strengthening the institutional capacity for DRM efforts; (ii) mainstreaming DRR into development planning; and (iii) better managing the government’s fiscal exposure to natural hazard impacts. This evaluation will assess the achievement of the objective in each of these policy areas.

2.2 The program had two prior actions: (i) the enactment of the DRRM Act; and (ii) the adoption of the SNAP. A parallel technical assistance program from the Global Fund for Disaster Risk Reduction (GFDRR) was specifically prepared to complement the CAT DDO. Approved in December 2011 (three months after the CAT DDO), the technical assistance program supported activities in the three policy areas. The loan proceeds (US\$500 million) were the maximum amount allowed under the World Bank’s CAT DDO guidelines and could be withdrawn at the government’s request upon a Presidential Proclamation of a State of Calamity, so long as the government maintained satisfactory progress in implementing the DRM program.<sup>12</sup>

### Relevance of Objectives

2.3 Relevance of objectives is rated **high**.

2.4 Improving the Philippines’ ability to manage the impacts of natural disasters was highly relevant to the country context and remains relevant today. Although the country had developed a system for emergency preparedness and post-disaster response, it was at the initial stage of developing and implementing a national framework for disaster risk management. Capacity constraints, both human and financial, were a key challenge, especially in local governments. The policy areas supported under the CAT DDO appropriately focused on the basic first steps for building a disaster risk management system in the Philippines. They reflected the recommendations of the World Bank’s knowledge work, and studies by other agencies and institutes. These included studies focusing specifically on the Philippines, such as *Disaster Risk Management in the Philippines: Enhancing Poverty Alleviation through Disaster Reduction* (NDCC–World Bank, 2004), and analysis on DRM framework like *Natural Hazards, Un-natural Disasters: The Economics of Effective Prevention* and *Catastrophe Risk Financing in Developing Countries* (World Bank 2009 and World Bank 2010).<sup>13</sup>

2.5 The objectives aligned closely with the Philippine Development Plan 2011-2016 and its midterm update, in which disaster risk reduction and climate change adaptation were key priorities for inclusive growth, and for the development of agriculture, environment, industry, infrastructure, security, and social development (NEDA 2011, 2014). Because of DRR’s close link to poverty alleviation and sustainable development, the Philippine Development Plan highlighted the importance of integrating disaster risk reduction into development planning at all levels, strengthening institutional capacities of national and local governments for DRRM, and improving the adaptive capacities of the communities.

2.6 The objectives were also congruent with the World Bank’s strategic priorities in the FY10–12 CAS, and continue to be relevant to the FY15–18 Country Partnership Strategy, which maintains an even stronger focus on improving DRM in the Philippines (see paragraphs 1.7 and 1.8).

## Relevance of Design

2.7 Relevance of design is rated **substantial** based on the program’s choice of instrument and policy content.

### Choice of instrument

2.8 As noted in the IEG Natural Disaster Study, rapid and flexible financing is critical for early recovery (World Bank 2007). Estimates of the Philippines’ short-term financing needs following recent typhoons ranged from \$4 million to \$28 million (table 2.1), and the main source of funding to meet these needs was reallocation of budgetary resources (see paragraph 1.3).

**Table 2.1. Short-Term Financing Needs Following Typhoons**

Ondoy/Pepeng (2009)	Washi (2011)	Yolanda (2013)
₱955 million (about \$19 million) <sup>14</sup>	₱183 million (about \$4 million) <sup>15</sup>	₱1.3 billion (about \$28 million) <sup>16</sup>

2.9 Designed as bridge financing until other funding can be mobilized, the CAT DDO allowed the country to tap quickly into untied resources to secure the operation of critical public facilities (for example, health services), minimize business interruption, and accelerate recovery efforts. By giving the government access to a contingent line of credit for disaster response, the CAT DDO relieved to some extent the need to reserve this amount in the budget, which was difficult in its tight fiscal context, or to disrupt ongoing development investments for disaster relief and recovery. It also gave the government the freedom to head up its own response, unencumbered by restrictions on or delays in funding from other sources. Stakeholders interviewed for this evaluation highlighted this provision as important to the effectiveness of the government response.

2.10 In addition to flexibility in the use of the funds, government officials noted that the trigger for drawing down CAT DDO resources was not as stringent as an insurance product. At the time of appraisal, the government was drafting a disaster risk financing strategy for the country, and recognized that contingent credits were a valuable part of that strategy. They saw the operation as a positive catalyst for changing how the Philippines approached risk financing.

2.11 Because it was a DPL, and as such administered through the Department of Finance (DOF), the CAT DDO allowed the World Bank to participate in the government’s DRRM discussions and to contribute its expertise at the strategic level. In the past, the World Bank worked primarily with departments of defense on post-disaster recovery and reconstruction. Having the DOF as the counterpart was a game changer because it has the capacity to think broadly at a higher level, raising the profile of DRRM from an infrastructure issue to a public

finance issue. It also brought out progress in the new policy area of financial protection against disasters. Because the program opened a disaster risk dialogue between the World Bank and the government, and pulled together the thinking on disasters and insurance, it allowed the World Bank to more fully understand the risk faced by the Philippines and to offer more market-based solutions. For example, the government will be increasing its insurance against natural disasters and is working with the World Bank on the preparation of a Catastrophe Bond. These ideas are being developed further in the second CAT DDO approved in July 2015.

### **Policy program**

2.12 The DRRM Act and the SNAP proposed a comprehensive, all-hazard, multi-sectoral, interagency and community-based approach to DRM and defined in detail the government's plan for building its DRM system. The two prior actions focused on advances in these two documents, which provided the institutional and regulatory basis for developing the national DRRM framework and for achieving the CAT DDO objectives. The three policy areas targeted selected aspects of the DRRM Act. The Program Document clarified the specific actions supported in each policy area, referring to the relevant mandates of the DRRM Act, and defined the targeted outcomes. It presented a plausible theory of change for achieving the objectives, linking supported actions to expected outputs and outcomes.

2.13 The parallel technical assistance program was a key design feature of the CAT DDO. It was designed in tandem with the CAT DDO to provide technical support on several critical issues in the three policy areas. These included the development of a Project Monitoring and Evaluation System for DRM, training for Post-Disaster Damage and Needs Assessment, capacity building at the local government level for DRRM planning and preparedness, and catastrophe risk modeling and development of a Disaster Risk Financing and Insurance (DRFI) strategy. The technical assistance enabled a continuous policy dialogue and monitoring of progress in the supported areas.

