THE FIFTH

NATIONAL REPORT

to the

CONVENTION ON BIOLOGICAL DIVERSITY

REPUBLIC OF THE PHILIPPINES

2014

Author

This Report was prepared and edited by the Department of Environment and Natural Resources-Biodiversity Management Bureau (formerly Protected Areas and Wildlife Bureau) in partnership with the Ateneo School of Government. This Report is based on data generated from the multi-stakeholder national and regional consultations on the updating of the Philippine Biodiversity Strategy and Action Plan, and various reports and documents from relevant projects and programs.

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The Fifth National Report to the Convention on Biological Diversity

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4NR	Fourth National Report
5NR	Fifth National Report
ADMU	Ateneo de Manila University
ALOS-AVNIR	Advanced Land Observing Satellite (ALOS) Advanced Visible and Near Infrared Radiometer (AVNIR)-
AO	Administrative Order
ASEAN	Association of Southeast Asian Nations
AZE	Alliance for Zero Extinction
BAI	Bureau of Animal Industry
BAS	Bureau of Agricultural Statistics
BFAR	Bureau of Fisheries and Aquatic Resources
BioFin	Building Transformative Policy and Financing Frameworks to Increase Investment in Biodiversity Management
BMB	Biodiversity Management Bureau
BOD	Biological Oxygen Demand
BPI	Bureau of Plant Industry
BPP	Biodiversity Partnerships Project
BWISER	Biodiversity and Watersheds Improved for Stronger Economy and Ecosystem Resilience
CBD	Convention on Biological Diversity
CCC	Climate Change Commission
CEPA	Communication Education and Public awareness
CHM	Clearing-House Mechanism
CITES	Convention on International Trade in Endangered Species of Wild Fauna and Flora
CLUP	Comprehensive Land Use Plans
CoP	Conference of Parties
CSR	Corporate Social Responsibility
CTI	Coral Triangle Initiative
DA	Department of Agriculture
DAO	Department Administrative Order
DBM	Department of Budget Management
DENR	Department of Environment and Natural Resources
DepEd	Department of Education
DFA	Department of Foreign Affairs
DMC	Department Memorandum Circular
DO	Dissolved Oxygen
DSWD	Department of Social Welfare and Development
EAFM	Ecosystems-Based Approach Fisheries Management
EcoFish	Ecosystems Improved for Sustainable Fisheries Project
ECC	Environmental Compliance Certificate
EDC	Energy Development Corporation
EMB	Environmental Management Bureau
ENR	Environment and Natural Resources
ENRAP	Environment and Natural Resources Accounting Project
FO	Executive Order
FAA	Foreign Assistance Act
FAO	Food and Agriculture Organization
FASPO	Foreign Assisted and Special Projects Office
FGDs	Focus Group Discussions
FMB	Forest Management Bureau
FPIC	Free and Prior Informed Consent
FPAPG	Focal Point Agency
GDP	Gross Domestic Product

GEF	Global Environment Facility
GIZ	Gesellschaft für Internationale Zusammenarbeit
HLURB	Housing and Land Use Regulatory Board
IAS	Invasive Alien Species
IBAs	Important Bird Areas
ICCAs	Indigenous Community Conservation Areas
ICRM	Integrated Coastal Resource Management
ICRMP	Integrated Coastal Resources Management Project
IEC	Information, Education and Communication
IKSP	Indigenous Knowledge, Systems and Practices
IP	Indigenous People
IPAF	Integrated Protected Areas Fund
IPRA	Indigenous Peoples Rights Act
IUCN	International Union for the Conservation of Nature and Natural Resources
KBA	Key Biodiversity Area
LCCAs	Local Community Conserved Areas
LGUs	Local Government Units
LLDA	Laguna Lake Development Authority
LPPCHEA	Las Piñas – Paraňaque Critical Habitat Ecotourism Area
MDGs	Millennium Development Goals
MEAs	Multilateral Environmental Agreements
METT	Management Effectiveness Tracking Tool
MGB	Mines and Geosciences Bureau
MKBA	Marine Key Biodiversity Areas
MPA	Marine Protected Area
NAMRIA	National Mapping and Resource Information Authority
NBSAP	National Biodiversity Strategy and Action Plan
NCCAP	National Climate Change Action Plan
NCIP	National Commission on Indigenous Peoples
NEDA	National Economic Development Authority
NESS	National Ecotourism Strategy and Action Plan
NewCAPP	New Conservation Areas in the Philippines Project
NESCC	National Framework Strategy on Climate Change
NGO	Non-governmental organization
NGP	National Greening Program
NIPAS	National Integrated Protected Areas System
NISSAP	National Invasive Species Strategy and Action Plan
NLUP	National Land Use Plan
NSCB	National Statistical Coordination Board
PA	Protected Areas
PAMB	Protected Area Management Board
PAME	Protected Area Management Effectiveness
PAO	Public Affairs Office
PAR	Protected Area Recognition
PAWB	Protected Areas and Wildlife Bureau
PBCP	Philippine Biodiversity Conservation Priorities
PBSAP	Philippine Biodiversity Strategy and Action Plan
PCSD	Palawan Council for Sustainable Development
PCW	Philippine Council for Women
PDP	Philippine Development Plan
PEFI	Philippine Eagle Foundation Inc.
PEPP	Philippine Environment Partnership Program
PES	Payment for Environmental Services
PFS	Philippine Forestry Statistics
PIC	Prior Informed Consent
POs	Peoples' Organizations
PNSDW	Philippine National Standard for Drinking Water
PPSRNP	Puerto Princesa Subterranean River National Park

PP	Presidential Proclamation
PPSO	Planning and Policy Studies Office
P/P/A	Programs/Projects/Activities
PSBR	Pressure-State-Benefits-Response
PSY	Philippine Statistical Yearbook
RA	Republic Act
REDD	Reducing Emissions from Deforestation and Forest Degradation
RPEC	Rules of Procedure for Environmental Cases.
RPOA	Recruitment Process Outsourcing Association
STREEM	Strengthening Coordination for Effective Environmental Management
SCTR	State of the Coral Triangle Report
SEEA	System of Environmental-Economic Accounts
SPOT	Satellite Pour l'Observation de la Terre
TEPO	Temporary Environmental Protection Order
TVPL	Taal Volcano Protected Landscape
UDP	Upland Development Program
UNCBD	United Nations Convention on Biological Diversity
UNCCD	United Nations Convention to Combat Desertification
UNDP	United Nations Development Programme
UNESCO	United Nations Educational, Scientific and Cultural Organization
UNEP	United Nations Environment Programme
UNFCCC	United Nations Framework Convention on Climate Change
USAID	United States Agency for International Development
WAP	Wetlands Action Plan
WAVES	Wealth Accounting and Valuation of Ecosystems Services
WCMC	World Conservation Monitoring Center
WQ	Water Quality

Executive Summary

Symmetry in strategies and synergy of efforts at the national and local levels are key goals that the Philippines has continuously endeavored to achieve as it aims to give flesh to its own action plan, the Strategic Plan for Biodiversity 2011-2020 and the 2020 Aichi Biodiversity Targets.

Since the 4th National Report to the Convention on Biological Diversity was published in 2009, the Philippines has taken steps to strengthen political, legal and institutional responses to the problems of resource depletion and exploitation even as it takes on the challenges of climate change, cross-border smuggling and inequitable land use. Much remains to be done to harmonize and monitor these efforts, however and to ensure that national targets and local objectives are in synch.

The 5th National Report to the CBD captures the efforts introduced at different stages of governance to create a more cohesive approach in addressing threats to the country's biodiversity- at the ecosystems, species and genetic levels. The Report, which covered actions and changes initiated from the period of 2009-2013, analyzes the value and robustness of these initiatives, as well as the deficiencies and gaps that derail their effective implementation.

Gathering of information for this report was anchored on regional and national consultations, which were conducted in line with the government's aim to also update its Philippine Biodiversity Strategy and Action Plan. Having multisectoral inputs signals a positive direction towards making the processes of evaluation and assessment participatory, with the ultimate aim of increasing the credibility and extensiveness of the report.

The report delved on how different branches of the government – from the executive to the judicial branch – have come up with actions to enforce biodiversity conservation and sustainable use.. President Benigno Aquino III has issued executive orders that aimed to curb deforestation and prohibit mining activities in protected areas. The Supreme Court introduced the Writ of Kalikasan, a legal remedy for citizens who aimed to stop projects and programs that could harm the environment.

It also showed how partnerships between and among the national and local governments, civil society organizations, academic and research institutions and the private sector helped shape conservation programs for rivers and forests, with the provision of economic and livelihood benefits also incorporated in the design of these projects. Injecting energy and resources to this partnership is critical in the successful implementation of the National Greening Program, the passage of the Land Use bill into law and the inclusion of biodiversity conservation and sustainable use in local land use plans. Coordination, communication and resource-sharing between these actors as well as other stakeholders is also vital in making the National Biodiversity Strategy and Action Plan work.

There is also recognition of the importance of traditional knowledge and the role of indigenous peoples and local communities in the development of biodiversity-friendly businesses in conserving critical habitats and protected areas. What is needed is the right mix of incentives and an exhaustive exploration of a possible system for valuating and financing biodiversity to encourage similar efforts.

A review of issues affecting sectors and areas of biodiversity showed improvements such as an increase in mangrove cover, the discovery of new species, the development of river basin master plans and the emergence of additional key biodiversity areas, and indigenous and local community conservation areas. Gains, however, have yet to fully cut across sectors and themes – three of which, urban biodiversity, agrobiodiversity, and genetic resources have yet to be fully studied, assessed and contextualized.

The lack of nationally-agreed targets and indicators, which has already been raised in the 4th report, has also posed problems to identifying trends and attaining an accurate measurement of developments, but the updated Philippine Biodiversity and Strategy Action Plan report has taken steps to address this.

Persistent problems affecting biodiversity include overexploitation, the existence of invasive alien species, pollution, habitat loss and degradation and climate change. Building the capacity of local government units in fostering biodiversity-related programs and integrating them in economic and development plans is essential to creating a holistic approach in combating these drivers of biodiversity loss.

Mainstreaming policies and programs , increasing the awareness of stakeholders and establishing accounting and monitoring mechanisms are also necessary in securing more funding and pushing the passage of policies for biodiversity conservation.

Actions for biodiversity conservation and sustainable use must also be linked with disaster risk reduction, climate change mitigation and adaptation. These could help the citizenry prepare for the impacts of extreme weather events such as a decrease in natural resources and its corresponding socioeconomic effects.

Introduction

Article 26 of the United Nations Convention on Biological Diversity (UN CBD) requires the Contracting Parties to periodically present reports on measures that they have taken to implement the Convention's provisions. These reports are essential tools for the Conference of the Parties and the Convention Secretariat to monitor and review the implementation of the Convention towards the preparation of a Global Biodiversity Outlook (CBD, Guidelines for the 5th National Report or 5NR).

The Philippines, as member- party to the CBD, is mandated to submit by 31 March 2014 its 5NR to chart the country's progress towards meeting the Strategic Plan for Biodiversity 2011-2020, including the Aichi Biodiversity Targets.

The 5NR mainly covers progress made for the period from 2009 to 2013 and proceeds from accomplishments reported in the Fourth National Report (4NR), submitted in 2009, which focused on the country's progress toward meeting the 2010 Biodiversity Target: "Achieving by 2010 a significant reduction of the current rate of biodiversity loss at the global, regional and national level as a contribution to poverty alleviation and to the benefit of all life on earth." As part of its Conclusions, the 4NR identified the gaps and recommendations in the country's efforts to meet the 2010 biodiversity target. The recommendations highlighted the need for policy action, strengthened enforcement of environmental laws, national baselines, targets and indicators. Some of these recommendations have been met since the 4NR was submitted.

The CBD has provided guidelines on the preparation of the 5NR, particularly ensuring that concerned stakeholders and relevant activities, projects and programs from the last reporting period (4th National Report) up to February 2014 are incorporated in the National Report. The narrative report is thus divided into three main parts.

Chapter I presents the updates on the changes in the status and trends of biodiversity since the 4NR was submitted. The main threats to biodiversity or causes of these negative changes will also be identified, as well as the impacts these changes have had on ecosystem services and the socio-cultural lives of people and communities.

Chapter II identifies the country's biodiversity targets and how these are incorporated in and implemented through the national biodiversity and action plan. Updates on the implementation of the CBD since the submission of the 4NR are provided, with particular emphasis given on the mainstreaming of biodiversity through the national biodiversity strategy and action plan in various strategies, plans and programs.

Chapter III illustrates the progress made towards achieving both the national biodiversity targets and Aichi Biodiversity Targets, or the goals that form a fundamental part of CBD's Strategic Plan for Biodiversity 2011-2020. The chapter also discussed how these achievements have contributed towards the realization of the Millennium Development Goals (MDG). The conclusion of the report highlights the lessons learned and the remaining challenges, along with the recommendations for the enhanced implementation of the Convention at the national, regional and global levels.

The preparation of this report is unlike those of the previous reports. It was prepared simultaneously with the updating of the Philippines Biodiversity Strategy and Action Plan (PBSAP) that seeks to address the 2020 Strategic Plan on Biodiversity and the Aichi Biodiversity targets. The PBSAP regional and national consultations/ workshops helped generate information from multi-stakeholder groups (e.g. national government agencies, local government units, civil society organizations, private sector, and local communities) from all over the country.

The results of the consultations/workshops supplemented by key informant interviews and secondary data (e.g. project reports, government annual reports, planning, development and action plans, etc.) validate the fact that even if the Philippines is still updating its PBSAP, it is in effect already implementing some measures to meet the Aichi Targets.

The Department of Environment and Natural Resources- Biodiversity Management Bureau (DENR-BMB), formerly Protected Areas and Wildlife Bureau or PAWB, as the Focal Point Agency of the Philippine Government to the CBD, is in charge of leading its preparation.

CHAPTER 1

Biodiversity status, trends and threats and Implications for human well-being

1.1 Importance of Biodiversvsity

As an archipelagic country with a total coastline of 37,008 km and with more than 60% of the country's total population living in coastal areas, many small-scale artisanal, subsistence and commercial fishers depend on coastal and marine ecosystems like mangroves, coral reefs and their associated ecosystems as a source of food and livelihood.

The forestry sector continues to play an important role in our history and provide vital assets for our social, environmental and economic well-being.[1] It serves as a source of timber and other raw material inputs to wood-related and wood-intensive activities and delivers ecosystem services that have not been adequately valued. The ENR sector also produces other raw materials that are vital for the industry and services sectors.

However, biodiversity's true economic contribution is not fully accounted for as it does not value the ecosystem services that it provides, e.g. nutrient dispersal and cycling, climate regulation, water and power supply, flood control, pest and disease control, coastal protection, recreational, educational and aesthetic values. The country needs to invest in conserving and valuing natural capital, which if used and developed sustainably, can provide a good foundation for inclusive economic growth and human well-being.[2]

For many years, the environment and natural resources (ENR) sector has contributed to the gross domestic product (GDP) by providing valuable, yet exhaustible resources such as agriculture and fisheries and forestry. Agriculture and fisheries are major drivers of the Philippine economy, with more than one-third of the country's population dependent on agriculture and fishing for a living.

The significance of biodiversity and ecosystem services to human well-being is immense given

Map 1. The Philippine Archipelago

the dependence of a majority of 100 million Filipinos on natural resources that provide them life and livelihood. Biodiversity and ecosystem services sustain development and development impacts biodiversity and ecosystem services. Both human well-being and long-term economic success depend on these services[3]

(Fig. 2). This relationship needs to be internalized by many Filipinos and mainstreamed by key

1 The Megadiversity concept was introduced by Conservation International in 1998 to highlight biologically remarkable countries and prioritize conservation efforts in these areas. It is a call for action to ensure the survival of all forms of life on earth

2 Reid, W. et al. Millennium *Ecosystem Assessment. Ecosystems and Human Well-being -- Synthesis*. Washington: World Resources Institute, 2005.

3 Ranganthan, J. et al. *Ecosystem Services: A Guide for Decision Makers*. Washington: World Resources Institute, 2008. Accessed February 15, 2014. http://www.wri.org/sites/default/files/pdf/ecosystem_services_guide_for_decisionmakers.pdf

policy and decision makers into national and local development planning and practices.