2.14 The CAT DDO's policy matrix (Annex B) defined three outcomes and nine indicators, with measurable baselines and targets. Some of the outcomes were quite vague, however, and the indicators generally measured outputs delivered rather than outcomes achieved. In hindsight, some targets were also modest. This deficiency could be partially explained by the fact that this operation was the first CAT DDO in the region, so the design was conservative.

## **3. Implementation**

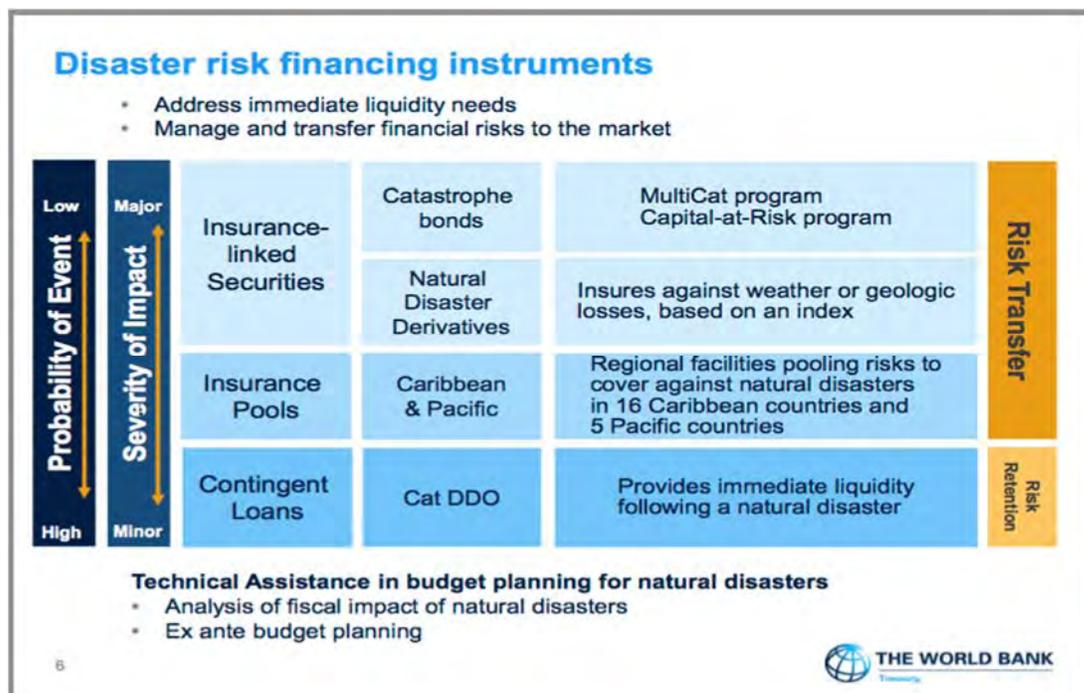
3.1 The FY10–12 CAS programmed a CAT DDO for FY11. Preparation started in December 2010 and went smoothly, although the loan's approval by the World Bank's Board (September 13, 2011) and effectiveness (December 15, 2011) were slightly behind schedule. The day after the loan became effective, Tropical Storm Washi made landfall along the east coast of Mindanao, killing over 1,200 people and causing over US\$2 billion in damage. On December 20, 2011, President Benigno Aquino III declared a national State of Calamity. The government made a request to the World Bank on December 27, 2011 to draw down the full

amount of the CAT DDO in one tranche, and received the funds two days later. The operation closed on the original closing date of October 31, 2014.

### Box 3.1. Use of CAT DDO Fund

There was certain confusion surrounding the use of the CAT DDO funds. Some of the Bank staff interviewed for this evaluation suggested that a relatively minor disaster by Philippine standards (see Table 2.1 for estimates of short-term financing needs following recent typhoons) would not warrant drawing down the entire US\$500 million of the CAT DDO. This view was consistent with the Program Document, which states that “in line with the World Bank’s Catastrophe Risk Financing Framework, the government was advised that small-scale natural disasters are expected to be covered by the government’s own resources and reserve funds, *while this instrument may cover less frequent, more severe disasters*” (World Bank, 2011, emphasis added). However, neither the Program Document nor the Loan Agreement of the operation defined the size of the disasters for which the CAT DDO funding could be used. The only condition was “a State of Calamity has been declared by the Borrower’s President through a Proclamation of Calamity duly published in the Official Gazette in accordance with the Borrower’s legislation,” which was duly fulfilled.

Review of World Bank documents and interviews with stakeholders reveal inconsistencies in how the proper use of the CAT DDO resources is defined. A report on disaster risk financing in the Latin American region states that “national reserve funds, supplemented by contingent financing if needed, can efficiently address *small and recurrent* losses (World Bank, 2010a, emphasis added).<sup>1</sup> This definition is consistent with a recent Treasury presentation on the World Bank’s disaster risk financing instruments (figure below). The GFDRR also describes the CAT DDO instrument as providing “an affordable source of contingent credit for governments to finance *recurrent losses* caused by natural disasters” (GFDRR).



Source : World Bank Treasury presentation: “Risk Transfer and Disaster Risk Management Products,” Philadelphia, June 2, 2015.

<https://www.casact.org/education/reinsure/2015/presentations/C-12.pdf> (consulted June 14, 2016).

Several factors affected the government's decision to draw down the full loan amount when Typhoon Washi hit. The storm occurred in December, at the end of the government fiscal year, and would have taken a special government session to work out how to finance the disaster. The government was keen on using the entire amount because the initial estimated spending needs were large and there was political pressure to show solidarity with the victims of this casualty-heavy disaster that hit a particularly poor area. Other donor financing was available, but it was difficult to use because the responsible agencies did not have time to prepare the necessary documents in the face of an emergency, and the use of the funds would be governed by different donors with potentially conflicting requirements. As a government representative noted, the government would rather not use such funding, and opt instead to use its own resources and integrate the recovery program with the country's public sector financial management system. Another factor was that the Philippines' access to capital markets improved between the time when the CAT DDO was contracted and when Typhoon Washi hit. The government believed that it could afford not keeping the CAT DDO funding for future disasters.

On November 2, 2013, the country was hit by Super-typhoon Yolanda, the strongest storm ever to make landfall in recorded history. It caused an estimated 6,293 fatalities (plus 1,061 still missing as of April 3, 2014), total damage and loss of P571.1 billion (US\$12.9 billion), and an increase in national poverty incidence by 1.9 percentage points per the ADB. In face of the unprecedented scale of damage, President Benigno Aquino III assured the country that there would be enough funds to deal with the disaster, noting that the country had "some P16 billion (US\$364 million) in savings, P6 billion (US\$136 million) from the President's Social Fund, and P1 billion (US\$23 million) from the calamity and contingency funds" (Balita, 2013). As the CAT DDO had been fully disbursed two years earlier, the Government had to find other funding sources to respond to Yolanda. Eventually, the government mobilized \$350 million in two months (DBM, 2015). Four months following the disaster, \$600 million were released for Yolanda recovery and reconstruction, compared to \$500 million released in two days for Washi with the CAT DDO.

3.2 The program was implemented according to the arrangement agreed during negotiations. The DOF was the executing agency and coordinated all aspects of the operation. The Department of Budget and Management (DBM) was responsible for allocating the funds within the government. The National Disaster Risk Reduction and Management Council–Office of Civil Defense (NDRRMC–OCD) led the effort to monitor progress toward achieving the policy targets. Because the policy targets were integrated with the regular programs of the relevant agencies, monitoring and reporting on progress toward the indicators was conducted using the existing systems of these agencies.

## 4. Achievement of the Objectives

4.1 As discussed earlier, many of the indicators outlined in the program matrix measure outputs delivered rather than outcomes achieved. By program closing, most of the targets had been met or exceeded. Although these results do not by themselves indicate achievement of the objectives, they are necessary enabling steps toward the goals. This evaluation considers the outcomes delivered that may or may not be part of the results matrix. On balance, the CAT DDO's objectives were substantially achieved.

## **Objective 1: Strengthen the Institutional Capacity for DRM Efforts**

4.2 Efficacy of Objective 1 is rated **substantial**.

4.3 In 2010, the Government passed the DRRM Act 10121 (a prior action), which empowered local governments and communities to put disaster risk reduction measures into action and to address risks. The DRRM Act mandates local government units (LGUs) to establish a Local Disaster Risk Management Office; allocate at least 5 percent of their revenue as their Local Disaster Risk Reduction and Management Fund; adopt and apply the official Disaster Risk Reduction Mainstreaming Guidelines in their Development and Land Use planning; design, program, and coordinate DRRM activities; and develop Local Disaster Risk Reduction and Management Plans (LDRRMP) consistent with the National DRRM Framework.<sup>17</sup> Since the passage of the DRRM Act, LGUs have significantly scaled up their efforts to respond to disasters. By project close in 2014, all provinces (80 in total) and more than 1,487 cities and municipalities (out of 1,634) had established fully functional DRRM offices with budget and staffing allocations. The CAT DDO indicators tracked three sets of actions; two of these were well undertaken while the third encountered serious capacity issues.

4.4 **Support to DRRM Offices.** To enable the LGUs to comply with and implement the DRRM Act, the Department of the Interior and Local Government (DILG) issued Memorandum Circular No. 2012 in April 2012 to provide guidance on the eligible expenditures to be supported by the Local Disaster Risk Reduction and Management Funds (LDRRMFs). In March 2013, the NDRRMC, the DBM, and DILG issued a second Joint Memorandum Circular (2013-1) to communicate that 70 percent of the LDRRMFs should be dedicated to ex-ante functions and 30 percent to an ex-post Quick Response Fund. It also clarified the DRRM Act regarding the establishment of a trust fund for unspent portions of LDRRMFs. To guide the establishment of these units, the NDRRMC, DILG, DBM, and the Civil Service Commission issued Joint Memorandum Circular No. 2014-1 in April 2014 with guidelines.

4.5 Through the established DRRM offices, LGUs have created LDRRMPs that integrate disaster risk considerations into local development plans using guidelines issued by the Housing and Land Use Regulatory Board on risk-informed land use planning. LGUs' ability to prepare for disasters has also been strengthened through: (i) forecasts provided by the Philippine Atmospheric, Geophysical, and Astronomical Service Administration; (ii) better hazard maps, particularly for LGUs located along major river basins; and (iii) pre-disaster risk assessments implemented by Office of Civil Defense (OCD) by deploying teams to advise LGUs on preparedness actions.

4.6 The DILG monitors the progress of the Local DRRM Offices through the annual *Seal of Good Local Governance* program. Rolled out on January 15, 2014, this program covers the same topics as a predecessor program, *Seal of Good Housekeeping*, which measured the levels of compliance with the DILG's Full Disclosure Policy, plus measures of disaster preparedness, social protection, business-friendliness and competitiveness, peace and order, and environmental management. About three quarters of LGUs earned the seal in the first year (Table 4.1).<sup>18</sup> These LGUs received an incentive package that included access to the Performance Challenge Fund and other national

performance-based programs. Those LGUs not qualified for the seal were provided with capacity development interventions.

**Table 4.1. Disaster Preparedness Criteria for the Seal of Good Local Governance, 2014**

Criteria	TOTAL (1,676)				
	#	%	P (77)	C (143)	M (1,456)
1. Organizational Structure	1639	98%	76	143	1420
a) Organized LDRRMC	1658	99%	76	143	1439
b) Organized LDRRMO	1644	98%	77	143	1424
2. Operational Readiness	1275	76%	73	140	1062
a) Early Warning System in Place	1595	95%	77	142	1376
b) Evacuation Center Identified	1651	99%	76	143	1432
c) SAR Organized, Equipped, and Trained	1494	89%	76	143	1275
d) System for Relief Operations	1541	92%	76	143	1322
e) System for Relief Operations	1587	95%	77	143	1367
f) System for Providing Medical Support	1583	94%	77	143	1363
g) System for Ensuring Peace and Security	1588	95%	77	143	1368
h) Standard Operating Procedures are documented	1426	85%	74	140	1212

*Note:* C = cities; LDRRMC = Local Disaster Risk Reduction and Management Council; LDRRMO = Local Disaster Risk Reduction and Management Office; M = municipalities; P = province.

4.7 Nevertheless, the capacity to implement the LDRRMPs varies considerably from LGU to LGU. Some weaknesses became evident after Typhoon Yolanda: transfer of funds from the central government to the LGUs was slow, reconstruction was slow, and there were quality issues. A post-Yolanda assessment by NDRRMC notes that since 2010, provinces and municipalities all over the country have developed their respective DRRM and climate change adaptation plans “in various stages of compliance and completion,” but that although some plans reflect ground realities and have adequately prepared some communities for emergency situations, others were “put together for compliance purposes only” (NDRRMC, 2014).