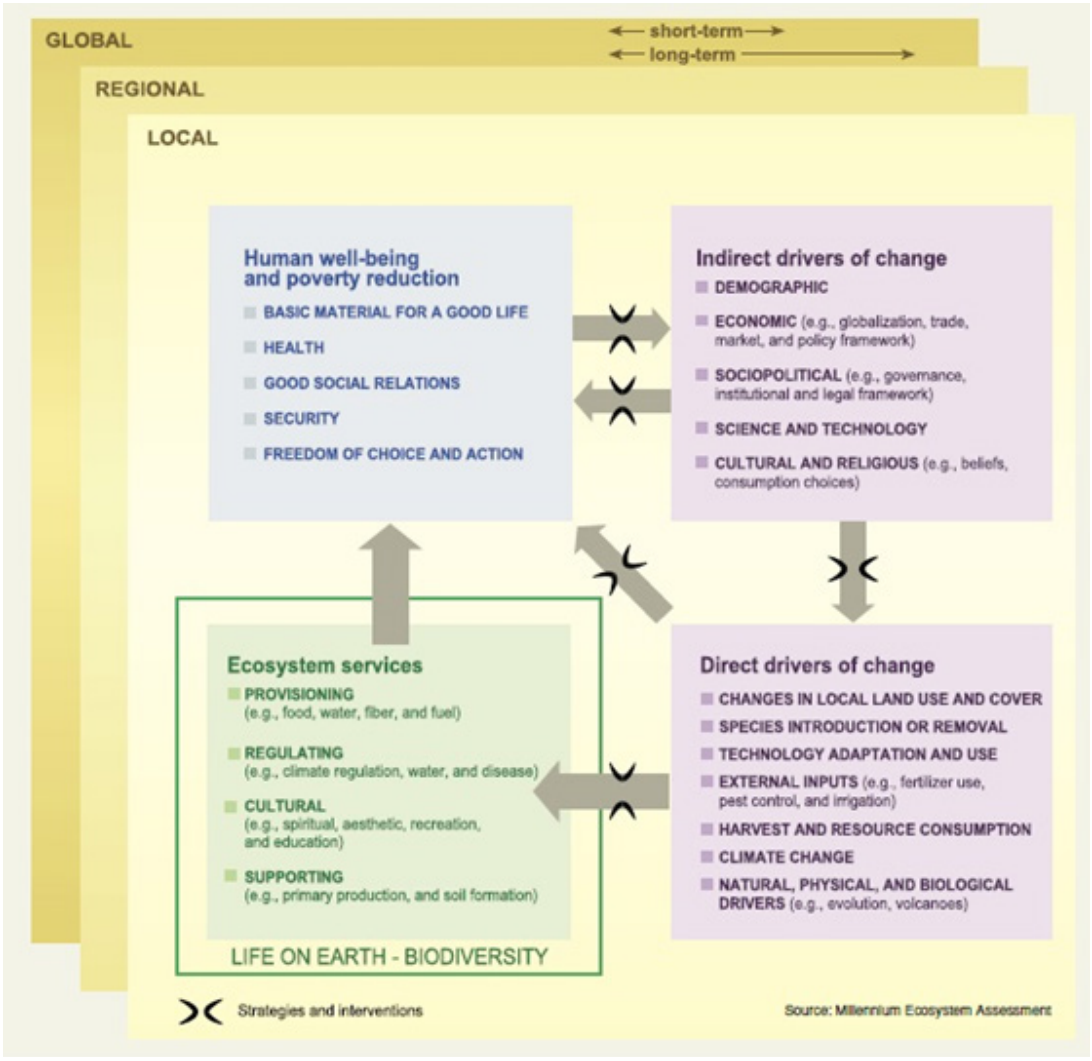
The Philippines is an island country in Southeast Asia located close to the tropical equator and the Pacific Ring of Fire (Map 1). Its location has made it prone to earthquakes and tropical storms, but has also blessed it with abundant natural resources making it a "biodiversity superstar", one of 18megadiversity countries in the world, that together, comprise more than two thirds of the planet's biological wealth[4] and natural capital (see Annex 1).

The diversity of ecosystems, species and genetic resources in the country is reflected in the richness of its biodiversity- from mountain forests to agricultural areas, freshwater systems, coastal and marine areas- and the ecosystem services they provide- provisioning, regulating, supporting and cultural (Fig.1)[5].

Figure 1. Ecosystem Services

Source: Millennium Ecosystem Assessment

Figure 2. Millennium Ecosystem Assessment Conceptual Framework of Interaction between Biodiversity, Ecosystem Services, Human Well-Being, and Drivers of Change.



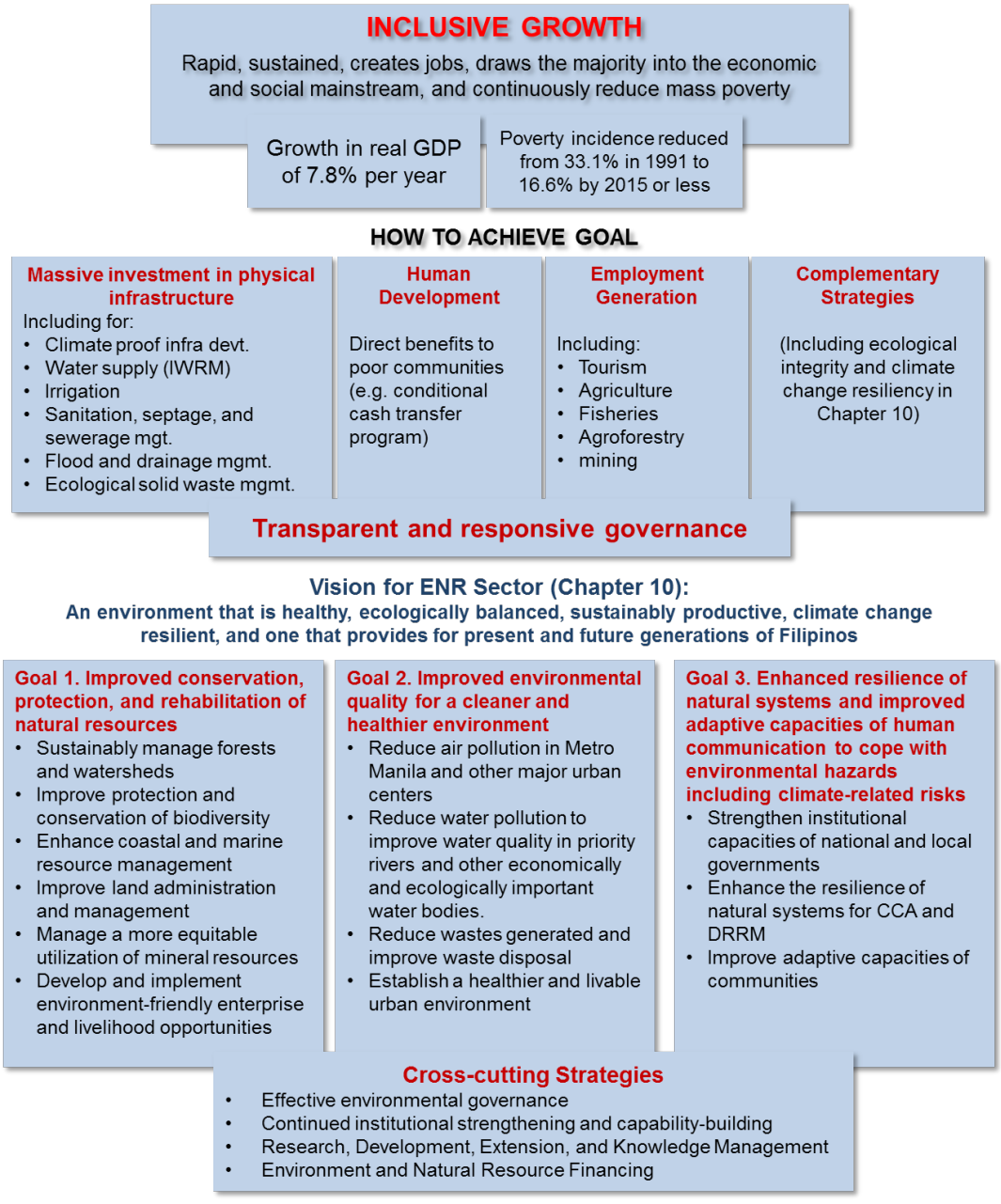
Source: WRI, 2005

4 Department of Environment and Natural Resources. "Increasing Global Recognition of Forests as Drivers of Socio-economic Growth Hailed." *DENR News and Features*, 20 March 2014. Accessed 21 March 2014. http://www.denr.gov.ph/news-and-features/latest-news/1743-increasing-global-recognition-of-forests-as-drivers-of-socio-economic-growth-hailed.html

5 La Viña, et. al. Conserving Tropical Forests and Biodiversity for Human Development and Inclusive Growth. FAA 118/119 Report Philippines Biodiversity and Tropical Forestry Analysis. United States Agency for International Development of the United States Government, 2011.

The Philippine Development Plan (PDP) 2011-2016, crafted under the leadership of President Benigno Aquino III, recognizes the value of the ENR sector and its contribution towards a national vision of "inclusive growth that benefits all Filipinos through higher economic growth of 7-8% per year and mass employment that reduces poverty and achieves the Millennium Development Goals (MDGs)." Three goals were identified to ensure sustainable and climate- resilient agriculture and fisheries, forestry and associated industry and services sectors that provide livelihood and job opportunities, namely: a) conservation, protection and rehabilitation of natural resources; b) improvement of environmental quality; and, c) enhancement of natural systems resiliency and improvement of adaptive capacities of vulnerable communities[6] (Fig.3).

Figure 3. Strategic framework for ENR conservation, protection and rehabilitation Chapter 10, PDP 2011-2016



Source: NEDA

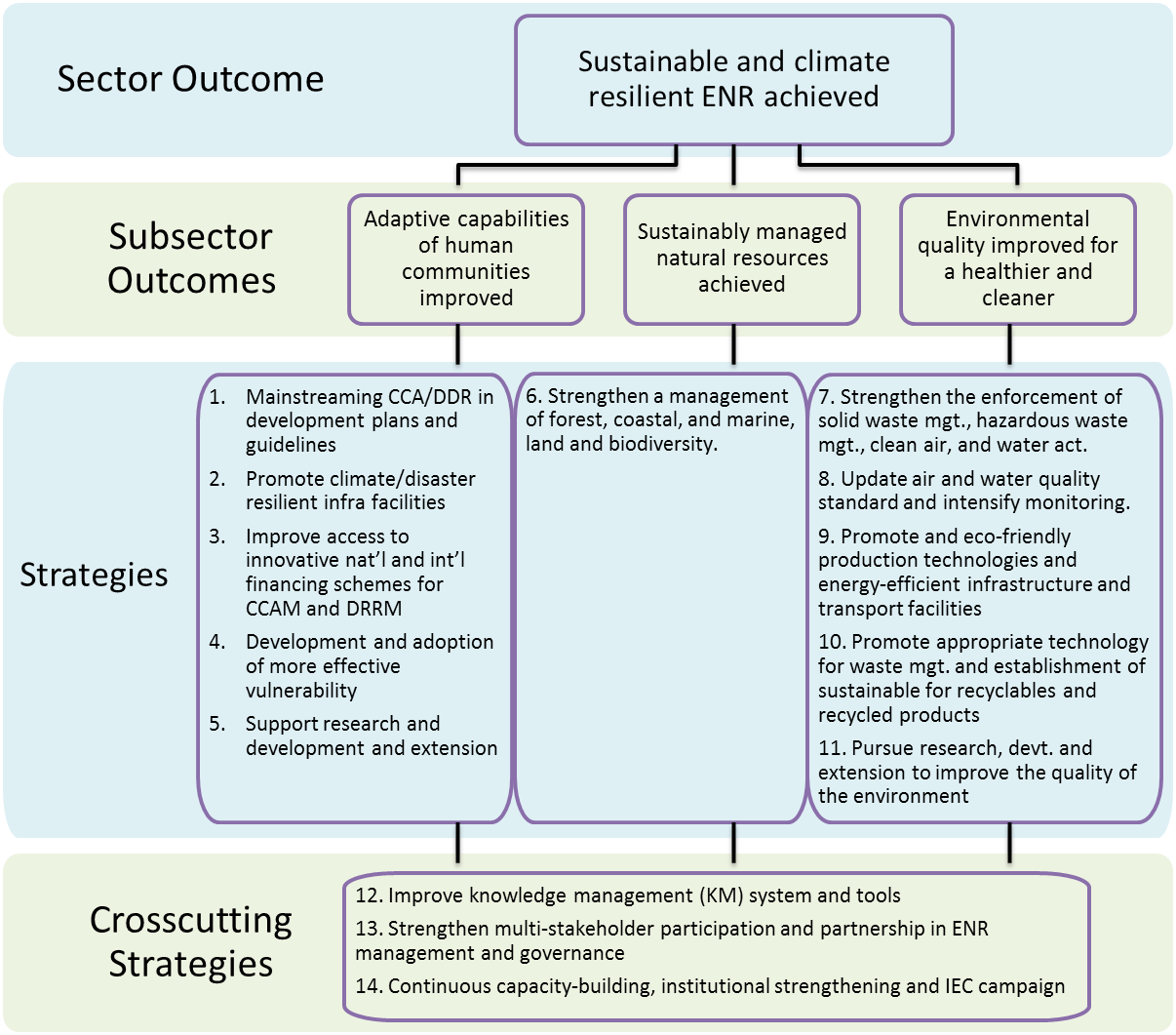
6 National Economic Development Authority. "Biodiversity Conservation in the Philippine Development Plan 2011-2016." Presentation given at the Visayas Regional Consultation for the Updating of the PBSAP, Cebu City, Philippines, 28 August 2013.

The midterm assessment of the PDP 2011-2016 conducted in 2014 identified continued challenges to the implementation of the plan in terms of policy, institutions and operations. Major policy challenges include the lack of a harmonized national land use policy, poor land management and administration, inadequate policies to ensure sustainable management of minerals, solid and hazardous wastes and absence of ENR valuation/accounting. In terms of institutions, there are prevailing concerns over conflicting and overlapping government mandates, weak water government and lack of manpower and expertise at the local level.

Operational challenges include inadequate tools and facilities to support ENR management, unavailability of timely, updated and integrated database and inadequate and non-sustained financing for ENR, climate change adaptation/ mitigation and disaster risk reduction and management. Based on the assessment, the strategic framework for the ENR sector has been updated to ensure sustainability and climate resilience (Fig. 4)[7].

Another continuing challenge is how stakeholders view biodiversity and ecosystem services in the context of national development. At present, appreciation of and discourse on biodiversity and ecosystem services are confined within the concept of environmental management. The PDP Chapter on ENR advocates for sustainable development and ecosystems approach, but needs to emphasize the interconnectedness of ENR with all sectors of government and society. It is imperative that this paradigm be internalized by all stakeholders and most especially by leaders across the development sectors.

Figure 4. Strategic framework for ENR sustainability and climate-resiliency, Updated PDP 2011-2016.



Source: NEDA

7 National Economic Development Authority. "Sustainable and Climate-resilient Environment and Natural Resources." Presentation given at the Meeting of the Global Environmental Facility 5 (GEF 5)-National Steering Committee, Quezon City, Philippines, 25 March 2014.

1.2 Status and Trends

1.2.1 Forest and mountain biodiversity

The Philippine government continues to adopt the Food and Agriculture Organization (FAO) definition of forest as "an area of more than 0.5 hectares and tree crown cover (or equivalent stocking level) of more than 10% which includes natural and plantation and production forests".

The country's total land area of about 30 million hectares is legally classified as alienable and disposable land and forestland, categorized in Table 1 below. The use of the classified forest land of 15.05 million hectares is mainly for forest while the use of the unclassified forest land of 755 thousand hectares has not yet been determined[8].

Figure 5 compares forest cover data released in 2003 and 2010 by the National Mapping and Resource Information Authority (NAMRIA) generated through the visual interpretation of images of the Philippines taken from various earth observation satellites- Advanced Land Observing Satellite (ALOS) Advanced Visible and Near Infrared Radiometer (AVNIR)-2, Satellite Pour l'Observation de la Terre (SPOT)5, and LandSat.

Table 1. Land classification, 2005-2012

			2005	2006	2007	2008	2009	2010	2011	2012
Total Area			*30.00*	*30.00*	*30.00*	*30.00*	*30.00*	*30.00*	*30.00*	*30.00*
Certified A & D			14.21	14.19	14.19	14.19	14.19	14.19	14.19	14.19
Forest Land	Total		*15.79*	*15.81*	*15.81*	*15.81*	*15.81*	*15.81*	*15.81*	*15.81*
	Unclassified		*0.75*	*0.76*	*0.76*	*0.76*	*0.76*	*0.76*	*0.76*	*0.76*
	Classified	Total	15.04	15.05	15.05	15.05	15.05	15.05	15.05	15.05
		Forest Reserves	3.22	3.27	3.27	3.27	3.27	3.27	3.27	3.27
		Established timberland	10.09	10.06	10.06	10.06	10.06	10.06	10.06	10.06
		National Parks	1.34	1.34	1.34	1.34	1.34	1.34	1.34	1.34
		Military & Naval Reserve	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13
		Civil Reservation	0.17	0.17	0.17	0.17	0.17	0.17	0.17	0.17
		Fish Pond	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09

Source: Philippine Forestry Statistics (PFS), 2013

A review of the forestry statistical data of 2003 and 2010 shows an increase in open forest cover as well as mangrove cover and a decrease in closed forest cover. The increase in open forest cover and decrease in closed forest cover indicate that the forest ecosystem continues to be threatened by human activities, such as logging (both legal and illegal), kaingin or slash and burn agriculture and forest fire.

The increase in areas reforested from 128,559 hectares in 2011 to 221,764 hectares in 2012 (Figure 6), is attributed to the ongoing implementation of the NGP pursuant to Executive Order (EO) Nos. 23[9] and 26[10]. The NGP aims to plant 1.5 billion trees in 1.5 million hectares for six years from 2011 to 2016 in lands of the public domain - forestlands, mangroves, protected areas, ancestral domains, civil and military reservations, urban areas under the jurisdiction of local government units (LGUs), inactive and abandoned mine sites and other suitable lands in partnership with other government agencies, private sector, civil society and local communities. As of 2012, the NGP covered a total area of 350,321 hectares, generated about 380,696 jobs, and sequestered about 38.9 million tons of carbon worth PhP14 Billion[11]. The NGP posted a 67% survival rate for 2012 compared to 65% in 2011 or an average survival rate of 66%[12].