4.8 Moreover, though the CAT DDO provided a fiscal buffer at the national level, some of the LGUs lacked the capacity to access help. According to an assessment by the Philippine Commission on Audit, although the LGUs reserved 5 percent of their estimated revenue from regular sources for the LDRRMPs (or the DBM regional offices would decline their budget requests), the funds were not always sufficient given the number of disasters the country faced. This was especially true for the lower income municipalities (Commission on Audit, 2014). A national desk assessment of LGU compliance with the DRRM Act conducted by the Bureau of Government Supervision in 2013 found that only 23 percent of LGUs located in flood-prone areas were prepared for disasters in terms of awareness, institutional capacities, and coordination.<sup>19</sup>

4.9 Often, the DRRM officer is coterminous with the local chief executive. Stakeholders interviewed for this evaluation believed that this practice needed to stop for the sake of the continuity and sustainability of the position. The NDRRMC assessment came to the same conclusion, noting that “Typhoon Yolanda not only proved this truism but also highlighted the urgency with which LGUs need to establish dedicated DRRM offices and appoint a full-time officer or else suffer the consequence of complacency.”<sup>20</sup>

4.10 **Develop a Monitoring System to Track Disaster-Related Financing.** To better understand the disaster financing needs in the Philippines, the OCD, with help from the World Bank and the GFDRR, created a Project Monitoring and Evaluation and System for Disaster Risk Management (PMESD) to track disaster-related financing. It was designed to improve the capacity of the OCD, and as such, did help optimize its work flow. However, the tracking system is not working; the OCD lacked the technical capacity to implement the tracking system because its budget and staffing were always in flux.<sup>21</sup> The overwhelming effect of Typhoon Yolanda showed that the PMESD, as designed, was inadequate for generating the needed information. It also raised the question of whether the OCD was the right agency to handle this task. Despite these difficulties, commitment to the task remains high and in 2016 the OCD obtained a budget to add personnel and procure equipment to that end.

4.11 As an oversight agency, the DBM has the authority to coordinate fiscal spending. When the OCD’s lack of capacity became apparent, the DBM started to track DRRM spending. There is already an online system to monitor the national calamity fund, but not yet for the local funds. There remains the need to analyze and consolidate the data to develop a comprehensive picture of where the funds have gone.

4.12 The ICR reported that several alternative systems emerged in this context using the same technology as the PMESD (for example, Foreign Aid Transparency Hub, Open Reconstruction, and e-Management Platform). However, they were limited in scope and no longer exist.

4.13 **Roll Out Training Programs for Government Authorities to Conduct Post-Disaster Needs Assessments and Emergency Preparedness Drills.** By project close, 15 sector-specific guidance notes were developed for Post-Disaster Needs Assessments (PDNAs), and training was provided to staff of the member agencies of the National DRRM Council during the PDNAs after Typhoons Pablo and Yolanda. The member agencies of the National DRRM Council also conduct multi-sectoral disaster preparedness drills.

4.14 Learning and increased capacity through this action shone through in several disasters that occurred after CAT DDO inception. For example, the creation of Pre-Disaster Risk Assessments prior to Typhoon Hagupit (Ruby), which was forecast to be the strongest storm worldwide in 2014, facilitated one of the largest peacetime emergency evacuation operations in history, according to the United Nations.<sup>22</sup> The government coordinated evacuation and disaster preparedness in all regions that could be affected, and it prioritized the evacuation of people in coastal areas. Nonfood supplies and materials for emergency shelters (hygiene kits, canvas sheets, and fastening kits)

were pre-positioned in the areas most likely to be affected. In the end, more than a million people were evacuated, and there were four casualties.

## **Objective 2: Mainstream Disaster Risk Reduction into Development Planning**

4.15 Efficacy of Objective 2 is rated **substantial**.

4.16 The policy program supported mainstreaming of disaster risk reduction into development planning in the provinces, as well as in sector planning in the Departments of Health, Public Works and Highways, and Social Welfare and Development. In all these areas, the targets were met or exceeded. All three line agencies made substantial progress in the areas monitored under the program, which were part of their regular development programs. Indeed, officials from these agencies considered the targets modest in the context of their ongoing investment plans.

4.17 **Provincial development planning.** By program close in October 2014, 72 (vs. a target of 30) of a total of 80 provinces had mainstreamed climate change adaptation and disaster risk reduction measures into their Provincial Development and Physical Framework Plans. These efforts, which resulted from the intensive risk assessment, prioritization, and budgeting exercise conducted by the National Economic Development Authority (NEDA), helped to ensure that spatial and investment planning at the provincial level is fully informed by exposure and vulnerability to disasters. On the other hand, according to DILG, only the existence of the plans is tracked, not the relevance of the plans. The LGUs submitted their plans to the OCD, which lacked the capacity to evaluate them. To help provide better information on the LGUs, the DILG is creating a database, which will inform its decisions on how to prioritize among the LGUs, and help them assess the usefulness of their plans.

4.18 **Health.** Since 2004, the Department of Health (DOH) has expanded the coverage of its Safe Hospitals Program of the United Nations Office for Disaster Risk Reduction, following World Health Organization guidelines. The work is continuing today with some realignment after Typhoon Yolanda. Hospital assessment is one of the tools it employs, and allows for prioritization and improvement of the facilities. During the CAT DDO program period, the DOH focused on localities outside Metro Manila. It conducted 199 functional and structural assessments of public and private hospitals in the Luzon region (almost twice the target) to identify gaps and inform investment decisions. Similar assessments are planned for the Visayas and Mindanao regions.

4.19 **Transportation.** The program target of retrofitting or reconstructing 10 bridges in Metro Manila was easily met by the Department of Public Works and Highways (DPWH) because it was a small component of its regular work. As the ICR reported, in 2011 the DPWH carried out a structural vulnerability assessment of all bridges along national roads in Metro Manila, which led to the identification of 56 bridges in need of retrofitting, major repair, or reconstruction; of these, 18 have been funded and 10 have been completed. This exercise was conducted throughout the Philippines in 2013, when the DPWH completed the assessment of the structural condition of all bridges along all national roads to feed into investment prioritization and budgeting. After Typhoon

Yolanda, the Department upgraded design standards and increased the factor of safety for roads and bridges to withstand stronger rainfall.<sup>23</sup>

**4.20 Social protection.** The program aimed to enhance disaster risk preparedness and response at the community level. By June 17, 2014, the Department of Social Welfare and Development (DSWD) had established 16 community-based post-disaster response windows to activate emergency procedures and expedite approval of relief and recovery operations in the event of a calamity. By October 2014, the DSWD had provided DRRM training to 24,026 communities (compared to the target of 1,000) through its Family Development Sessions program. Since the CAT DDO closed in 2014, the DSWD has developed Family and Community Disaster Preparedness Modules, which figure in a new Disaster Response Operations Manual that has been used by social welfare development workers and community volunteers to provide more comprehensive DRRM training to communities. This new manual was used between October and December 2014 to provide DRRM training to 14,000 communities in more than 550 municipalities.