8 Philippines – DENR Forest Management Bureau. *Philippine Forestry Statistics 2013*. Accessed March 13, 2014. http://forestry.denr.gov.ph/PFS2013.pdf.

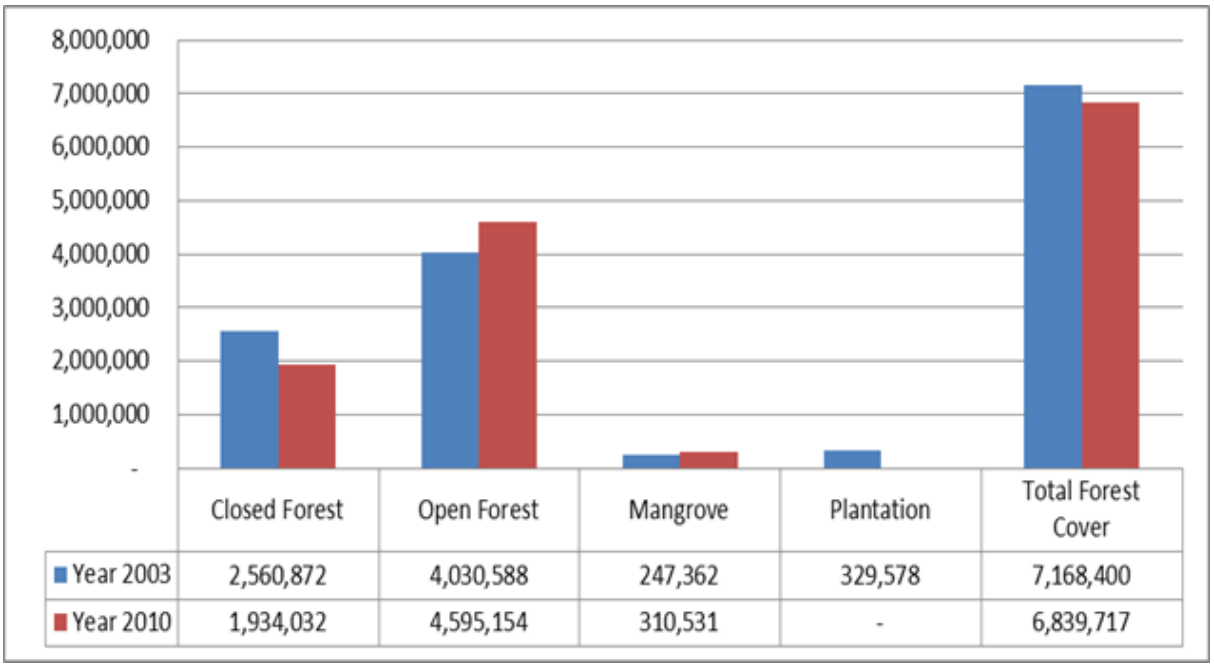
9 Executive Order (EO) No. 23, s. 2011. Declaring a Moratorium on the Cutting and Harvesting of Timber in Natural and Residual Forests and Creating the Anti-Illegal Logging Task Force.

10 EO No. 26, s. 2011. Declaring an Interdepartmental Convergence Initiative for a National Greening Program.

11 National Economic Development Authority. "Sustainable and Climate-resilient Environment and Natural Resources." Presentation given at the Meeting of the Global Environmental Facility 5 (GEF 5)-National Steering Committee, Quezon City, Philippines, 25 March 2014.

12 Letter from DENR-FMB Director and NGP National Coordinator Ricardo Calderon dated 29 May 2014.

Figure 5. Forest cover, 2003 and 2010 (in hectares).

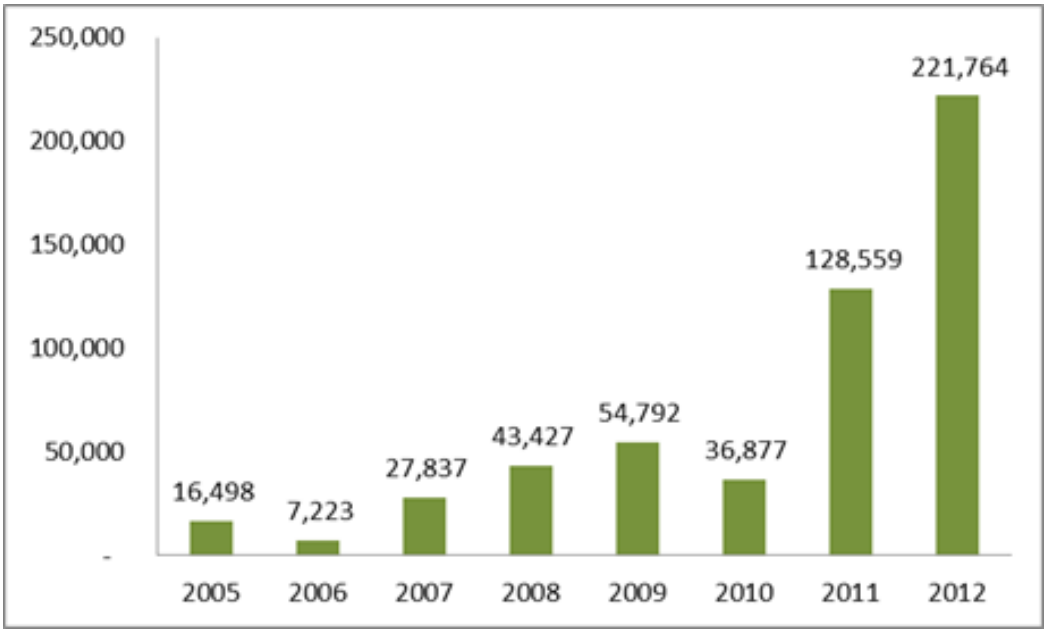


	Closed Forest	Open Forest	Mangrove	Plantation	Total Forest Cover
Year 2003	2,560,872	4,030,588	247,362	329,578	7,168,400
Year 2010	1,934,032	4,595,154	310,531	-	6,839,717

Source: Philippine Forestry Statistics 2012

The socioeconomic contribution of forestry to the Philippine economy has decreased due to massive deforestation in the past two decades. Yet, both wood (e.g. veneer and plywood) and non-wood (e.g. bamboo, rattan) enterprises, whether large or small-scale, continue to produce forest products for domestic and foreign consumption. Revenues from timber harvest went down by 91% from PhP 24 million in 2011 to PhP 2 million in 2012 due to a moratorium on tree harvesting from natural and residual forests pursuant to EO 23. On the other hand, revenues from forest charges on non-timber forest products increased by 17% from PhP 3.6 million in 2011 to of PhP 4.2 million in 2012[13]. In the past five years, the forestry sector contribution decreased from an average of 0.07% from 2003-2008 to an average of 0.04% at current prices from 2009-2013[14].

Figure 6. Reforested Areas in hectares, 2005-2012.



Source: Philippines Statistical Yearbook (PSY), 2013

13 Philippines – DENR Forest Management Bureau. *Philippine Forestry Statistics 2012*. Accessed October 12, 2013. http://forestry.denr.gov.ph/PFS2012.pdf.

14 National Statistical Coordination Board. *Philippine Statistical Yearbook 2012*. Makati City, Philippines: NCSB, 2013.

Protected areas

Legal measures continue to be instituted to protect and conserve the country's forests through the declaration of protected areas (PAs), critical habitats and local community conserved areas.

In terms of PA coverage, 5.45 million hectares or 14.2% of the total area of the country are PAs, 4.07 million hectares or 13.57% of which are terrestrial areas, while 1.38 million hectares or 0.63% are marine areas. These include initial components which have not been proclaimed under the National Integrated Protected Areas System (NIPAS) as well as PAs with both land and marine components .About 26% of forest covers are within PAs.

The number and area coverage of PAs under NIPAS have increased to 240 with a total area of 5.45 million hectares or 14.20% of total area in 2013(Table 2) from 234 with a total area of 5.23 million hectares (or 13.54% of total area) in 2008. The increase is attributed to the proclamation of additional NIPAS sites such as the Mt. Mantalingahan Protected Landscape, Aliwagwag Falls Protected Landscape, Carac- and Watersheds. About 26% of the forest cover is within PAs[15]. Of the 240 PAs, 13 PAs with a total area of 893,512.16 hectares have been established by law following the NIPAS mandate, compared to ten PAs in 2008. Five PAs have also been designated as Association of Southeast Asian Nations (ASEAN) Heritage Natural Parks, namely: Mt. Apo Natural Park, Mts. Iglit-Baco National Park, Mt. Kitanglad Range Natural Park, Mt. Malindang Range Natural Park and Mt. Makiling Nature Reserve.

The decline in open and closed canopy forests also validate recent findings of a GIZ-funded Project on Protected Area Management Effectiveness (PAME) which showed poor management effectiveness in 61 terrestrial protected areas with an overall rating of 58% only (see related entry on PAME in Box 1)[16].

Table 2. Protected areas coverage, 2008 and 2013

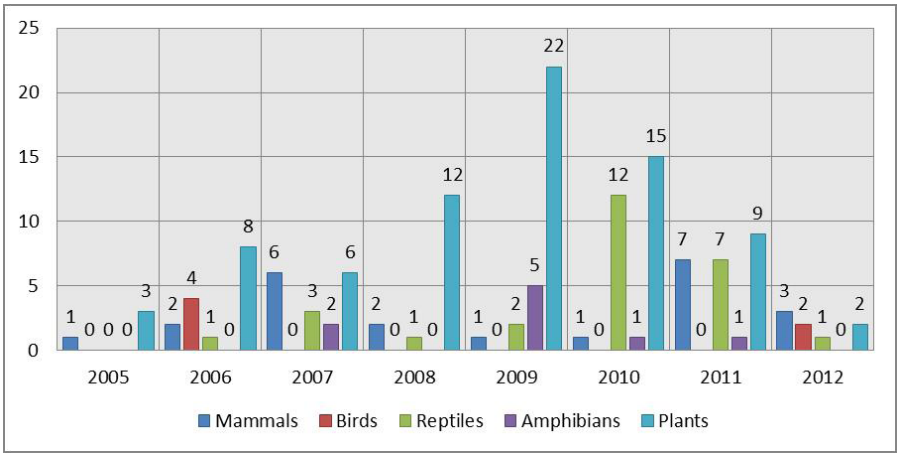
Protected Area	PA Coverage, 2008 and 2013 (million hectares and % of total area)		Trend
	2008	2013	
Terrestrial	3.87 (12.91%)	4.07 (13.57%)	Increase
Marine	1.38 (00.63%)	1.38 (0.63%)	Same
% Total Area	5.25 (13.54%)	5.45 (14.20%)	

Source: DENR- BMB, 2014

Flora and Fauna

In terms of wildlife species management, new species continue to be discovered by survey teams from local and international academic and research institutes (Figure 7) with many more awaiting discovery.

Figure 7. New species discoveries count, 2005-2012



Source: DENR-BMB, 2013.

15 DENR Biodiversity Management Bureau. "PAWB Cue Cards FY 2014." Presentation from the DENR Biodiversity Management Bureau.

16 Guiang, E.S. and G.C. Braganza. *National Management Effectiveness and Capacity Assessment of Protected Areas in the Philippines: Draft Report*. Manila, Philippines: GIZ, 2014

Box 1. Hits and Misses in Protected Areas Management

The DENR-BMB and the GIZ GmbH-commissioned study on the National Management Effectiveness and Capacity Assessment (NMECA) under the PAME (Protected Areas Management Enhancement) Project showed that the state of the Protected Areas (PA) management in the Philippines was poor, with a 58% overall average METT findings across 61 PAs assessed.

One of the primary challenges found was the lack of regular and sustained funding evidenced by the fact that only 4 out of the 61 PAs are covered by Republic Acts (RAs) while the rest are sanctioned by Presidential Proclamations. Although all of the sample sites have Protected Area Management Boards (PAMBs), the low responsiveness and support from the LGUs and other political actors reduce the significance and effectiveness of the PAs. These financial and governance challenges impact the management of the sites.

It was also revealed that, in majority of the LGUs and communities, ownership of PA management is limited. For instance, in most sites, the PA zones have not been incorporated in the Comprehensive Land Use Plans (CLUPs) of the LGUs that have political jurisdictions of the PAs. There is also reported difficulty in harmonizing conflicting land and resource uses, boundary conflicts and zoning regimes by the PAMBs and Protected Areas Superintendents (PASus) in sites with either ancestral domain titles or ancestral domain claims. Only a few PAs have contributed to the local economy through ecotourism, supply of key ecosystems goods and services to downstream area and PA-dependent livelihoods. All of these challenges pose an urgent need for technical assistance support for capacity building, biodiversity assessment, planning and implementation.

The study also identified several best practices and innovation that hold potential as models for effective management. These include the

Photo from: DENR-BMB

increasing collaborative engagements in PA management, the harmonization of policy formulations, the networking with resource institutions, setting up of various schemes for PES, proper valuation methods enhanced by communication and social marketing campaigns and the effective practice of connecting PA site with PA clients and partners.

The NMECA Study team recommended five areas to serve as guide to the sector for effective biodiversity management: (1) policy governance improvement, (2) strengthening of the PA management planning process, (3) supporting or improving plan implementation processes, particularly a results-based monitoring and evaluation system (4) intensifying or mobilizing inputs for PA management and (5) measuring and reporting on the outcome.

Figure 8. New species discoveries, photos[17]

(a) (b) (c) (d) (e)

Some of these new discoveries (Figure 8 a-e) include the (a) Camiguin hawk owl (*Ninox leventisi*), (b) Cordillera shrew mouse (*Archboldomys maximus*), (c) Zambales forest mouse (*Apomys zambalensis*), (d) Sierra Madre forest mouse (*Apomys sierra*), and (e) Southern Leyte frog (*Platymantis guentheri* and *Platymantis hazelae*).

Aside from being a biodiversity superstar, the country is also a biodiversity hotspot. Table 3 shows the number of threatened species of fauna and flora listed under DENR Administrative Order (DAO) 2004-15 (for fauna) and DAO2007-01 (for flora).

Table 3. Number of threatened wildlife species, 2006-2013*

Taxonomic Group	2006	2007	2008	2009	2010	2011	2012	2013
A. Fauna*								
Mammals	43	43	43	42	42	42	42	42
Birds	131	132	132	127	127	127	127	127
Reptiles	27	27	27	24	24	24	24	24
Amphibians	14	14	14	14	14	14	14	14
B. Flora**		526	526	526	526	526	526	526

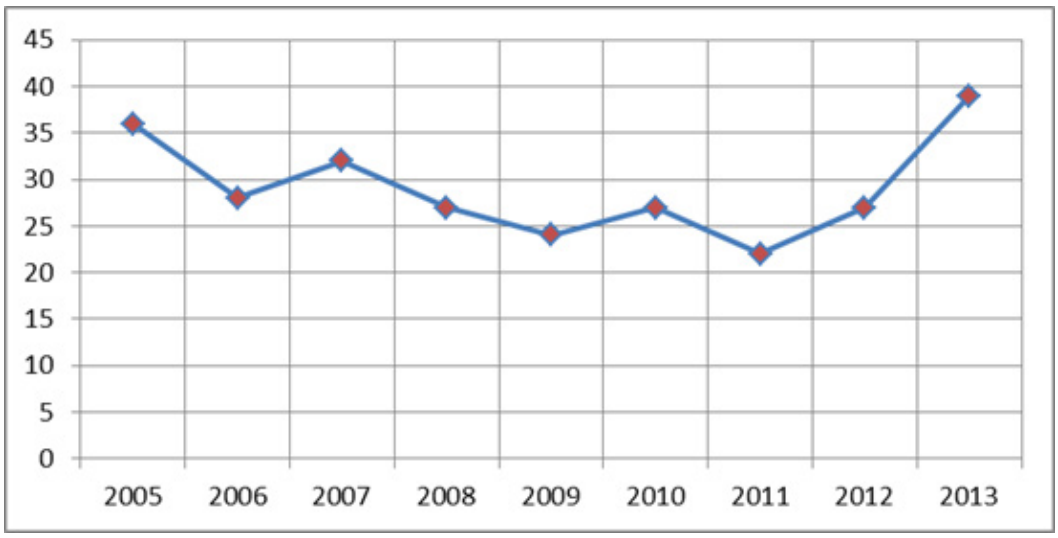
*Based on DAO No. 2004-15 re National List of Threatened Terrestrial Species of Wild Fauna and 2011 Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES) Appendices
**Based on DAO No. 2007-01 re National List of Threatened Philippine Plants

Between 2008 and 2009, the lists were updated to reflect the corresponding changes in the CITES listings of certain species under each taxonomic group. Fourteen species – 3 mammals, 8 birds and 3 reptiles- were delisted from the CITES Appendix as a result of reconciling CITES and Philippine wildlife reclassification than of successful conservation efforts. At present, there is an ongoing effort to review and update the lists.

Specific programs for some endangered and threatened species like the national bird, the Philippine eagle (*Pithecophaga jefferyi*), Philippine Cockatoo (*Cacatua haematuropygia*) Tamaraw (*Bubalus mindorensis*), Philippine tarsier (*Tarsius syrichta*), Philippine Crocodile (*Crocodylus mindorensis*) and marine turtles are also ongoing. Figure 9 shows that monitoring conducted by the DENR field staff from 2005 to 2013 under its Philippine Raptors Conservation Program yielded an increase in sightings of critically endangered Philippine eagles in the wild. However, this number is not reflective of an increase or decrease in population. Conservation and protection efforts were boosted with the discovery of Philippine eagles in various locations in Apayao from 2011-2013, rediscovery of the species in Leyte in December 2012 and successful hatching in December 2013 of a new eaglet “Atbalin”, the 4th offspring of a pair of Philippine eagles in the wild in Zamboanga del Norte.