**4.21 Social protection and community development programs** continue to be improved to better address disaster risks. After Typhon Yolanda, for example, the government used the existing implementation network of the *Pantawid Pamilya* conditional cash transfer program to deliver post-disaster humanitarian assistance. Municipal leaders assisted in identifying families that could be enrolled for various recovery programs, such as cash-for-work and cash-for-asset-rebuilding. This system was also used as a platform to deliver emergency income assistance. The DSWD will institutionalize the policy and mechanisms for using the conditional cash transfer system for post-disaster emergency income support under the second CAT DDO (see paragraph 4.2).<sup>24</sup>

### **Objective 3: Better Manage the Government's Fiscal Exposure to Natural Hazard Impacts**

**4.22 Efficacy of Objective 3 is rated substantial.**

**4.23** Under the CAT DDO, the DOF led the preparation of a DRFI strategy for the Philippines. Stated priorities of the DRFI Strategy included improving financing at the national level, providing local governments with funds, and empowering poor and vulnerable households and small and medium enterprises to quickly restore their livelihoods. The DRFI strategy was underpinned by the World Bank's catastrophe risk assessment work with the government; it enables the Government to weigh the costs and benefits of various risk financing instruments and their optimal combination by providing an estimate of the Philippines' natural catastrophe risks, potential losses to public and private assets, and corresponding contingent liability and social impacts.

**4.24** At the national level, the strategy includes national and local DRRM funds, and contingent credits. As part of this strategy, in 2014, the government obtained from the Japan International Cooperation Agency a ¥50 billion (US\$500 million) contingent loan modeled on the CAT DDO, and drew down US\$150 million of the loan for Typhoon Yolanda recovery efforts. Building on the lessons from this operation, the World Bank approved a second CAT DDO in 2016 to address two difficult issues: DRM in national economic planning, and new building codes.

4.25 To cover local and individual risks, the DOF is working with the World Bank on a subnational insurance pool for immediate local-level liquidity after disasters, along with a property catastrophe risk insurance pool for homeowners and businesses. At the individual level, the DOF is working with the DSWD to create a system of post-disaster cash transfers through the *Pantawid Pamilya* CCT system (see paragraph 4.21).

## 5. Ratings

### Overall Outcome

5.1 The overall outcome is rated **satisfactory**.

5.2 The overall outcome rating reflects high relevance of the objectives at appraisal, during implementation, and at closing, substantial relevance of program design, and considerable progress in all areas of the policy program for enhancing the capacity of the country to manage the impacts of natural disasters. The relevant agencies demonstrated high ownership of the DRRM reform agenda. The only weak spot was with the design and implementation of a monitoring system to track disaster financing, where weak institutional capacity of the OCD led to slow progress, though the agency was committed and continued to pursue the agenda after program closing.

5.3 There has been continuous progress since the CAT DDO closed. Both the World Bank and the government have a continued interest in supporting efforts to increase the country's resilience to disasters. This is observed in the regular work programs of the relevant agencies, which have continued to implement measures for further improvement of their DRM capacity, and in the current World Bank portfolio of operations, including the Manila Flood Plan, a second CAT DDO, and various ongoing GFDRR grant projects.<sup>25</sup>

### Risk to Development Outcome

5.4 Risk to development outcome is rated **moderate**.

5.5 The government's interest in increasing the country's resiliency to disasters has continued through catastrophic events subsequent to disbursement. In June, 2016, a new administration under President Duterte came to power in the Philippines. The extent to which this new administration will continue the previous administration's work to maintain and build the country's disaster resilience remains to be seen.

5.6 So far, both the country and the World Bank Group continue to focus on DRM issues. One of the five engagement areas of the FY15–18 Country Partnership Strategy is to increase physical and financial resilience to natural disaster and climate change impacts and improving natural resource management and sustainable development (World Bank, 2014). The approval of the second CAT DDO also mitigates the risk to the outcomes achieved under this operation by locking in the government's commitment to carry on with the DRRM plan. As before, the World Bank will provide focused technical assistance under the new CAT DDO, and the current World Bank portfolio includes other complementary support. Additionally, many development partners, including, inter alia,

JICA, ADB, the Australian Agency for International Development (AusAid), the German Federal Enterprise for International Cooperation (GIZ), the Canadian International Development Agency (CIDA), the European Union, the World Health Organization, USAID, and the United Nations Office for Disaster Risk Reduction (UNISDR), along with the GFDRR support the government's efforts to strengthen its DRRM capacity. All these help to ensure that the progress achieved under the CAT DDO will be sustained.

## **World Bank Performance**

5.7 World Bank performance is rated **satisfactory**.

### **Quality at Entry**

5.8 Quality at entry is rated **satisfactory**.

5.9 The operation was prepared as it was envisioned in the FY10–12 CAS. It was created partly to protect the integrity of ongoing portfolio from project restructuring in the event of a calamity. Its design was underpinned by the World Bank's expertise in disaster risk reduction and management, in-depth analysis of capacity gaps and priorities at the national and local levels, experience with CAT DDOs from Latin America, and collaboration with relevant World Bank teams to ensure incorporation of international good practice. It built on the government's approach to disaster risk recovery, and involved consultation with a broad range of stakeholders including the donor community and government counterparts. The policy program was fully integrated into the relevant agencies' development programs, helping to ensure ownership of the reform agenda and results monitoring. The parallel technical assistance provided targeted support in specific reform areas. Borrower representatives expressed strong appreciation of the World Bank's technical expertise in the areas of disaster risk reduction and management and DRFI in particular. Better communication between the World Bank team and government counterparts could perhaps have avoided the misunderstanding over the purposes and use of the CAT DDO resources.

### **Quality of Supervision**

5.10 Quality of supervision is rated **satisfactory**.

5.11 The World Bank had two task team leaders during program implementation (the second task team leader took over a year after approval). Both had deep knowledge of and experience with DRRM projects. World Bank staff supervised the project and monitored its progress toward the policy matrix goals at least semi-annually, along with the associated technical assistance supported by the GFDRR. The baseline data were immediately collected. The World Bank team maintained a close policy dialogue with the government and relevant stakeholders, as well as with the World Bank Treasury Department and the GFDRR. Implementation Status and Results reports were filed regularly to document progress.

## Borrower Performance

5.12 Borrower performance is rated **satisfactory**.

5.13 The government showed strong commitment to its DRRM agenda and the program objectives. The DOF effectively coordinated the various agencies involved, which for the most part stayed on track for implementing the agreed-upon programs. Only the OCD fell behind with the deployment of the PMESD, but it showed persistence in resolving challenges to implementation. As of the IEG mission, some progress has been made toward putting the system in action. As the CAT DDO policy program drew from the various agencies' regular programs funded by internal budget, the DRM capacity-strengthening momentum was maintained after the CAT DDO resources had been disbursed, and continued beyond the loan's closing date.

## Monitoring and Evaluation

5.14 Monitoring and evaluation (M&E) is rated **modest**.

5.15 **M&E design.** M&E design was straightforward, drawing lessons from previous CAT DDOs implemented elsewhere. The policy program presented a plausible results chain, linking policy actions to expected outputs and outcomes. However, the indicators for measuring policy progress focused exclusively on outputs, and thus were inadequate for measuring achievement of the objectives. Overall, the selected indicators, all measurable with proper baselines and targets, were modest. The fact that the CAT DDO was the first loan of its kind in the Philippines (and in Asia) partially explains the choice of the indicators – both the World Bank and the government wanted them to be achievable.

5.16 The DOF and the NDRRMC shared monitoring and M&E responsibilities. A Technical Working Group consisting of the CAT DDO stakeholder agencies and other oversight and line agencies functioned as a platform for coordination and monitoring of the policy actions during project implementation.

5.17 **M&E Implementation.** Monitoring and reporting of progress made by the different agencies was conducted through their own systems, thereby avoiding duplication in what could have been a difficult situation, given the number of agencies involved. The World Bank's supervision was regular, with missions and ISRs completed on time and covering all issues.

5.18 **M&E Utilization.** There is no evidence that the project's M&E influenced its implementation beyond results reporting. The data informed subsequent Bank engagement on disaster risk reduction and DRFI, including the second CAT DDO.

## 6. Lessons

6.1 **The CAT DDO proved to be a useful instrument in the Philippines for achieving the dual objectives of supporting fundamental DRRM reforms and providing quick-release financing for disaster recovery and reconstruction.** The

CAT DDO's strength stemmed from its being a budget support operation, which ensured attention of the finance ministry and other top level policy makers to DRRM issues. This was critical for getting all the relevant agencies on board and to integrate DRRM considerations into their regular work programs. Through this operation, the instrument has shown its ability to change the dynamics of the World Bank's dialogue with the country, facilitating a deeper and more comprehensive discussion about DRRM and allowing the World Bank to contribute its expertise at the macro level. At the same time, the CAT DDO, with a disbursement trigger, guaranteed access to financing when funds were most needed.

**6.2 As with all policy reforms, in-depth analytical work and well-targeted technical assistance were critical for achieving results.** In the decade before the approval of the CAT DDO, the World Bank and other agencies conducted several studies on the hazard profile and exposure of the Philippines and the social impacts of tropical storms on the poor. The recommendations from these studies, along with those from cross-country analysis of comprehensive DRM frameworks and actions, formed the basis for the design of this operation. Program implementation benefited tremendously from the GFDRR-funded technical assistance, which was prepared in parallel with activities fully aligned with the reform actions supported under the CAT DDO. The World Bank's comparative advantage in disaster risk financing was consistently recognized by all stakeholders consulted for this evaluation.

**In the context of this operation, there were multiple confusions over the purposes of a CAT DDO and proper use of the loan proceeds.** Both the World Bank and the government understood that the contingent line of credit was to be used as partial financing to meet the immediate funding needs in the aftermath of severe natural disasters, but the government also stressed the budget support nature of the loan. To some extent, this explained the difference in expectations between the World Bank and the government as to how the CAT DDO resources should be used. In addition, there were inconsistencies between World Bank literature on the different applications of the various disaster risk financing instruments and the Program Document of this operation, regarding the types of disasters for which the CAT DDO resources were intended. Further clarification in World Bank documents and better communication between the World Bank and the counterparts would improve program design and facilitate its implementation.

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<sup>1</sup> Center for Research on the Epidemiology of Disasters, UNISDR, “The Human Cost of Weather-Related Disasters, 1995-2015.

<sup>2</sup> UNISDR 2015 Global Assessment Report on Disaster Risk Reduction.

<sup>3</sup> UNISDR Prevention Web Statistics <http://www.preventionweb.net/countries/phl/data/>, 10-year moving average from 2005–14.

<sup>4</sup> The Philippines Catastrophe Risk Profile; AIR/ADPC on behalf of DoF-IFG, 2014, and World Bank Philippine Country Partnership Strategy (FY15–18), viii.

<sup>5</sup> UNRISD. <http://www.gmanetwork.com/news/story/545760/scitech/weather/philippines-4th-most-disaster-prone-country-in-the-world-un-report#sthash.ByK4SzkC.dpuf>.

<sup>6</sup> Charlotte Benson, *Mainstreaming Disaster Risk Reduction into Development: Challenges and Experience in the Philippines*, ProVention Consortium, March 2009.

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<sup>9</sup> Knowledge for Development Centers are schools, policy and research institutions in the Philippines that work in partnership with the World Bank to promote knowledge sharing about development issues.

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<sup>13</sup> The Program Document (p. 19) listed the relevant analytical work that underpinned the design of this operation (World Bank 2011b).

<sup>14</sup> Ondoy/Pepeng World Bank Post Disaster Needs Assessment. No Date. <http://hdl.handle.net/10986/2776>

<sup>15</sup> NDRRMC, Final Report on the Effects and Emergency Management: Tropical Storm Sendong (Washi) Status of Early Recovery Programs in Region X, 10 February, 2012 [http://www.ndrrmc.gov.ph/attachments/article/1347/Final\\_Report\\_on\\_the\\_Effects\\_and\\_Emergency\\_Management\\_re\\_Tropical\\_Storm\\_SENDONG\\_\(WASHI\)\\_Status\\_of\\_Early\\_Recovery\\_Programs\\_in\\_Region\\_X\\_is\\_sued\\_10FEB2014.pdf](http://www.ndrrmc.gov.ph/attachments/article/1347/Final_Report_on_the_Effects_and_Emergency_Management_re_Tropical_Storm_SENDONG_(WASHI)_Status_of_Early_Recovery_Programs_in_Region_X_is_sued_10FEB2014.pdf)