17 Photo credits: (a) *N. leventisi* (Bram Demeulemeester), (b) *A. maximus* (L.R. Heaney/Field Museum), (c) *A. zambalensis* (D.S. Balete/Field Museum), (d) *A. sierra* (D.S. Balete/Field Museum), (e) *Platymanis g. / h.* (P. Esmaquel II)

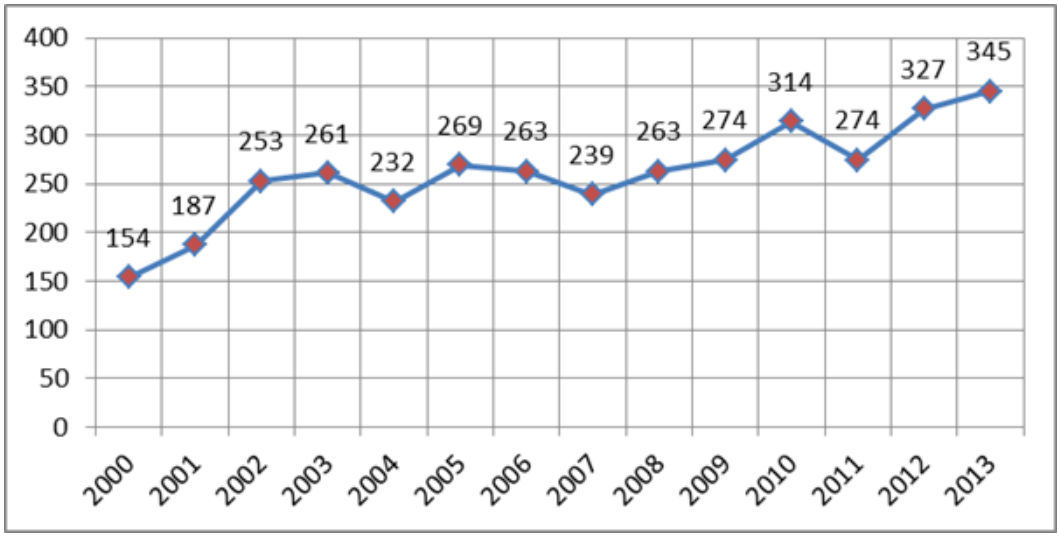
Figure 9. Philippine eagle sightings in the wild, 2005-2013..



Source: Philippine Raptors Conservation Program, DENR-BMB, 2013.

For better management of the equally endangered tamaraw, the Tamaraw Conservation Program continues to regularly monitor its population in Mts. Iglit-Baco National Park. Figure 10 shows an increase in the actual count of tamaraws to 345 in 2013 from 274 in 2009. There was a significant drop in the number of tamaraws in 2011, however. This drop has been attributed to: a) natural mortality, b) illegal hunting and traditional hunting by indigenous peoples and c) limitations in methodology and visibility[18].

Figure 10.Tamaraw population in Mts. Iglit-Baco National Park, 2000-2013.



Source: Tamaraw Conservation Program, DENR-BMB, 2013.

18 DENR Biodiversity Management Bureau. “Tamaraw Conservation Program Progress Report 2013”.

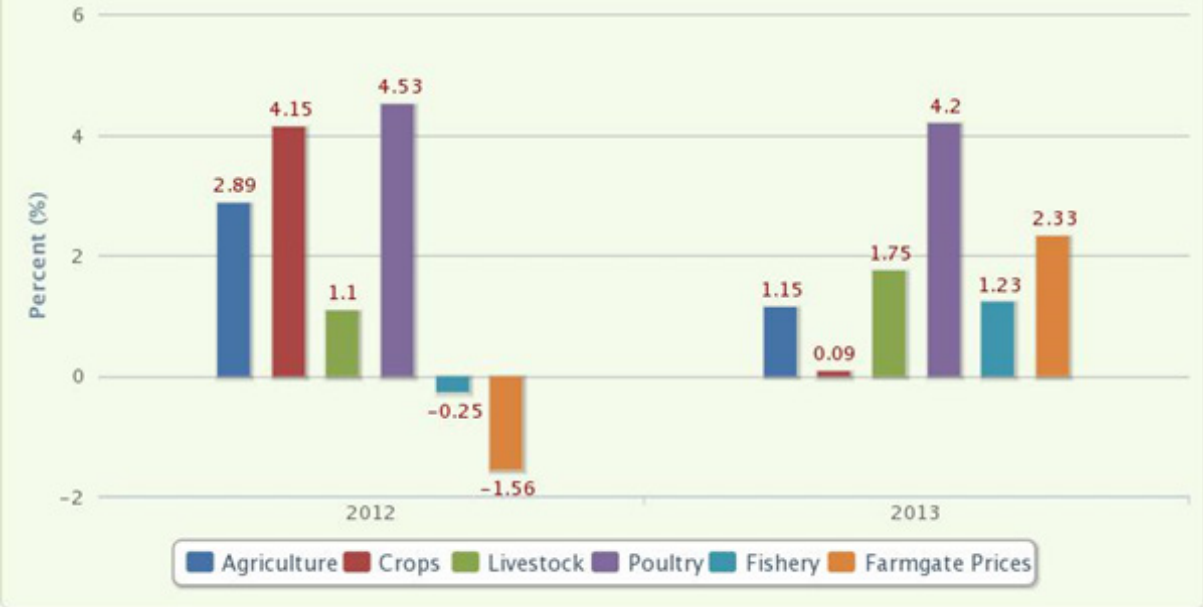
Key Biodiversity Areas

In addition to species-specific conservation programs, Key Biodiversity Areas (KBAs) and critical habitats have been identified for conservation measures. KBAs represent known habitats of 855 globally important species of plants, corals, molluscs, elasmobranchs, fishes, amphibians, reptiles, birds and mammals in the country. A total of 228 KBAs have been identified - 128 terrestrial and freshwater KBAs in 2006 and 123 marine KBAs in 2009[19], with 91 out of 240 PAs within KBAs. Six critical habitats with a total area of 9,391.697 hectares have also been established to protect the habitats and populations of threatened species of wild flora (e.g. Rafflesia schadenbergiana) and wild fauna (e.g. Philippine falconet, Philippine hanging parakeet, marine turtles, Philippine wild duck and other waterbird species), pursuant to Republic Act (RA) No. 9147 or the Wildlife Resources Conservation and Protection Act.

In caves and karst systems, several invertebrates like insects and crustaceans have been identified such as a cave spider (*Althepus noonadanae*), ant (*Paratrechina longicornis*) cave crabs (*Sundathelphusa cavernicula, Sundathelphusa sottooe*, *Sundathelphusa urichii*) and the newly discovered *Karstarma philippinarum*. Vertebrates such as gobiine fish (*Caecogobius crytopthalmus*), snakes (*Laticauda semifasciata, Laticauda laticaudia*), gecko (*Gekko gigantes*) and bats (*Hipposiderus diaderma, Miniopterus schriebersi*) have also been observed. Furthermore, 1,763 known caves have been recorded; many more are being discovered, including underwater caves and associated wildlife.

1.2.2 Agricultural biodiversity or Agrobiodiversity

Figure 11. Performance of agriculture industry and subsectors, 2012 and 2013



Source: Bureau of Agricultural Statistics, 2013.

Agrobiodiversity includes all components of biological diversity of relevance to food and agriculture. They also constitute the agricultural ecosystems or agro-ecosystems, which encompass the variety and variability of animals, plants and micro-organisms at the genetic, species and ecosystem levels that are necessary to sustain key functions of the agro-ecosystem, its structure and processes.[20] In the Philippines, however, reporting of agricultural statistics remains traditional, with more focus given on crop yields and on economic productivity of farms rather than on biodiversity in the agricultural ecosystem. Agricultural development is still mainly seen from a perspective of increasing productivity through intensive agriculture, monoculture, introduction of high-yield varieties in plants and genetic upgrading with exotic stocks in animals. Figure 11 shows that agriculture registered a 1.15% growth in 2013 compared to 2.89% in 2012[21].

19 Ambal R. G. R., M.V. Duya, M. A. Cruz, O.G. Coroza, S.G. Vergara, N. De Silva, N. Molinyawe, B. Tabaranza, "Key Biodiversity Areas in the Philippines: Priorities for Conservation," Journal of Threatened Taxa 4:8 (2012). Accessed 21 March 2014. http://threatenedtaxa.org/ZooPrintJournal/2012/August/o299506viii122788-2796.pdf

20 Convention on Biological Diversity. *Agricultural Biological Diversity: Review of Phase I of the Programme of Work and Adoption of a Multi-year Work Programme,* CoP Decision V/5. Accessed June 28, 2014. http://www.cbd.int/decision/cop/?id=7147.

21 Bureau of Agricultural Statistics. "Performance of Philippine Agriculture, January-December 2013." Accessed March 10, 2014. http://www.bas.gov.ph/?ids=agriperformance.

The crops, livestock and poultry subsectors posted growth in 2013. The crops subsector (e.g. palay, corn, tobacco, onion, mango, cassava, coconut, sugarcane, banana, coffee, abaca, peanut, calamansi), which accounted for 51.05% of the total agricultural output, grossed PhP 814.7 billion at current prices or 2.13% more compared to 2012, registering minimal growth of 0.09%. The second largest subsector which comprised the livestock (hog, cattle), grew by 1.75% in 2013 compared to 1.1% in 2012 and grossed PhP 233.2 billion at current prices or 8.82% more compared to 2012. The poultry (chicken) subsector, on the other hand, experienced growth of 4.2% compared to 4.53% in 2013, grossing PhP 174.2 billion in current prices or 4.31% more compared to 2012.

The fisheries subsector registered a growth of 1.23% compared to -0.25% in 2012, accounting for 17.96% to total agricultural output and grossed PhP 239.1 billion in current prices or 2.78% more compared to 2012. In 2013, the local fishing industry contributed 1.73% to the GDP compared to 2.23% in 2009, at current prices. In the past five years, the sector's contribution has decreased, however, from an average of 3.30% from 2003-2008 to an average of 1.93% at current prices from 2009-2013[22]. The 2012 State of the Coral Triangle Report (SCTR) said that the decline in the sector's contribution is attributed to the decrease in production of the commercial and municipal sectors[23]. Overfishing is also a factor. Table 4 shows the quantity and value of fish production, by type of fishing operation from 1996 to 2012.

Overall, except for the minimal growth of the crop subsector, the livestock, poultry and fisheries subsectors contributed to agricultural performance in 2013. Agriculture grossed Php 1.5 trillion in current prices or 3.51% more compared to 2012[24].

As of this report period, there are still no actual figures to measure decline or gain in agrobiodiversity beyond crop yields and farm productivity in the absence of national indicators specifically addressing agro-ecosystems.

The country report on the state of the plant genetic resources for food and agriculture has not been updated since its last report covering the period for 1997-2006[25]. Altoveros and Borromeo cited lack of funds as the reason why the report has not been updated. The 2003 Philippine Animal Genetic Resource Report prepared by the Department of Agriculture (DA)- Bureau of Animal Industry (BAI) has likewise not been updated.

There is, however, recognition of the diversity of agricultural resources- more than 5,500 traditional rice varieties and their wild relatives, indigenous and endemic species of vegetables and fruit crops, including taro, yam, banana, and abaca. Agricultural biodiversity is also being managed and sustained by local communities through traditional agricultural practices that conserve and enhance biodiversity at genetic, species and landscape level.

Table 4. Quantity and Value of Fish Production, by Type of Fishing Operation, 1996-2012

Year	Total		Commercial Fishing /1		Municipal Fishing /2		Aquaculture /3	
	Quantity	Value (PhP)	Quantity	Value (PhP)	Quantity	Value (PhP)	Quantity	Value (PhP)
1996	2,796.00	83,275.20	879.10	24,555.30	909.20	25,373.20	1,007.70	33,346.70
1997	2,793.60	80,617.10	884.70	25,935.30	924.50	27,392.90	984.40	27,288.80
1998	2,829.50	85,133.10	940.50	29,737.10	891.10	28,966.50	997.80	26,429.50
1999	2,923.80	92,322.30	948.80	32,242.10	926.30	31,034.10	1,048.70	29,046.10
2000	2,993.30	98,622.10	946.50	33,878.70	945.90	32,595.60	1,100.90	32,147.90
2001	3,166.50	107,193.80	976.50	36,088.70	969.50	34,221.70	1,220.50	36,883.40
2002	3,369.50	113,258.20	1,042.20	39,681.20	988.90	38,158.90	1,338.40	35,418.20
2003	3,619.20	119,866.30	1,109.60	42,002.90	1,055.10	40,664.30	1,454.50	37,199.10
2004	3,926.10	138,846.50	1,128.40	48,349.30	1,080.70	45,674.90	1,717.00	44,822.30
2005	4,161.80	146,392.90	1,134.00	47,272.70	1,132.00	49,950.40	1,895.80	49,169.80
2006	4,408.50	163,374.40	1,080.70	48,555.90	1,235.50	59,146.60	2,092.30	55,671.90
2007	4,711.30	180,545.20	1,192.10	54,737.50	1,304.40	64,210.40	2,214.80	61,597.30
2008	4,966.88	215,813.51	1,226.20	63,170.10	1,332.99	70,973.92	2,407.69	81,669.49
2009	5,079.90	215,582.06	1,253.90	58,705.00	1,348.60	75,383.70	2,477.40	81,493.36
2010	5,159.50	221,051.00	1,242.10	60,457.00	1,371.40	77,736.50	2,546.00	82,857.50
2011	4,973.55	224,695.00	1,032.80	58,623.00	1,332.65	80,075.60	2,608.10	85,996.40
2012	4,858.10	237,711.49	1,035.21	65,894.20	1,280.92	79,527.37	2,541.97	92,289.92

Source: Philippine Statistical Yearbook, 2013

Note: Details may not add up to total due to rounding.

1/ Includes production from commercial fishing vessels

2/ Includes production from capture activities in various marine and inland (fresh) bodies of water such as lakes, rivers, etc.

3/ Includes production from aquaculture activities such as brackish water and freshwater fish ponds, freshwater and marine fishpens, freshwater, and marine fish cages, culture of oysters, mussels, and seaweeds

22 National Statistical Coordination Board. *Philippine Statistical Yearbook 2012.* Makati City, Philippines: NCSB, 2013.

23 National Coral Triangle Initiative (CTI) Coordinating Committee. *State of the Coral Triangle Report – Philippines.* Jakarta, Indonesia: Coral Triangle Initiative, 2012.

24 Bureau of Agricultural Statistics. "Performance of Philippine Agriculture, January-December 2013."

25 Altoveros, Nestor and Teresita H. Borromeo. *The State of the Plant Genetic Resources for Food and Agriculture of the Philippines (1997-2006): A Country Report*. Philippines: Department of Agriculture (DA) - Bureau of Plant Industry (BPI), 2007.

1.2.3 Inland wetlands biodiversity

Inland wetlands biodiversity is defined as biodiversity associated with inland water ecosystems which include aquatic-influenced environments located within land boundaries such as lakes, rivers, ponds, streams, springs, caves, floodplains, as well as bogs, marshes and swamps, which are traditionally grouped as inland wetlands. Wetlands are " areas of marsh, fen, peatland or water, whether natural or artificial, permanent or temporary, with water that is static or flowing, fresh, brackish or salt, including areas of marine water the depth of which at low tide does not exceed six meters."[26]

Just like forest and agricultural biodiversity, inland wetlands biodiversity is important to socio-economic development and human well-being. Wetlands regulate water quantity and quality, wetlands vegetation filters contaminants and helps improve water quality in a more cost-effective manner than conventionally built water treatment plants. Biodiversity associated with inland wetlands includes fisheries and other resources that are important to food security. Among them are 316 fish species, 121 of which are endemic and 76 are threatened species; several species of aquatic plants, resident and migratory birds, amphibians and reptiles like the endemic and threatened Crocodylus mindorensis. As in the other ecosystems, there has been difficulty in determining status and trends due to lack of nationally-agreed indicators and targets and lack of monitoring systems but historical data are available for some.

Priority rivers and river basins

Rivers and river basins provide various services such as transport of goods and services, hydropower, recreation, irrigation and fisheries which require some degree of quality according to usage.

The government's Sagip Ilog Program continues to monitor water quality of 19 priority rivers using Biochemical Oxygen Demand (BOD) and Dissolved Oxygen (DO) levels to determine safe and best usage. Tables 5 and 6 show improvement of water quality (WQ), with six rivers already within the BOD criteria and six rivers within DO criteria[27] for Class A, C and D waters[28].

Monitoring results indicate that Anayan, Malaguit, Panique, Luyang, Sapangdaku and Cagayan de Oro Rivers have registered BOD levels within acceptable criteria. Ylang-Ylang, Mogpog, Anayan, Malaguit, Panique and Balili Rivershave registered DO levels within acceptable criteria. Only Anayan, Malaguit and Panique Rivers in Region 5 have registered both BOD and DO levels within acceptable criteria[29].

Other strategies and programs have been adopted by the government in partnership with national and local government agencies, business and local communities to improve water quality. These include implementing an Adopt-an-Estero ("creek") Program with 430 partner organizations nationwide (as of 2012) for massive clean –up, dredging and de-clogging of water bodies, monitoring compliance of residential, industrial and commercial establishments to solid waste and water quality standards and preparation of management plans for 18 river basins larger than 1,400 sq km.

These 18 major river basins comprise 36% of the country's total land area and are important sources of water for domestic use, agriculture, industry and commerce, including power and transportation and also serve as hosts to several aquatic species. Among these are the Cagayan River which is known to have the most expensive and threatened lobed river mullet (Cestraeus plicatilis) or "ludong", and three species of eels (Anguilla marmorata, Anguilla pacifica) and Anguilla celebenensis). As of 2013, seven river basin master plans (Cagayan, Mindanao, Buayan-Malungon, Agusan, Pampanga, Pasig-Laguna de Bay and Agno River Basins) out of 18 have been completed while others (Abra, Bicol, Abulog, Tagum-Libuganon, Ilog-Hilabangan, Panay, Tagoloan, Agus, Davao and Cagayan de Oro and Jaluar River Basins) are still under preparation.[30,31] This is a welcome development considering that the preparation of many of the river basin master plans has just started in 2008. New initiatives on river basin or watershed planning have also been undertaken under various projects as discussed in Target 14, Chapter 3.

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26 Wetlands as defined by the Convention on Wetlands or Ramsar Convention

27 DENR Environmental Management Bureau. *2012 Annual Report.* Accessed July 20, 2014. http://www.emb.gov.ph/portal/Portals/0/download/EMB%20ANNUAL%20REPORT%20FOR%20CY%202012.pdf

28 DAO No. 34 Series of 1990 or the Revised water usage and classification/water quality criteria classify water according to beneficial use. Fresh surface waters (rivers, lakes, reservoirs, etc.) are classified as Class A (Public Water Supply Class II)- for water supply that requires complete treatment (coagulation, sedimentation, filtration and disinfection) in order to meet the Philippine National Standard for Drinking Water (PNSDW); Class C- for fishery (for propagation and growth of fish and other aquatic resources), recreational (for boating, etc.), industrial (for manufacturing processes after treatment); and Class D (for agriculture, irrigation, livestock watering, etc.), industrial (e.g. cooling, etc.).

29 DENR Environmental Management Bureau. *2012 Annual Report.* Accessed July 20, 2014. http://www.emb.gov.ph/portal/Portals/0/download/EMB%20ANNUAL%20REPORT%20FOR%20CY%202012.pdf

30 DENR- River Basin Control Office. "The Philippines major river basin". Philippines: DENR-RBCO, 2012.

31 DENR-River Basin Control Office. "Status of the Formulation of the Integrated River Basin Management and Development Master Plan for the 18 Major River Basins." Presentation from the DENR River Basin Control Office.

Table 5. Biochemical Oxygen Demand (BOD mg/L) for 19 priority rivers, 2003, 2005, 2009, 2012

Region	Waterbody	Class	BOD			
			2003	2005	2009	2012
III	Meycauayan River	C	38.2	119.73	48.95	47.49
	Marilao River	C	32.3	41.47	8.21	27.2
	Bocaue River	C	12.2	6.4	6.31	10.26
IV-A	Imus River	C	5.65	9.47	18.68	15.28
	Ylang-ylang River	C	24.4	8.32	126.27	24.86
IV-B	Mogpog River	C	-	-	-	-
	Calapan River	C	4.1	15.46	5.33	14.08
V	Anayan River*	D	-	2.34	2.91	-
	Malaguit River**	C	-	0.74	(a)	(a)
	Panique River***	C	-	2.64	(a)	(a)
VI	Iloilo River	C	2.4	3.36	6.4	14.2
VII	Luyang River*	C	-	2.04	2.48	3
	Sapangdaku River*	C	-	0.86	3.18	1.67
X	Cagayan de Oro River*	A	-	1.26	1.14	2
CAR	Balili River	-	-	31.83	7.04	-
NCR	Marikina River	C	18.2	12.13	13.97	-
	San Juan River	C	54.8	33.48	44.73	-
	Paranaque River	C	42	29.46	53.31	47.6
	Pasig River	C	10.7	24.17	33.29	-

*Rivers with BOD level within WQ criteria
** Replaced by Rio Guinobatan River
*** Replaced by Sagumayon River , (a) no longer monitored

BOD Criteria: <5 mg/L for Class A&B
<7 mg/L for Class C
10 mg/L for Class D

Table 6. Dissolved Oxygen (DO mg/L) for 19 priority rivers, 2003, 2005, 2009, 2012

Region	Waterbody	Class	DO			
			2003	2005	2009	2012
III	Meycauayan River	C	-	0.45	4.15	2.05
	Marilao River	C	0.8	1.09	4.98	3.11
	Bocaue River	C	1.9	2.73	7.92	3.54
IV-A	Imus River	C	3	5.18	4.75	4.13
	Ylang-ylang River*	C	4.5	4.83	4.57	5.74
IV-B	Mogpog River*	C	4.9	7.15	8.02	7.96
	Calapan River	C	3.1	2.85	2.91	2.72
V	Anayan River*	D	-	5.65	6.28	-
	Malaguit River*	C	4.6	5.75	7.49	5.9
	Panique River*	C	2.7	5.6	7.39	6.35
VI	Iloilo River	C	4.2	4.88	3.91	4.4
VII	Luyang River	C	-	7.57	4.08	4
	Sapangdaku River	C	-	7.14	4.33	3
X	Cagayan de Oro River	A	8.6	8.13	8.76	4.48
CAR	Balili River*	-	4.6	4.92	6.72	9.9
NCR	Marikina River	C	3.1	3.37	5.22	-
	San Juan River	C	2.4	2.69	1.28	-
	Paranaque River	C	2.5	1.32	0.36	1.9
	Pasig River	C	3.1	2.14	3.1	-

* Rivers with DO level within WQ criteria

DO Criteria:> 5 mg/L for Class AA to C; 3 mg/L for Class D

Lakes

Ten major lakes (Laguna de Bay, Lanao, Taal, Mainit, Naujan, Buluan, Bato, Pagusi, Labas and Lumao host aquaculture production and many other uses for household, recreation and industry. The three largest lakes are Laguna de Bay, Taal and Mainit, the largest of which is Laguna de Bay with an area of 95,000 hectares. The Lake Basin (Laguna Lake and its watershed provinces of Rizal and Laguna, most of Metro Manila and parts of Cavite, Batangas and Quezon) is a vital ecosystem that contributes to water, food and energy security in the NCR and CALABARZON (Cavite, Laguna, Batangas, Rizal and Quezon). Together, they account for over 50% of the country's GDP.[32]

The Laguna Lake Development Authority (LLDA) has estimated pollution loads (e.g. BOD, total nitrogen and total phosphorus) in Laguna Lake, Pasig River and Manila Bay watersheds using the Waste Load Model for the years 2008, 2010, 2015 and 2020 from major point sources (industry, domestic, agriculture and forest in 58 sub-basins (37 within the Pasig River-Manila Bay watershed and 21 sub-basins in the Laguna de Bay watershed). The highest pollution loads of BOD and other nutrients and inputs were from domestic sources, followed by industrial, commercial, agricultural and forest sources. LLDA further reported that water quality in the lake and soil quality in the watershed have been on steady decline, with greater incidences of flooding and disasters in more than 20 lakeside municipalities since 2009, further exacerbated by climate variability.[33]

The 4th National Report in 2009 reported that pollution and unregulated fish cage operations threatened lake productivity in the Taal Volcano Protected Landscape (TVPL). Taal Lake is home to various endemic species, including "tawilis" (Sardinella tawilis) and "duhol" (Hydrophis semperi), one of only two sea snake species known to live in freshwater. The DA- Bureau of Fisheries and Aquatic Resources counted 9,188 fish cages and by other estimates, 11,000 fish cages in the lake as against a recommended limit of 6,000 fish cages. In 2012, the use of legal measures such as the filing and granting of Writ of Kalikasan (see related entry on the Writ of Kalikasan in Box 2) for Taal Lake conservation and the dismantling of fish cages helped reduce fish cages to the desired limit of 6000. Moreover, the 10-year management plan (2009-2018) for the TVPL was approved in November 2009[34] with a vision of "clean water and surroundings, cared for by citizens who are happy and economically secure relying on productive resources and able management of the basin".

A similar trend has been observed in Lake Buhi, home of the world's smallest edible fish "sinarapan" (*Mistichthys luzonensis*), where signs of its recovery have been observed after a campaign to remove fish cages and expand space for navigation and fish sanctuaries[35]. At the Naujan Lake National Park in Oriental Mindoro, 10,000 individuals of tufted ducks *Aythya fuligula* used the national park as a staging and wintering area.

Wetlands of international importance and critical habitats

In Palawan Province, the Puerto Princesa Subterranean River National Park (PPSRNP) which was declared as a UNESCO World Heritage Site (1999), a National Geological Site (2003) and a New Seven Wonders of Nature (2011), received another distinction in 2012 as the fifth Wetland of International Importance or Ramsar Site in the Philippines. This designation recognizes the PPSRNP for its ridge to reef approach management in maintaining the ecological integrity of the cave and the underground river and ensures its protection and sustainable use as one of the country's rich wetlands and ecotourism sites.

In Metro Manila, the Las Piñas – Parañaque Critical Habitat and Ecotourism Area (LPPCHEA),an urban wetland designated as the first Critical Habitat (for mangroves, mudflats and migratory birds) was established by Presidential Proclamation No. 1412 in 2007 and 1412-A in 2008. It is also as the sixth Wetland of International Importance for migratory birds specifically for the Chinese egrets (Egrettaeulophotes) and black-winged stilts (Himantopus himantopus). The DENR has recorded 52 bird species in LPPACHEA[36].

Other previously declared wetlands of international importance or Ramsar sites are the Tubbataha Reefs Natural Park (declared as a protected area under the NIPAS by Republic Act No. 10067 in 2009) in Cagayancillo, Palawan, Naujan Lake National Park in Oriental Mindoro, the Olango Island Wildlife Sanctuary in Cebu and the Agusan Marsh Wildlife Sanctuary in Agusan del Sur. These sites provide several benefits to nearby communities, among them sustenance and livelihood from fisheries and ecotourism. In 2011, "Lolong" the world's largest saltwater crocodile (Crocodylus porosus) measuring 6.17 meters from snout to tail and weighing 1,075 kilos, was caught in Agusan Marsh and subsequently held captive and displayed as a tourist attraction until its death in 2013.

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32 Laguna Lake Development Authority. *Laguna de Bay Environment Monitor 2011-2012*. Quezon City, Philippines : LLDA, 2012. Accessed November 2013. http://www.llda.gov.ph/dox/ldbem/2011-2012/LdBEM2011-2012_final.pdf

33 Id.

34 Taal Conservation Timeline is available at http://taal-lake-blag.blogspot.com/2012/10/taal-conservation-timeline.html, accessed 10 March 2014.

35 Escandor, J.J. et. al. "Fewer fish cages revive Lake Buhi". Inquirer Southern Luzon, March 27, 2014. Accessed 10 May 2014, http://newsinfo.inquirer.net/589277/fewer-fish-cages-help-revive-lake-buhi.

36 Department of Environment and Natural Resources. "Framework Plan for the Coastal Lagoons of Las Piñas and Parañaque".

Table 7 shows the list of critical habitats which have been proclaimed by Department Administrative Orders and Presidential Proclamation as such to protect threatened wetland ecosystems and plant species[37]. Of these critical habitats, three are inland wetlands.

Table 7.Proclaimed critical habitats, 2007 to 2012

Critical Habitat	Legal Instrument		Threatened Species
	Number	Date	
1. Adams Wildlife Critical Habitat (AWCH) *Adams town, Ilocos Norte*	DAO No. 2013-23	Dec. 9, 2013	Philippine falconet, Phillippine hanging parakeet, Philippine brown deer, Philippine warty pig, Northern Luzon cloud rat, Jade vine, Giant tree ferns, dipterocarp trees and other threatened spp. of flora and fauna
2. Carmen Critical Habitat *Carmen, Agusan del Norte*	DAO No. 2012-08	Oct. 8, 2012	Marine turtles
3. Malasi Tree Park and Wildlife Sanctuary Critical Habitat *San Antonio, Cabagan, Isabela*	DAO No. 2012 - 01	Feb. 7, 2012	Philippine Wild Duck (*Anas luzonica*) and other Waterbird Species
4. Cabusao Wetland Critical Habitat *Cabusao, Camarines Sur*	DAO No. 2011 -10	Aug. 23, 2011	Philippine Wild Duck (*Anas luzonica*)
5. *Rafflesia schadenbergiana* Critical Habitat *San Vicente, Baungon, Bukidnon*	DAO No. 2011 - 02	Feb. 23, 2011	*Rafflesia schadenbergiana*
6. Las Piñas – Parañaque Critical Habitat and Ecotourism Area *Las Piñas – Parañaque, Metro Manila*	Presidential Proclamation No. 1412 Presidential Proclamation No. 1412 – A (Amending Proclamation No. 1412)	Apr. 22, 2007 Jan. 31, 2008	Waterbirds

Source: DENR-BMB, 2012

37 DENR Biodiversity Management Bureau Wildlife Resources Division. "Proclaimed critical habitats". Accessed March 21, 2014. http://bmb.gov.ph/index.php?option=com_content&view=article&id=85:wildlife-conservation-facts-and-figures&catid=63:featured-conservation-area&Itemid=195

Box 2. A new legal weapon: the Writ of Kalikasan

Introduced in 2010 by the Philippine Supreme Court, the Writ of Kalikasan is a legal remedy that the public could use in stopping practices deemed to be environmentally destructive. It was designed to protect the constitutional right of the Filipino citizens to "a balanced and healthful ecology." Among the significant Writs of Kalikasan issued by Philippine courts are:

Agham Party List v. DMCI Holdings Inc. et al	January 2014	Against the leveling of a mountain for mining purposes and dumping of soil offshore to create a man-made foreshore area (Zambales)
Syjuco et. al. v. National Irrigation Authority et. al.	October 2013	Against the construction of a dam for irrigation purposes, with provisions for hydro-electric power and bulk water supply (Iloilo)
Greenpeace Southeast Asia (Philippines) et. al. v. Environmental Management Bureau et. al.	May 2013	Against the conduct of field trials for genetically modified eggplant (Bt Talong)
Agham Party List v. LNL Archipelago Minerals Inc	June 2012	Against the leveling of a mountain for mining activities (Zambales)
Pimentel III et al v. Aquino et. al.	May 2012	Against large-scale black sand mining operations along the coast (Ilocos and Pangasinan)
Bondoc et. al. v. Paje et. al.	February 2012	Against the conversion of a coastal area into a landfill for city garbage (Bulacan)
Agham Party List v. Paje and Taal Volcano Protected Landscape Protected Area Management Board	February 2012	Against the further proliferation of fish cages in the Taal Volcano Protected Landscape and rehabilitate the water quality to standard levels (Batangas)
Hernandez v. Placer Dome Inc.	November 2010	In relation to the Marcopper mining disaster, to compel rehabilitation of the land and waters severely polluted by mine tailings (Marinduque)

In 2013, environmentalists, NGOs and Catholic bishops filed a petition for Writ of Kalikasan in connection with the grounding of the USS Guardian, a US Navy minesweeper in the Tubbataha Reef Natural Park, a UNESCO World Heritage Site and is also listed as a Wetland of International Importance under the Ramsar Convention. The Supreme Court initially deferred action on the petition. The ship was dismantled and removed from the reef in March 2013. Nonetheless, petitioners reiterated their call for the issuance of the writ and a TEPO in 2014, underscoring the extent of the damage to the corals.

Earlier, a Panamian vessel also ran aground in the Bakud Reef in the protected seascape of Saranggani Bay. Four hectares of reef was damaged, with authorities estimating the value of the damage at Php30 million to Php42 million, including the harm done to the reef and the marine services lost. The ship owners have submitted a letter of guarantee and expressed their willingness to pay the appropriate fines and indemnity under Philippine laws.

Marcopper spill - Marinduque
Photo by: AFP

Taal Lake Fish Cages
Photo by: Marlon Luistro

USS Guardian in Tubbataha
Photo by: US Embassy Manila

1.2.4 Urban biodiversity

Biodiversity is not so simply defined in urban contexts, particularly in the Philippines. At the national consultation for the Philippines' Biodiversity Strategy and Action Plan (PBSAP) in November 2013, it was apparent that the scope of biodiversity in the city is not as clearly defined as biodiversity in non-urban areas. Unlike forest/mountain, agricultural, inland waters, coastal and marine ecosystems, urban areas—whether the metropolis, cities, or in municipalities—do not appear exclusively in biodiversity literature nor feature prominently in conservation discussions.

The inattention to urban biodiversity may partly be shaped by the visible lack of habitable spaces in the city for plant and animal species to thrive. Biologically dead rivers, impermeable open spaces and polluted stormwater canals are but a few reasons why cities are inhospitable to biodiversity.

Given that almost two-thirds of the population in the Philippines will be living in urban areas by 2030, it is no longer practical to formulate a PBSAP without connection to urban biodiversity. The anthropogenic impact of failing biodiversity, regardless of geographic area, will be most felt in urban and peri-urban areas or urban fringes where people are concentrated. As countries develop, urban biodiversity will make up a growing proportion of the world's biodiversity in the future[38].