<sup>16</sup> NDRRMC, Situation Report No. 88 on the Effects of Typhoon Yolanda (Haiyan), 10 January, 2014 [http://www.ndrrmc.gov.ph/attachments/article/1329/Effects\\_of\\_Typhoon\\_YOLANDA\\_\(HAIYAN\)\\_SitRep\\_No\\_88\\_10JAN2013\\_0600H.pdf](http://www.ndrrmc.gov.ph/attachments/article/1329/Effects_of_Typhoon_YOLANDA_(HAIYAN)_SitRep_No_88_10JAN2013_0600H.pdf)

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<sup>17</sup> These plans are meant to provide analysis of hazards and vulnerability and to design and implement programs for disaster prevention/mitigation, preparedness, response, and rehabilitation and recovery. They are prepared by Local Disaster Risk Reduction and Management Office and approved, monitored and evaluated by Local Disaster Risk Reduction and Management Council (RA 10121 Section 11)

<sup>18</sup> [http://dilg.gov.ph/PDF\\_File/reports\\_resources/dilg-reports-resources-20151014\\_2624d5db9a.pdf](http://dilg.gov.ph/PDF_File/reports_resources/dilg-reports-resources-20151014_2624d5db9a.pdf)

<sup>19</sup> Commission on Audit, “Assessment of Disaster Risk Reduction and Management (DRRM) at the Local Level,” 2014b, 17.

<sup>20</sup> [http://www.ndrrmc.gov.ph/attachments/article/2926/Y\\_It\\_Happened.pdf](http://www.ndrrmc.gov.ph/attachments/article/2926/Y_It_Happened.pdf), November 2014, p. 28.

<sup>21</sup> This action was funded by a US\$0.5 million grant from the GFDRR. Partners were the Office of Civil Defense (OCD) and the National Disaster Risk Reduction and Management Council (NDRRMC); Department of Budget and Management; and NEDA. Part of the grant funded the development of the project monitoring and evaluation system, along with training for the OCD to manage and operate the system. The NDRRMC developed a monitoring system to track disaster-related financing. According to the Global Facility for Disaster Risk Reduction, to enhance NDRRMC’s monitoring capacity, an online software platform called the Project Monitoring and Evaluation System for DRM (PMESD) was designed in 2011 and development was completed in September 2013. Training was provided to the Office of Civil Defense to manage and operate the system on behalf of the NDRRMC. Fundamental challenges pertaining to OCD’s organizational capacity constrained the full operationalization of PMESD. Another contributing factor was the UN Development Programme’s development of a similar system called eMPATHY (e-Management Platform for Accountability and Transparency Hub).

<sup>22</sup> The United Nations Office at Geneva, Regular Press Briefing Service, 5 December 2014,

[http://www.unog.ch/unog/website/news\\_media.nsf/%28httpNewsByYear\\_en%29/5435489DF4BAFF91C1257DA500470450?OpenDocument](http://www.unog.ch/unog/website/news_media.nsf/%28httpNewsByYear_en%29/5435489DF4BAFF91C1257DA500470450?OpenDocument), PAD, CAT DDO 2.

<sup>23</sup> In the past, they had to be designed for the strongest rainfall in a 25-year period. Now they have adopted a 50-year flood return period.

<sup>24</sup> World Bank, Program Document for the Philippine Disaster Risk Management DPL with a CAT DDO 2.

<sup>25</sup> Ongoing Global Facility for Disaster Risk Reduction projects in the Philippines include: Support for the Disaster Risk Financing and Insurance Strategy, Enabling Scaled-Up Risk Reduction Investments, Support to Institutionalization of Post-Yolanda Recovery, and Support for the Philippine Disaster Risk Reduction and Management Agenda. (.<https://www.gfdr.org/sites/gfdr/files/region/PH.pdf>)

## Appendix A. Basic Data Sheet

### DISASTER RISK MANAGEMENT DEVELOPMENT LOAN WITH A CAT DDO (P125943)

#### Key Project Data (amounts in US\$ million)

	<i>Appraisal estimate</i>	<i>Actual or current estimate</i>	<i>Actual as % of appraisal estimate</i>
Total project costs	500.00	497.50	99.5%
Loan amount	500.00	497.50	99.5%

#### Actual Disbursements

	<i>FY11</i>
Appraisal estimate (US\$M)	500.00
Actual (US\$M)	497.50
Actual as % of appraisal	99.5%
Date of final disbursement: December 28, 2011	

#### Project Dates

	<i>Original</i>	<i>Actual</i>
Initiating memorandum	03/16/2011	03/16/2011
Negotiations	06/07/2011	06/07/2011
Board approval	09/13/2011	09/13/2011
Signing	09/23/2011	09/23/2011
Effectiveness	12/22/2011	12/15/2011
Closing date	10/31/2014	10/31/2014

## Staff Time and Cost

Stage of Project Cycle	Staff Time and Cost (Bank budget only)	
	Staff Weeks (number)	US\$ 000s (including travel and consultant costs)
<b>Lending</b>		
FY11	21.56	96,255.56
FY12	2.18	5,135.43
<b>Total:</b>	<b>23.74</b>	<b>101,360.99</b>
<b>Supervision</b>		
FY12	12.33	70,123.15
FY13	10.25	36,080.95
FY14	12.59	38,981.90
FY15	13.32	49,360.65
<b>Total:</b>	<b>48.49</b>	<b>194,546.65</b>

## Task Team Members

Name	Title (at time of appraisal and closure, respectively)	Unit	Responsibility/Specialty
<b>Lending</b>			
Zoe Elena Trohanis		GSURR	Senior Urban Specialist
Issam Abousleiman		LCCCO	Country Manager
Victor Dato		GTIDR	Senior Infrastructure Specialist
Patricia Fernandes		GSURR	Senior Social Development Specialist
Stephen Paul Hartung		GGODR	Financial Management Specialist
Demilour Reyes Ignacio		GWADR	Program Assistant
Minneh Mary Kane		LEGES	Lead Counsel
Eric LeBorgne		GMFDR	Lead Economist
Miguel Navarro Martin		FABBK	Lead Financial Officer
Christopher T. Pablo		GSURR	Senior Urban Specialist
Maria Loreto Padua		GSURR	Senior Social Development Specialist
Roberto Antonio F. Rosadia		GHNDR	Health Specialist
Tomas Sta. Maria		GGODR	Financial Management Specialist