In 2012, the ICLEI-Local Governments for Sustainability produced an introductory Training Manual on Mainstreaming Urban Biodiversity into local governance as part of its Preparatory Research Project for Local Action for Biodiversity Asia Initiatives. In the absence of an official definition existing for urban biodiversity in the Philippines, the concept of urban biodiversity was defined based on the following:

1) CBD definition of biodiversity
2) ICLEI Local Action for Biodiversity definition
3) operational definition of urban areas in the Philippines
4) 2004 definition of an urban area based on ask resolution;
5) criteria for classifying cities as highly urbanized cities

As a result, urban biodiversity was defined as "a measure of nature's biological diversity in urban areas. Specifically, it refers to species and ecosystems that are present within the built environment and is heavily influenced by the economic, social and cultural dynamics of urban areas. Urban biodiversity is often managed/ co-managed by local governments"[39].Pilot training was given to LGU representatives from the cities of Baguio, Dagan, General Santos, Iloilo, Makati, San Fernando, La Union and Quezon.

Current efforts relating to urban biodiversity are limited to the provision of environmental management services, such as maintaining acceptable water quality in major waterways, managing solid waste and assessing environmental impact of developments. While these anthropogenic services are important, it is also critical that the biodiversity, resources and ecosystem services in urban- and peri-urban (or peripheral) areas are studied, valued and restored.

There are already some pockets of urban biodiversity conservation efforts in highly urbanized cities in Metro Manila such as in the LLPCHEA in Las Pinas and Paranaque cities, Ninoy Aquino Park and Wildlife Center and La Mesa Ecopark in Quezon City, Arroceros Forest Park in Manila and in some campuses of universities and colleges throughout the country. While the concept of urban biodiversity has been elaborated through the Singapore City Biodiversity Index[40], the country context is still evolving. The updated PBSAP has identified it as a new thematic area of focus.

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38 Faeth, S.H., C. Bang and S. Saari. 'Urban Biodiversity: Patterns and Mechanisms,' Annals of the New York Academy of Sciences 1223 (2011) 69–81. Accessed March 21, 2014. doi: 10.1111/j.1749-6632.2010.05925.

39 International Council for Local Environmental Initiatives – Local Governments for Sustainability. "Introductory Course to Mainstreaming Urban Biodiversity". 2012.

40 The Singapore City Biodiversity Index is a self-assessment tool to (i) assist national governments and local authorities in benchmarking biodiversity conservation efforts in the urban context; and (ii) help evaluate progress in reducing the rate of biodiversity loss in urban ecosystems. http://www.cbd.int/authorities/doc/User%27s%20Manual-for-the-City-Biodiversity-Index27Sept2010.pdf

1.2.5 Coastal and marine biodiversity

The Philippines holds the third largest reef area in the world, a total area of 22,500 sq. km., representing 9% of the total coral reef area globally (87). To date, 464 species of hard corals, 1,770 species of reef fish and 42 species of mangroves are found in the country.

In 2002, overfishing was the largest threat to coastal and marine biodiversity, particularly to coral reefs, followed by destructive fishing practices. In 2012, destructive fishing decreased however, due to successful interventions on MPA and fishery management in some sites. But even as the destructive practices lessened, other threats to coastal and marine biodiversity increased, particularly sedimentation and pollution as a result of inappropriate land use practices, irresponsible mining practices, deforestation, improper waste disposal and growth in coastal development and populations[41].

Coral reefs

Philippine reefs showed no major coral cover decline, although there is an increasing trend of poor reefs and <1% of reefs are in excellent condition. From 2005 to 2010, coral cover decreased in the Visayas Seas and Sulu Sea regions while it increased in the West Philippines Sea South Philippine Seas and Celebes Sea regions. The Visayas Seas is considered at high risk and warrants immediate concern and conservation efforts[42].

Many fish and other reef species and stable levels of coral cover are reportedly often found in protected areas. The Fisheries Code of 1998 mandated the establishment of no-take marine protected areas (MPAs) in 15% of municipal waters while the Marine Sanctuary Strategy 2004 envisioned 10% of coral reefs in no-take MPAs by 2020. More than a decade after, only 5 percent of municipal waters are within MPAs, of which 0.5 percent are no-take areas. As of 2011, 28 MPAs are under the NIPAS, and more than 1,000 small MPAs are supported by local governments. In terms of reducing fishing pressure, 25 MPAs have been assessed as fully effective, two of which are national marine PAs (Tubbataha Reefs Natural Park and Apo Island) while the rest are local MPAs. About 112 MPAs have been assessed as partially effective and 61 are ineffective. In total, only "7 % of coral reefs are inside MPAs, with less than 1% in effectively managed MPAs, 2% in partially effective MPAs, 2% in ineffective MPAs, and the remaining 3% in unrated MPAs"[43].

A study of species richness in 51 reef sites in 17 municipalities and four biogeographic regions (South China Sea or West Philippines Sea, Philippines, Sulu Sea and Visayas Sea) showed that most reefs are still species rich, but exhibited signs of depletion (e.g. low abundance and biomass per unit area). Reef fishes are dominated by small to medium bodied species and families (e.g. damselfishes, fusiliers, parrotfishes, wrasses, etc) and many large-bodied species important to commerce and food security are rarely found in many reefs in the country[44].

Mangroves

Mangrove cover has increased to 0.311 million hectares in 2012 from 0.247 million hectares in 2003 due to mangrove reforestation efforts. Planted mangroves have reached up to more than 44,000 hectares (Samson and Rollon, 2008, Primavera et al., 2011 as cited in the SCTR Philippines 2012). Several interventions have been introduced to address forest biodiversity loss, among them the Upland Development Program (UDP) in 2009, the National Greening Program (NGP) in 2011, the Integrated Coastal Resources Management Project (ICRMP) for mangroves and several new and continuing management programs for protected areas and wildlife.

Support has also been provided to coastal and marine biodiversity efforts through the development and adoption of integrated coastal resource management (ICRM) plans, MPA management plans and biodiversity conservation projects by 63 out of 80 local government units (LGUs) toward sustainable management of coastal resources[45].

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41 National Coral Triangle Initiative (CTI) Coordinating Committee. State of the Coral Triangle Report – Philippines. Jakarta, Indonesia: Coral Triangle Initiative, 2012.

42 Magdaong, E., H. Yamano and M. Fujii. "Development of a large scale long term coral cover database in the Philippines" Presentation given during the 2nd International PICES Symposium S7-Coastal and low lying areas, South Korea on May 15, 2012.

43 Burke, Lauretta et al. *Reefs at Risk Revisited in the Coral Triangle.* Washington: World Resources Institute, 2012. Accessed February 28, 2013. http://www.coraltriangleinitiative.org/sites/default/files/resources/Phi%20SCTR_web%20copy.pdf.

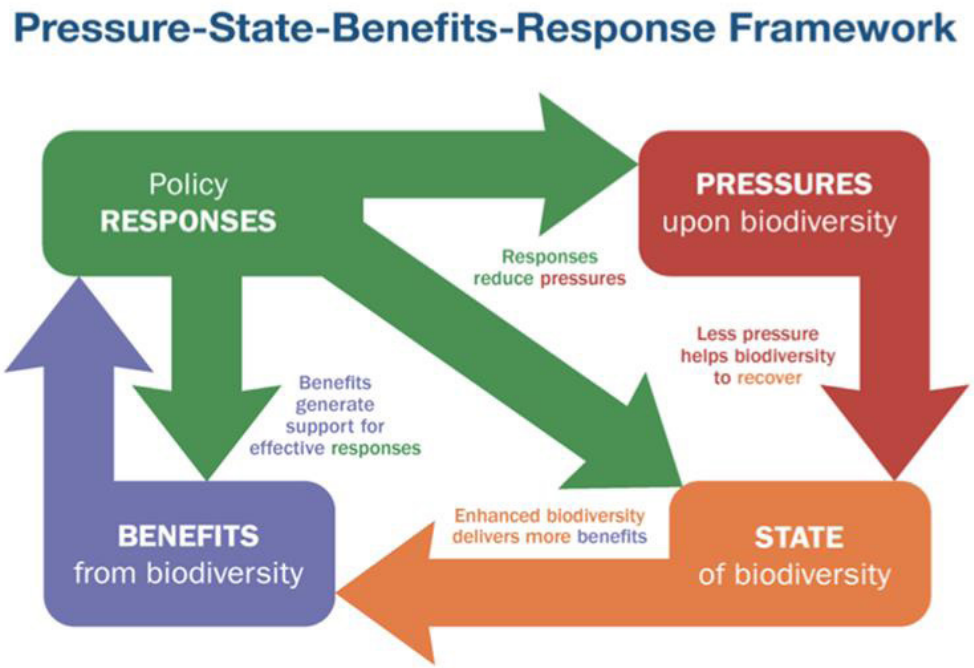
44 Anticamara, J.A. *Status of the center of reef fish diversity (the Philippines) and its implications to existing conservation and management. (*undated),

45 Department of Environment and Natural Resources. *Sustaining our Coasts: The Ridge-to-Reef Approach -- A Compilation of Technical and Policy Papers: National Integrated Coastal Management Program (NICMP).* Quezon City, Philippines: DENR Integrated Coastal Resources Management Project (ICRMP), 2013.

1.3 Threats to Biodiversity[46]

Five major direct drivers of biodiversity loss were identified: 1) habitat loss and degradation; 2) overexploitation and unsustainable use; 3) invasive alien species; 4) pollution and 5) climate change. These drivers were identified based on several references on Philippine biodiversity, the consultations/ workshops made during the updating of the PBSAP 2011-2020 and by using the Pressure -State-Benefits-Response (PSBR) Framework adopted in the PBSAP updating process (Figure 12). Most countries around the world have also similarly identified these direct drivers of biodiversity loss and ecosystem changes as major challenges.[47]

Figure 12. PSBR Framework adopted in the updating of the PBSAP 2011-2020[48]



Source: CBD, 2010.

Habitat loss and degradation cut across ecosystems and impact on and influence each other due to their interrelatedness and interconnectedness. Overexploitation and unsustainable use, invasive alien species, pollution and climate change all contribute to habitat loss and degradation.

In forest and mountain ecosystems, habitat loss and degradation is attributed to deforestation due to forest-related practices (e.g. legal and illegal logging, unsustainable agricultural practices such as slash and burn or "kaingin", forest fire), infrastructure developments like mines and roads and land conversion for human settlements, including informal settlements.[49] In agricultural ecosystems, it is attributed to land use change such as the conversion of agricultural lands to residential; slash and burn or "kaingin"; pollution due to the use of chemicals; introduction of monocultures and agricultural practices incompatible with the conservation of agricultural biodiversity[50].

In inland waters, many practices such as the diversion of rivers for irrigation and construction of dams for hydropower have changed the habitat of riverine flora and fauna; migratory fish species and invasive alien species have displaced indigenous species. In urban ecosystems, increasing population and development of urban areas have contributed to fragmentation of previously connected habitats. In coastal and marine ecosystems, continuing coastal development, marine-based pollution, sedimentation, overfishing and destructive fishing contribute to habitat loss and degradation.

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46 In this Report, threats, drivers and pressures are used interchangeably, consistent with its usage in the formulation of the updated PBSAP.

47 Reid, W. et al. *Millennium Ecosystem Assessment. Ecosystems and Human Well-being -- Synthesis.* Washington: World Resources Institute, 2005

48 Convention on Biological Diversity. *Strategic Plan for Biodiversity (2011-2020).* UNEP/CBD/SBSTTA/15/INF/6. Accessed March 21, 2014. http://www.cbd.int/doc/?meeting=sbstta-15; A flexible Pressure, State, Benefits, Response (PSBR)framework of indicators has been proposed to report on the 20 Aichi targets at multiple scales.

49 Andres, Armida. "Overview of the Philippine Biodiversity Strategy and Action Plan Formulation Process." Presentation at the National Consultation for the Updating of the PBSAP, Pasig City, Philippines, November 2013.

50 Global Environment Fund. "Project Identification Form on "RicePlus" – Dynamic Conservation and Sustainable Use of Agro-biodiversity in Rice-based Farming Systems of the Philippines."

In 2002, overfishing was the largest threat to coral reefs, followed by destructive fishing practices. In 2012, destructive fishing gradually decreased while other threats, particularly sedimentation and pollution increased as a result of inappropriate land use practices, irresponsible mining practices, deforestation (including illegal logging activities), improper waste disposal, etc. increase.[51]

Other threats, particularly sedimentation and pollution come from land-based domestic (e.g. settlements), agricultural and industrial activities (e.g. tourism) resulting from increasing population and urbanization.[5253]

These drivers of biodiversity and ecosystem service loss are further exacerbated by the potential impacts of climate change, particularly to vulnerable populations and ecosystems in the country.

Indirect drivers have also been identified, among them institutional factors, such as low economic rent, overlapping government mandates, inconsistent policies, weak law enforcement and lack of political will[54]. The impacts of both macro- and micro-economic events, which may be out of the government's control (e.g. international financial crisis, increasing oil prices), cascade into pressures for increased demand for biodiversity products and conversion of land for commercial and agricultural uses. Similarly, rapid population growth, scientific and technology development, and changes in cultural and religious values put pressure towards resource use.[55]

An integrated ecosystems management approach to addressing drivers of biodiversity and ecosystem changes in the uplands, lowlands, urban and coastal and marine areas is expected to result in the sustainable development of ENR resources for economic and human well-being.

1.4 Impacts of changes in biodiversity for ecosystem services and socioeconomic and cultural implications

Changes in biodiversity and ecosystem services can have positive or negative impacts on the socio-cultural and economic condition of the country. Individually and collectively, the five major drivers of biodiversity loss identified in the updated PBSAP- habitat loss, overexploitation and unsustainable use, IAS, pollution and climate change- have contributed to the reduction in biodiversity and ecosystems goods and services. These have consequently contributed to socio-cultural and economic decline.

In 2011, President Benigno Aquino III issued EO 23 following the destruction of habitats and sanctuaries of endangered species due to the "continuing problem of deforestation," which has also "led to floods, soil erosion and landslides that have claimed lives, displaced families and damaged millions of pesos worth of property." EO 23 declared a moratorium on the cutting and harvesting of timber in natural and residual forests nationwide, developed the NGP and created the Anti-Illegal Logging Task Force.[56] To some extent, the moratorium has arrested forest denudation and helped protect "watersheds and river systems supporting existing or proposed hydroelectric power facilities, irrigation works or existing water facilities…", allowed natural regeneration of residual forests and development of plantation forests, arrested pollution and contamination of downstream ecosystems and provided alternative sources of livelihood to affected stakeholders.[57]

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51 National Coral Triangle Initiative (CTI) Coordinating Committee. *State of the Coral Triangle Report – Philippines.* Jakarta, Indonesia: Coral Triangle Initiative, 2012.

52 Burke, Lauretta et al. *Reefs at Risk Revisited in the Coral Triangle.* Washington: World Resources Institute, 2012. Accessed February 28, 2013. http://www.coraltriangleinitiative.org/sites/default/files/resources/Phi%20SCTR_web%20copy.pdf.

53 Department of Environment and Natural Resources. *Sustaining our Coasts: The Ridge-to-Reef Approach -- A Compilation of Technical and Policy Papers: National Integrated Coastal Management Program (NICMP).* Quezon City, Philippines: DENR Integrated Coastal Resources Management Project (ICRMP), 2013.

54 Department of Environment and Natural Resources. "Sustaining our Coasts: The Ridge-to-Reef Approach -- A Compilation of Technical and Policy Papers: Mangrove Management". 2013.

55 La Viña, et. al. *Conserving Tropical Forests and Biodiversity for Human Development and Inclusive Growth.* FAA 118/119 Report Philippines Biodiversity and Tropical Forestry Analysis. United States Agency for International Development of the United States Government, 2011.

56 Official Gazette of the Republic of the Philppines. "Briefer on EO No. 23 s. 2011, declaring a national moratorium on logging natural and residual forests". Accessed10 March 2014. http://www.gov.ph/2011/02/03/briefer-on-executive-order-no-23-s-2011-declaring-a-national-moratorium-on-logging-natural-and-residual-forests/.

57 Executive Order No. 23, s. 2011. (1 February 2011), http://www.gov.ph/2011/02/01/executive-order-no-23-4/

In addition, many IP communities that occupy forest lands - which are also their ancestral lands and domains - are also directly impacted by changes in their environment. The IP communities engage in traditional practices and rely on resources found within. More than EO 23 and the NGP, other interventions are being undertaken by various stakeholders to address forest biodiversity, ecosystems services loss and the needs of communities dependent on resources found therein. Many of these interventions recognize the interlinkages and interrelationships of landscapes and adopt an ecosystems-based or ridge-to reef approach in the conservation and sustainable use of resources therein.

Changes in the coastal and marine ecosystems affect about 78% of the 81 provinces and 56% of the 1,634 cities and municipalities in the country that are located along coastal areas. Over 60% live in coastal areas and are dependent on a healthy coastal and marine environment for survival. The high population density has attracted more economic activities, opportunities and benefits such as industrial and urban development, tourism and food production. However, these have also contributed to coastal and marine degradation.[58] Land-based domestic, agricultural and industrial activities, overfishing, poaching and destructive fishing practices have also produced pollutants. The decline in biodiversity and ecosystem goods and services (e.g. fisheries production, ecotourism) in associated ecosystems, such as mangroves, coral reefs and seagrasses has resulted to low productivity and less yield; it also decreased revenues and incomes for local governments, businesses (small, medium and large enterprises) and small fisherfolks in affected areas. Nonetheless, many policies and programs are in place in some areas to curb these impacts, among them restoration management and restocking, market-based instruments like user fees for mangroves, coral reefs and foreshore areas and resources rents of major coastal habitats.[59]

"IAS threats (impacts)", as defined in the NISSAP, "are those matters or activities which, individually or collectively, may constitute a biological risk to the ecological welfare or to the well-being of humans, animals or plants of a country."The impact of IAS on forests, NIPAS sites, including critical habitats and areas of high conservation value and on biodiversity can be very serious and damaging, with ecological, social and economic implications and consequences.

For example, forest plantations have been affected by insect pests such as the Shoot borer (Hypsipyla robusta) on mahogany, varicose borer on Bagras (Agrilus exsignatus) and leaf skeletonizer (Hyblaea puera) on teak (San Valentin, 2001). The Giant African snail (Achatina fulica), Potato cist nematode (Globodera rostochlensis) and Buff coconut mealy bug (Nipaecoccus nipae) have affected crop plants, potato farms, coconuts, bananas and other economically important crops and forest species. The accidental release of an exotic ornamental knife fish (Chitala ornata) in Laguna de Bay has disrupted the natural food chain and has contributed to the decline of native and more valuable fish species in the Lake. In marine waters, the white-spotted jellyfish (Phyllorhiza punctate) believed to have been introduced through ballast water, has threatened commercial fisheries by "feeding on eggs and larvae of fish, shrimps and crabs and damaging fishing gears.[60] The recently drafted NISSAP is envisioned to address the impacts of the introduction and management of IAS in the country (see related entry on the NISSAP in Box 3).

The increase in extreme weather events brought by global warming has also brought significant impacts. From 2009 to 2013, several weather events have wrought havoc to lives, properties, and the economy. Tropical Storms Ondoy (international name Ketsana) and Pepeng (Parma) in 2009 caused extensive flooding, affecting over 9.3 million people (out of an estimated population of 43.2 million living in the affected regions) , with almost 1,000 lives lost, over 700 injured, 84 persons still missing and economic damage and losses amounting to USD 4,383 million or 2.7% of GDP. Together, Ondoy and Pepeng caused a total of Php 3.8 billion in damage and Php 36.2 billion in losses in the agriculture, fisheries and forestry sector.[61] In 2011, Tropical Storm Sendong (Washi) caused massive flooding and loss of lives and properties to Cagayan de Oro City, Iligan City and other areas in Region X. These areas are part of complex river systems linked to six major watersheds. Tropical Storm Sendong claimed 1,268 lives, with 6,071 injured and 181 missing. The total estimated damage for all sectors amounted to PhP 12.09 million and total economic losses estimated at Php1.24 billion. Total damage to agriculture was estimated at PhP 445 million, losses at Php 650.73

58 National Coral Triangle Initiative (CTI) Coordinating Committee. State of the Coral Triangle Report – Philippines. Jakarta, Indonesia: Coral Triangle Initiative, 2012.

59 Department of Environment and Natural Resources. "Sustaining our Coasts: The Ridge-to-Reef Approach -- A Compilation of Technical and Policy Papers: Mangrove Management". 2013.

60 DENR- Protected Areas and Wildlife Bureau. *The National Invasive Species Strategy and Action Plan*. Quezon City, Philippines: DENR-PAWB, 2013.

61 World Bank. *Philippines - Typhoons Ondoy and Pepeng : Post-Disaster Needs Assessment - Main Report.* 2011. Accessed 21 March 2014. https://openknowledge.worldbank.org/handle/10986/2776

62 Office of Civil Defense, Regional Disaster Risk Reduction and Management Council – Region X. *Tropical Storm Sendong: Post-Disaster Needs Assessment Final Report.* 2012. Accessed 21 March 2014. http://www.recoveryplatform.org/assets/publication/Final_PDNAReport_13June2012.pdf

million, with damage to crops, livestock, poultry and fisheries estimated at PhP 287 million.[62]

In August 2012, continuous heavy rains and thunderstorms for eight days brought by "habagat" or southwest monsoon flooded Metro Manila, the provinces of Quezon, Cavite, Laguna, Rizal, Bulacan, Pampanga and Bataan. It left 95 people dead, destroyed 8,428 homes and caused losses worth about Php 604.63 million (US$14.31 million), half of which is from the agricultural sector. In December of the same year, Tropical Storm Pablo (Bopha) hit 50 provinces, especially the provinces of Davao Oriental and Compostela Valley in Mindanao, affecting 6.2 million people and leaving 1,067 persons dead, with 800 others reported missing. It also displaced over 835,000 people and caused an estimated USD830-million damage to infrastructure and agriculture.[63] Damage to the agricultural sector was around USD 750 million, with 60% of coconut trees in Davao Oriental and 23% of banana plantations in Compostela Valley destroyed. It also affected the livelihood of 80% of the population employed in the sector. [64] In November 2013, Tropical Storm Yolanda (Haiyan) ravaged Central Visayas, affecting over 3.4 million families or over 16.0 million individuals, with 6,300 dead, 28,689 injured, 1,061 missing and 890,895 families (4.09 million individuals) displaced. Total damages were estimated at Php 89.59 billion, broken down into infrastructure (Php 9.58 billion), productive (Php 21.83 billion), social (Php 55.11 billion) and cross-sectoral (Php 3.07 billion).[65]

Many of the affected areas and people are poor and rely on fishing and subsistence agriculture (e.g. banana, coconuts, durian, rice, cacao, coffee, palm oil and rubber), small livestock and poultry raising and income from various labor opportunities (e.g. land preparation, growing, processing, packing, transport, etc. associated with the fisheries and agricultural value chain). The multiplier effects of these climate hazards on trade, industry and services (including on tourism) and human health cannot be overemphasized.

Lessons from these weather and climate events noted that all stakeholders need to be aware and to prepare to adapt, mitigate and enhance resilience against the effects of climate change through various approaches that include building capacities, watershed or river basin wide-planning, reforestation (including agroforestry and urban forestry systems), low-carbon development and diversified land use practices, income and livelihood.

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63 United Nations - Office for Coordination of Humanitarian Affairs (UNOCHA). *Philippines (Mindanao) Humanitarian Action Plan 2013: Typhoon Bopha/Pablo Response – An Action Plan For Recovery* (Revision: January 2013).

64 United Nations - Office for Coordination of Humanitarian Affairs (UNOCHA). 2013.*Typhoon Bopha (Pablo)Humanitarian Handbook Compostela Valley.*

65 National Disaster Risk Reduction & Management Council (NDRRMC) Update as of April 17, 2014. Accessed from http://www.ndrrmc.gov.ph/attachments/article/1177/Update%20Effects%20TY%20YOLANDA%2017%20April%202014.pdf on 18 April 2014.

Box 3. National Invasive Species Strategy and Action Plan (NISSAP) 2015-2025





Photos from: IAS Project presentation, NISSAP report, Google images

The Philippines' Fourth National Report to the CBD recognized the threats that Invasive Alien Species (IAS) presented to biodiversity, especially in forest ecosystems, inland water ecosystems and to agro biodiversity. A 2006 report submitted to the Asia-Pacific Invasive Species Network identified 16 potential IAS in the Philippines, with 10 higher plant species, 3 insect pests and 3 pathogens. The need for a national framework to address the impacts of IAS was noted, and consultations to this end were held in 2006 and 2009.

In 2013, a draft report was submitted to the Center for Agriculture and Bio-sciences International (CABI) under the auspices of the UNEP/GEF Project "Removing Barriers to Invasive Species Management in Production and Protection Forests in Southeast Asia (Component 1)." It reviewed the enabling institutional, policy and regulatory frameworks that are relevant to IAS management in the country and found that mechanisms to halt biodiversity loss by preventing and controlling IAS are almost non-existent. Any available guidelines in the areas of wildlife, forestry, agriculture, fisheries, PAs, ecotourism and environmental regulations were found to be inadequate, fragmented, or poorly implemented.

This Report seconded the need for a clear, integrated, and multi-sectoral IAS management strategy and action plan which led to the drafting of a National Invasive Species Strategy and Action Plan (NISSAP). The draft NISSAP proposes a set of guidelines, and a total 16 objectives and 84 planned actions for nine goals:

1. Leadership and Coordination – to establish leadership and strengthen collective action in the implementation of NISSAP and to adapt the management of IAS in light of new and emerging scientific information;

2. Prevention – to stop the entry and new introductions of IAS, as the first-line of defense;

3. Early detection and rapid response – to identify, report, and promptly respond to newly introduced IAS by eradicating or containing them before they become widespread;

4. Control and Management – to reduce the impacts of widespread IAS by containing and reducing the spread of invasive populations and minimizing their harmful effects;

5. Restoration – to rehabilitate areas (in particular areas of high biodiversity value) where IAS have been contained or eradicated;

6. Research and Information Management – to generate basic and applied scientific knowledge about IAS problems, provide policy advice to efficiently control and manage IAS, and generate online database and information exchange program;

7. Education and Public Awareness – to promote better and broader understanding and awareness of the threats of IAS and foster stakeholder support for the implementation of the NISSAP;

8. International Cooperation – to strengthen the role of the Philippines in meeting its commitments to international treaties, agreements, etc., urging for technical and financial support to enhance national capacities and capabilities to implement the NISSAP; and,

9. Training Needs and Capacity Building- to strengthen the technical and management capacities of relevant government units, at the national and local levels, as well as concerned stakeholders in implementing the NISSAP.

When completed, the NISSAP will be integrated into the PBSAP and complemented by enhanced financial, scientific and technical capacities for more effective implementation.

CHAPTER 2

Philippine Biodiversity Strategy and Action Plan (PBSAP): Implementation and Mainstreaming

2.1 The PBSAP and its Iterations

The earlier versions of the PBSAP were referred to as the National Biodiversity Strategy and Action Plan or NBSAP (1997) and the Philippine Biodiversity Conservation Priorities or PBCP (2002), described in more detail in the sub-sections below. Implementation of the NBSAP (1997) encountered difficulties due to the following: a) lack of clear institutional arrangements, defined tasks, sources of funds and a monitoring and evaluation system; b) lack of time-bound objectives, specific targets and indicators, geographic recommendations and priority areas for actions; c) lack of a database and information sharing system; and d) limited staff and capacities.[66] While the PBCP (2002) provided strong spatial reference, its implementation was also stalled by the absence of an implementing mechanism and targets for monitoring.[67]

Legal instruments have mandated the mainstreaming of the NBSAP into development planning. However, many of the NBSAP and PBCP strategies have been reflected mainly in the environment and natural resources programs, plans and activities, and less in other sectoral plans. Moreover, many of these interventions have been projected and not fully integrated into the strategic planning process.[68]

The current version of the PBSAP has sought to address the weaknesses of the previous versions by ensuring that indicators and targets are set, that a monitoring and evaluation system is in place and that an implementation plan that defines the priority actions, stakeholders, roles and tasks, timeframe, funding sources and a coordination management framework are in order.

2.1.1 National Biodiversity Strategy and Action Plan, 1997 (1st PBSAP)

The 1st PBSAP was approved by President Fidel V. Ramos in 1997 through Malacañang Memorandum Order No. 289 for integration into the sectoral plans and programs of various government agencies. It identified six strategic actions based on a comprehensive assessment of the status of the Philippine biodiversity as well as of the principal problems, threats, issues and gaps confronting biodiversity conservation.

The six strategic actions are 1) expanding and improving knowledge on the characteristics, uses, and values of biological diversity; 2) enhancing and integrating existing and planned biodiversity conservation efforts with emphasis on in-situ activities; 3) formulating an integrated policy and legislative framework for the conservation, sustainable use and equitable sharing of the benefits of biological diversity; 4) strengthening capacities for integrating and institutionalizing biodiversity conservation and management; 5) mobilizing an integrated information, education and communication (IEC) system for biodiversity conservation; and 6) advocating stronger international cooperation on biodiversity conservation and management."[69]

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66 *Id.*

67 Andres, Armida. "Overview of the Philippine Biodiversity Strategy and Action Plan Formulation Process." Presentation at the National Consultation for the Updating of the PBSAP, Pasig City, Philippines, November 2013.

68 Draft Chapter 6. Implementation Plan of the PBSAP 2014-2025

69 Andres, Armida. "Overview of the Philippine Biodiversity Strategy and Action Plan Updating Process." Presentation given at the Visayas Regional Consultation for the Updating of the PBSAP, Cebu City, Philippines, 28 August 2013.

2.1.2 Philippine Biodiversity Conservation Priorities, 2002 (2nd PBSAP)

The Philippine Biodiversity Conservation Priorities (PBCP) was developed through the participation of scientists and decision makers from more than 100 local and international institutions which resulted in a broad-based consensus on six strategic actions and 206 conservation priority areas and species conservation priorities. These six strategic and critical actions included: 1) harmonizing research with conservation needs; 2) enhancing and strengthening the protected area system; 3) effectively implementing the biodiversity corridors approach; 4), institutionalizing monitoring and evaluating systems; 5) developing a national constituency for biodiversity conservation and 6) advocating stronger international cooperation on biodiversity conservation.

The 206 biodiversity conservation priority areas identified by the PBCP were grouped according to major thematic groups (plants, arthropods, herpetofauna, birds, mammals, inland waters, mangroves, seagrasses, seaweeds, corals, molluscs, elasmobranchs, reef fishes, whalesharks, turtles, cetaceans and dugongs). In addition, 19 terrestrial and inland biodiversity corridors were also identified, covering "larger, interconnected networks of protected areas and their surrounding land.[70]

2.1.3 Key Biodiversity Areas (KBAs) - Terrestrial (2006) and Marine (2009)

Shortly after, the KBA approach was adopted in 2006 as a "framework for identifying fine-scale conservation priorities in the Philippines."[71] The concept is "part of a global initiative which focuses on the conservation of a site-specific habitat or range, considering the irreplaceability and vulnerability of the species found in that area."[72] Formal adoption of the framework was done in 2006 through Executive Order 578 which directed the DENR to formulate guidelines for the establishment of Critical Habitats and KBAs.[73] Identification of KBAs took off from the 206 Biodiversity Conservation Areas identified in the PBCP and the 117 Important Bird Areas (IBAs) identified by the Haribon Foundation and Birdlife International. One hundred twenty eight KBAs were identified for 209 globally threatened and 419 endemic species of freshwater fishes, amphibians, reptiles, birds and mammals, as well as 62 species of congregatory birds.[74] From these sites, 10 were labeled Alliance for Zero Extinction (AZE) sites, where safeguarding was of a higher priority than the other areas.[75]

To identify KBAs in both terrestrial and marine areas, vulnerability and irreplaceability of species were considered as criteria. The 2004 IUCN Red List was used to determine vulnerability in terrestrial KBAs and the 2008 IUCN Red List informed the identification of marine KBAs. A finding of Irreplaceability was triggered by the confirmed presence of geographically concentrated species.[76]

The KBA approach refined the identification of conservation priority areas in the PBCP. The conservation priority areas covered large areas and were identified without considering their management potential or "quantitative data to show the presence of target species needing conservation action." By contrast, the KBA approach made use of recent spatially referenced and validated information. It likewise enabled the identification of gaps in the national protected areas system by highlighting that KBAs do not necessarily overlap with protected areas.[77]

The KBAs increased from 128 to 228 with the addition of marine KBAs in 2009. Today, the area covered by KBAs total 10,565,192.87 hectares with terrestrial KBAs covering an area of 6,169,856.00 hectares and marine KBAs an area of 4,395,336.87. Only 3,644,413 hectares or 34.82% of these KBAs are within protected areas.[78] Institutional mechanisms to conserve KBAs outside protected areas (e.g. forest lands, non-NIPAS areas and ancestral domains) remain a challenge, but innovative governance approaches such as co-management and community conserved areas could address this need.[79]

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70 Ong, P., LE Afuang and RG Rosel-Ambal, eds. Philippine Biodiversity Conservation Priorities: A Second Iteration of the Philippine National Biodiversity Strategy and Action Plan. Quezon City, Philippines: DENR-PAWB, Conservation International Philippines, Biodiversity Conservation Program – University of the Philippines Center for Integrative and Development Studies and Foundation for the Philippine Environment, 2002.

71 Conservation International Philippines et al. Priority Sites for Conservation in the Philippines: Key Biodiversity Areas. Philippines: Quezon City, 2006.

72 Sinha, C. and L. Heaney. Philippine Biodiversity: Principles and Practice. Quezon City, Philippines: Haribon Foundation, 2006.

73 Executive Order 578, s. 2006. (8 November 2006), http://www.gov.ph/2006/11/08/executive-order-no-578/

74 Id

75 Id

76 Ambal R. G. R., M.V. Duya, M. A. Cruz, O.G. Coroza, S.G. Vergara, N. De Silva, N. Molinyawe, B. Tabaranza, "Key Biodiversity Areas in the Philippines: Priorities for Conservation," Journal of Threatened Taxa 4:8 (2012). Accessed 21 March 2014. http://threatenedtaxa.org/ZooPrintJournal/2012/August/o299506viii122788-2796.pdf

77 Id 2793

78 DENR Biodiversity Management Bureau. "PAWB Cue Cards FY 2014." Presentation from the DENR Biodiversity Management Bureau.