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Zuzana Stanton-Geddes	GSURR	Operations Analyst
Matthew Stephens	GSURR	Senior Social Development Specialist
Karl Kendrick Tiu Chua	GMFDR	Senior Economist
Josefo Tuyor	OPSOR	Senior Environmental Specialist
Catherine Vidar	GSURR	Disaster Risk Management Specialist
Yan F. Zhang	GSURR	Senior Urban Economist
Ivailo Ivorski	GMFDR	Practice Manager
Christoph Pusch	GSURR	Lead Disaster Risk Management Specialist
Jose C. Joaquin Toro Landivar	GSURR	Senior Disaster Risk Management Specialist
<b>Supervision</b>		
Jolanta Kryspin-Watson	GSURR	Senior Disaster Risk Management Specialist
Christopher C. Ancheta	GWADR	Senior Sanitary Engineer
Abigail Baca	GSURR	Infrastructure Specialist
Victor Dato	GTIDR	Senior Infrastructure Specialist
Demilour Reyes Ignacio	GWADR	Operations/Team Support
Maria Loreto Padua	GSURR	Social Development
Hector Ibarra Pando	FABBK	Treasury
Lynette Perez	GEDDR	Education
Roberto Antonio F. Rosadia	GHNDR	Health
Artesa Saldivar-Sali	GSURR	Resilient Infrastructure
Benedikt Lukas Signer	GFMDR	Disaster Risk Finance and Insurance
Matthew Stephens	GSURR	Social Development
Mari Anne Trillana	GWADR	Operations/Team Support
Catherine Vidar	GSURR	Disaster Risk Management
Felizardo Virtucio Jr.	GFADR	Agriculture
Deanna Therese Villacin	Consultant	
Cameron Wilson	Consultant	

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## Appendix B. Prior Actions and Expected Outcomes

	Prior actions	Outcomes by 2014	Outcome Indicators
<p><b>Strengthen the institutional capacity for disaster risk management efforts</b></p>	<p>1. Enactment of the 2010 Disaster Risk Reduction and Management Act (Republic Act No. 10121) of May 2010. This law seeks to mainstream risk reduction into development policies and processes. Focus has been expanded from ex-post actions and funding for emergency response, relief and recovery to include ex-ante actions and funding for risk reduction, preparedness, and prevention.</p>	<p>Local governments have increased capacity to manage the impacts of natural disasters in terms of preparedness, risk reduction and mitigation measures</p>	<p>DILG supports the establishment of functional DRRM units or offices, from 4 to 14 provinces</p> <p>NDRRMC develops a monitoring system to track disaster-related financing; updated guidelines on the use of LGU Local Disaster Risk Reduction and Management Funds (LDRRMF) are issued.</p> <p>NDRRMC has rolled out training programs for government authorities to conduct post-disaster needs assessments and emergency preparedness drills.</p>
<p><b>Mainstream disaster risk reduction into development planning.</b></p>	<p>2. Adoption of the Strategic National Action Plan for Disaster Risk Reduction (Executive Order No. 888) of June 2010. This is a 10-year plan to achieve commitments made under the Hyogo Framework of Action.</p>	<p>Provincial level investments and key sectoral investments in health, transport and social development are more resilient to natural disasters.</p>	<p>Provinces have mainstreamed climate change adaptation and disaster risk reduction measures into their Provincial Development and Physical Framework Plans (PDPFP); from 0 to at least 30 provinces</p> <p>Disaster risk reduction measures are mainstreamed into at least three sectors: health, transport, and social development.</p> <p>HEALTH: DOH expands coverage of its Safe Hospitals Program in accordance with WHO guidelines by conducting audits of public and private health facilities in Metro Manila; from 25 to at least 100 health facilities</p> <p>TRANSPORT: The Department of Public Works and Highways (DPWH) retrofits and/or reconstructs bridges in Metro Manila, based on the results of structural audits; from 0 to at least 10 bridges.</p> <p>SOCIAL DEVELOPMENT: Government community development and social protection programs are enhanced to better address disaster risks; from 0 to 1,000 communities receive DRR training under 4Ps and</p> <p>KALAHI-CIDSS; 4 Field Offices are covered by a community-based post disaster response window.</p>
<p><b>Better manage the Government's fiscal exposure to natural hazard impacts</b></p>		<p>The Government reduces its fiscal exposure to natural disasters, measure by increased investments for preventive measures and expanded options for risk financing.</p>	<p>Department of Finance has prepared its catastrophe risk financing strategy.</p>

## Appendix C. List of Persons Met

<i>Name</i>	<i>Title</i>	<i>Organization</i>
Lesley Cordero		World Bank
Gerardo Bayugo	Undersecretary	Department of Health
Anthony B. Cu	Chief of Staff, Office for Policy and Health Systems	Department of Health
Gloria Balboa	Director	Department of Health
Aida Barcelona		Department of Health
Dr. Ivanhoe Escartin		Department of Health
Remedios Endencia	Director	National Economic and Development Authority
Eduardo Mariño	OIC of Fund Management Division	Bureau of Treasury
Catalina Cabral	Undersecretary	Department of Public Works and Highways
Agata Pawlowska	Portfolio and Operations Manager	World Bank
Yolanda Azarcon	Senior Operations Officer	World Bank
Leila Magda Rivera	Director	Public Expenditure Bureau, Department of Budget and Management
Stella Laureano	Director	
Vilma Cabrera	Undersecretary	Department of Social Welfare and Development, Central Office
Beth Castro	LGOOV and Acting Division Chief	Department of Interior and Local Government
Teresa Concepcion	LGOOV	Department of Interior and Local Government
Paul Montano	LGOOIV	Department of Interior and Local Government
Hayato Nakamura	Project Formulation Advisor (Disaster Management), Poverty Reduction Section, Human Security Group	Japan International Cooperation Agency
Kessy Reyes	Program Officer	Japan International Cooperation Agency
Catherine Palanca	Senior Program Officer	Japan International Cooperation Agency
Lenie Alegre	IT Staff	Operations Center, Office of the Civil Defense,
Richard Bolt	Country Director	Asian Development Bank
Kelvin Art T. Ofrecio	OIC, Communications, Electronics and Information System Division	NDRRMC

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Lenie Duran Alegre	Chief, NDRRM Services and Head Secretariat	NDRRMC
Donalin Minimo	Chief, OIC	NDRRMC
Zoe Trohanis	Senior Disaster Risk Management Specialist, TTL at approval	The World Bank
Artessa Saldivar-Sali,	Municipal Engineer	The World Bank
Abhas Jha	Practice Manager	The World Bank
Hector Ibarra	Lead Financial Officer	The World Bank
Francis Ghesquiere	Manager, DRM Practice Group & GFDRR Secretariat	The World Bank
Rosalia de Leon	Alternate Executive Director: EDS15	The World Bank
Miguel Navarro Martin	Lead Financial Officer, WB Treasury	The World Bank
Concepcion Aisa Otin	Senior Financial Officer	The World Bank

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