79 Guiang, E.S. and G.C. Braganza. *National Management Effectiveness and Capacity Assessment of Protected Areas in the Philippines: Draft Report.* Manila, Philippines: GIZ, 2014.

2.1.4 Philippine Biodiversity Strategy and Action Plan 2014-2025 (updated PBSAP)

In August 2012, the Philippines received a grant from the Global Environment Facility (GEF) to fund actions to "integrate the Philippines' obligations under the CBD into its national development and sectoral planning frameworks through a renewed and participative biodiversity planning and strategizing process in a manner that is in line with the global guidance contained in the CBD's Strategic Plan for 2011-2020."[80]

Among the deliverables under this grant is an updated PBSAP prepared through comprehensive stakeholder consultations. The updated PBSAP is to be complemented by Action Plans to: 1) raise awareness on biological diversity; 2) integrate the value of biodiversity into national and local development and poverty reduction strategies and planning processes, including national accounting and reporting systems; 3) implement the Program of Work on Protected Areas, including increased protection and landscape-seascape connectivity; 4) prevent extinctions of globally threatened species; 5) strengthen ecosystem resilience and the contribution of biodiversity to carbon stocks, including the restoration of at least 15% of degraded ecosystems; 6) identify cost estimates and funding sources and negotiate funding mechanisms to effectively implement the PBSAP; and 7) mainstream gender equality into the PBSAP and its implementation.[81] Other documents to support the updated PBSAP include a Framework Agreement among key institutions on information sharing on the status of Philippine biodiversity and a Reporting and Monitoring Framework.

In updating the PBSAP, the DENR-BMB created a Project Steering Committee (PSC) chaired by the DENR and co-chaired by NEDA. A Technical Working Group (TWG), which is chaired by the Assistant Director of the DENR-BMB, was also established to oversee and manage the consultation process and provide technical inputs, if and when necessary. Table 8 shows the full composition of the PSC and TWG.

Table 8.Management of the PBSAP updating process.

PBSAP Project Steering Committee	Project Technical Working Group
Chair: DENR Undersecretary for Staff Bureaus	Chair: Assistant Director, DENR-PAWB
Co-Chair: NEDA Deputy Director General	Members: Senior technical staff from NEDA, UNDP, DBM, DA-BFAR, CCC, NCIP, PCW, ACB, DENR-PAWB, DENR-FMB, DENR-MGB, DENR-PPSO, DENR-FASPO, Partner Academe, Partner NGOs
Members: UNDP, DSWD, DBM, DA-BFAR, CCC, NCIP, PCW, Haribon, DENR-PAWB, DENR-FMB, DENR-MGB, DENR-PPSO, DENR-FASPO	

Source: Draft PBSAP 2014-2025

Updating PBSAP entailed comprehensive consultations with government agencies, experts in the fields of biodiversity and ENR management, civil society organizations, private sector and communities on the ground. To allow for a more inclusive process, 5 of these consultations were held at the regional level while a national consultation was held in Metro Manila to validate the results of the regional activities (Table 9). These consultations were supplemented by focus group discussions (FGDs) with experts on various special topics, including on agricultural biodiversity and marine and coastal biodiversity.

80 Andres, Armida. "Overview of the Philippine Biodiversity Strategy and Action Plan Formulation Process." Presentation at the National Consultation for the Updating of the PBSAP, Pasig City, Philippines, November 2013.

81 Id

Table 9.PBSAP stakeholder consultations.

Consultations	Date	Place
Northern and Central Luzon	June 2013	Baguio City
National Capital Region and Southern Luzon	July 2013	Manila
Visayas	August 2013	Cebu City
Northern Mindanao	September 2013	Cagayan de Oro City
Southern Mindanao	October 2013	Davao City
National	November 2013	Pasig City

Figure 13 shows the process undertaken by the DENR-BMB in updating the PBSAP.

In summary, the evolution of the PBSAP from 1997 to 2013 shows commonalities in strategic goals, namely: knowledge generation and management, in-situ conservation (e.g. PAs, KBAs, natural habitats), policy and legislation, IEC, capacity building, advocacy and collaboration, thematic programs, operational objectives and cross-cutting strategies (Figure 14), with a new focus on thematic areas relevant to agrobiodiversity, urban biodiversity and genetic resources in the updated PBSAP (Figure 15).

Figure 13. PBSAP planning process

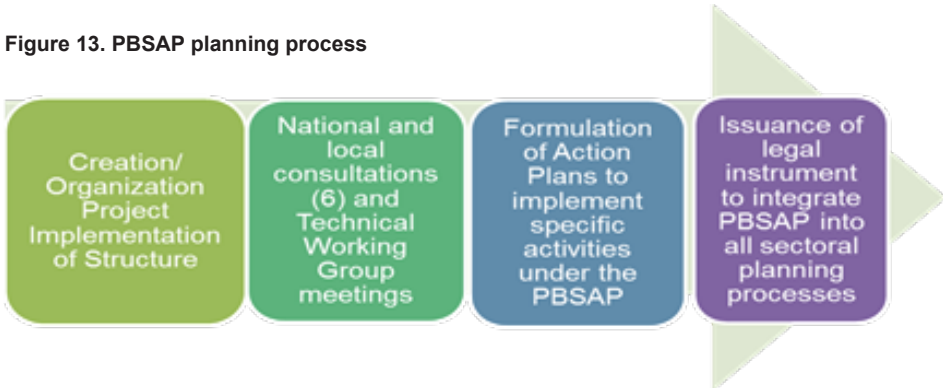


Figure 14. NBSAP Strategic Priorities, 1997 and 2002.

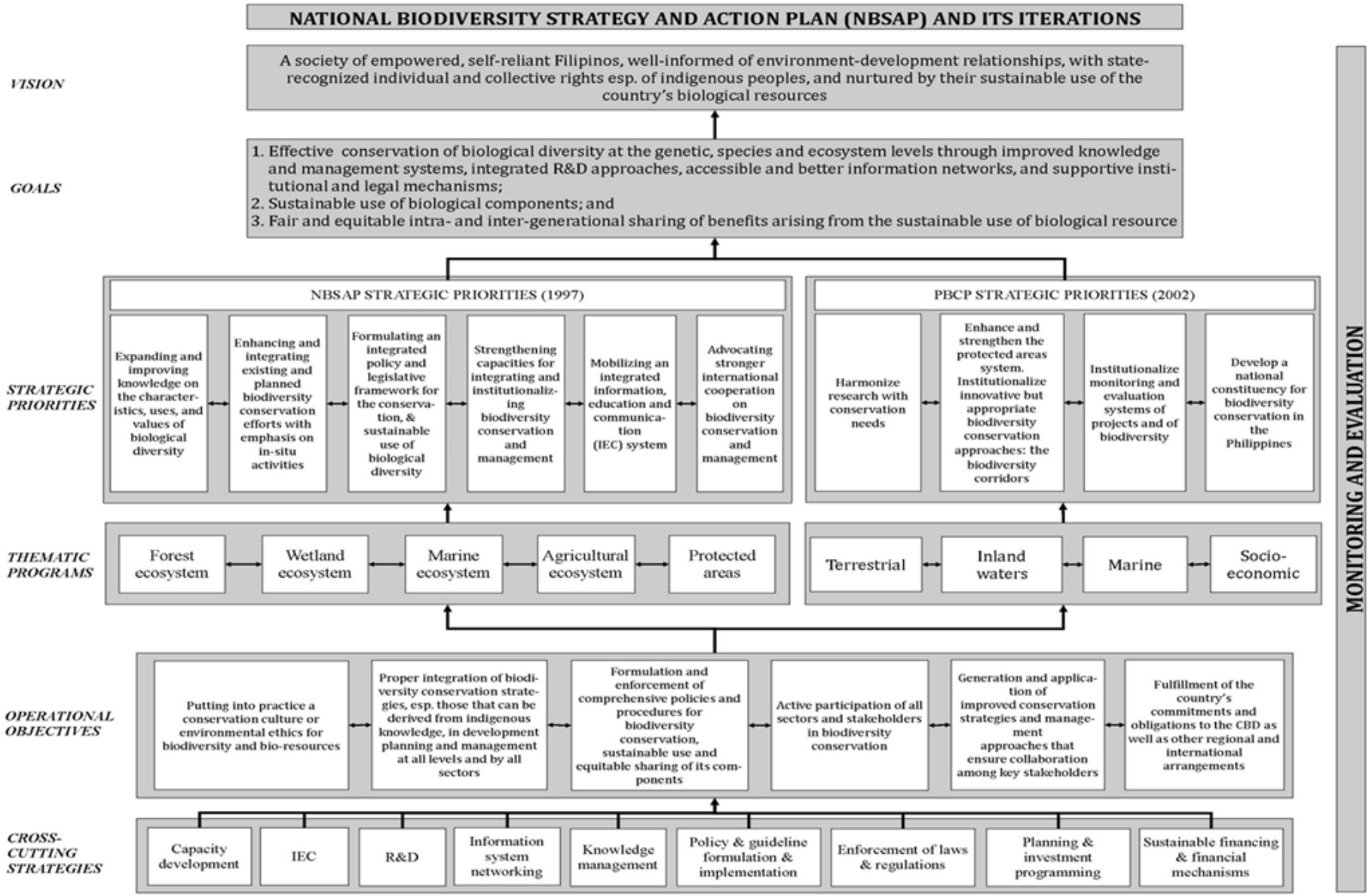
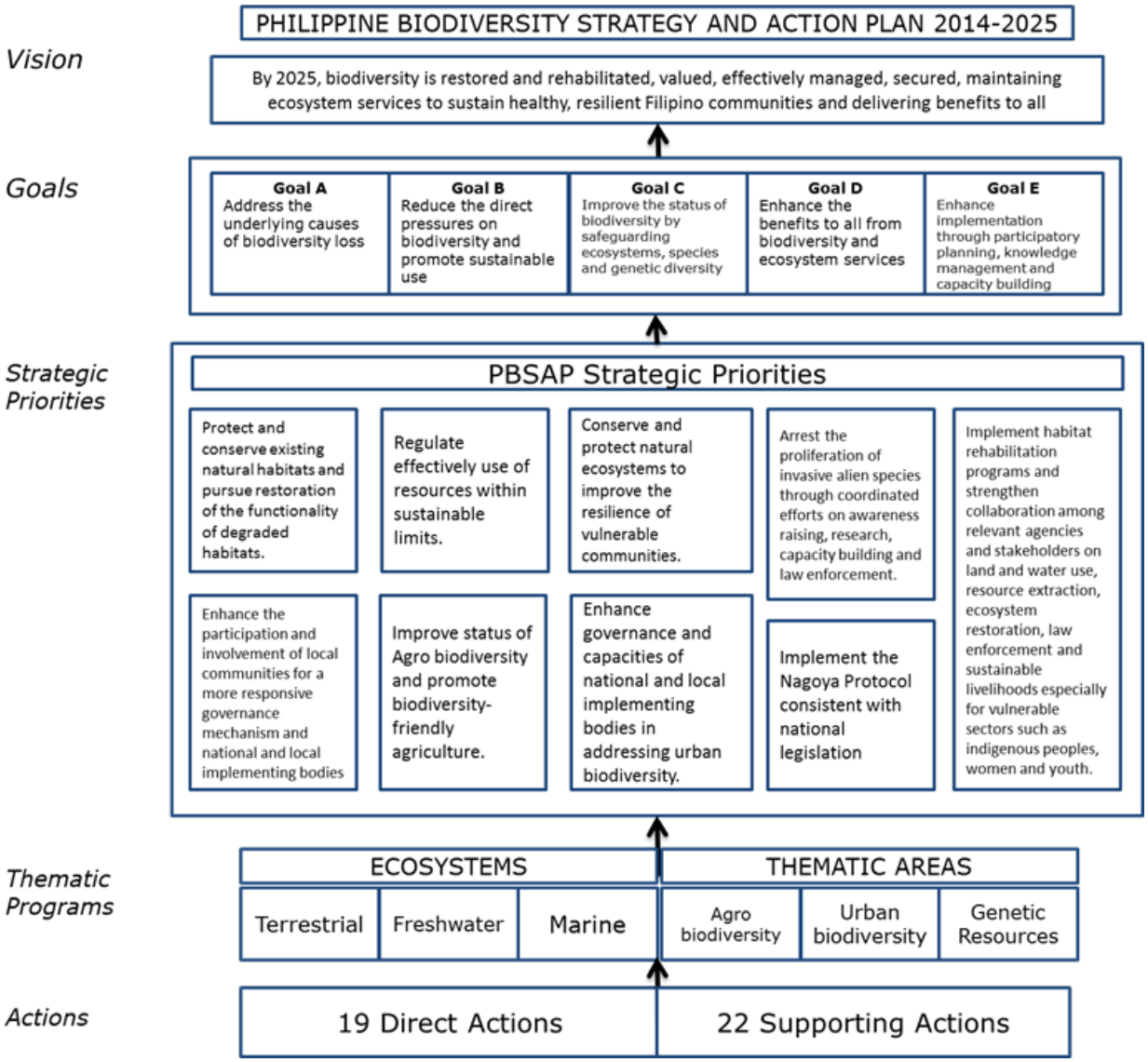


Figure 15. Updated PBSAP Strategic Priorities, 2014-2025.



The updated PBSAP is anchored on three major ecosystems (terrestrial, freshwater, and marine) and three thematic areas (agrobiodiversity, urban biodiversity and genetic resources). Nine priority strategies were identified, with 41 direct and supporting actions addressing 20 Aichi strategic targets, proposed timeframe, responsible agencies, monitoring partnerships, and projected costs of actions in the plan (see Annex 2).[82]

82 DENR Biodiversity Management Bureau. 2014. "Philippine Biodiversity Strategy and Action Plan (NBSAP) 2014-2025."

2.2 Biodiversity targets

The 4th National Report noted the difficulties posed by the absence of nationally agreed baselines, targets and indicators in assessing the country's progress toward meeting the 2010 biodiversity target.[83] The updated PBSAP 2014-2025 provides opportunities to address this gap and define and agree on national baselines, targets and indicators.

A scanning of policies, programs and projects formulated and implemented by and/or in cooperation with national and local governments, developmentalpartners,civilsocietyorganizations, private sector and local communities showed that even prior to the completion of the updated PBSAP, targets and indicators have been set in various policy and planning documents and in various programs and projects that somehow address the Aichi Biodiversity Targets. However, the collective outcome and impacts of these policies, programs and projects have not been measured. At the national level, the DENR-BMB is undertaking steps for harmonization and complementation across sectors and geographical areas in order to maximize resources, outcomes and impacts.

The updated PBSAP has made a conscious effort to set as its ultimate goal conformity to the Aichi Biodiversity Goals and Targets. Annex 3 shows the draft national targets and indicators identified for some priority strategies.[84]

2.3 Actions to implement and mainstream the PBSAP

The President is expected to issue an Executive Order directing government agencies and the private sector to mainstream the updated PBSAP into their respective plans and programs.

Many opportunities for mainstreaming biodiversity and ecosystems services into decision-making processes occur at all levels of governance-global, national, local and site levels. Intersecting entry points for mainstreaming include national and subnational policies and plans, economic and fiscal incentives, sector plans and policies and governance.[85]

The Philippines has developed and implemented initiatives at each of these entry points, as summarized in Table 10.

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83 Republic of the Philippines. "Assessing Progress Towards the 2010 Biodiversity Target: The 4th National Report to the Convention on Biological Diversity." Accessed February 15, 2014. http://www.ph.undp.org/content/philippines/en/home/library/environment_ energy/4th-national-report-biodiversity/

84 DENR Biodiversity Management Bureau. 2014. "Philippine Biodiversity Strategy and Action Plan (NBSAP) 2014-2025."

85 Ranganthan, J. et al. *Ecosystem Services: A Guide for Decision Makers.* Washington: World Resources Institute, 2008. Accessed February 15, 2014. http://www.wri.org/sites/default/files/pdf/ecosystem_services_guide_for_decisionmakers.pdf

Table 10. Entry points to mainstreaming the PBSAP into planning and development processes.

Entry Point	Department/Agency/ Organization	Examples of policies, programs, plans and projects
National and Subnational Policies, Programs and Plans	Development and planning	Land-use policies, planning and development, poverty reduction strategies, (e.g. Philippine Development Plan 2011-2016, Regional Development Plan, Provincial Physical Framework and Development Plan, City/Municipal Comprehensive Land Use and Development Plans)
	Environment	Protected area creation(e.g. Republic Act Nos. 10067, 9847,10629); climate adaptation and mitigation strategies [National Framework Strategy on Climate Change 2010-2022 (NFSCC), National Climate Change Action Plan 2011-2028 (NCCAP), Local Climate Change Action Plans]
	Treasury	National and local budgets, public expenditure reviews [e.g. General Appropriations Act, Regional/Provincial/City/Municipal Investment Plans, Climate Public Expenditure and Institutional Review (CPEIR)]
	Physical planning, emergency planning, and response	Integrated ecosystem management of coasts, river basins, watersheds [e.g. Integrated River Basin Management and Development Master Plan (for 18 major river basins), Provincial/ City/Municipal Disaster Risk Reduction and Management Plans]
Economic and fiscal incentives	Finance	Subsidies, tax credits, payments for ecosystem services, import duties, and tariffs
	Budget	Tax policies to support easements or promote alternative energy technology, pricing regulations for water
Sector Policies, Programs, and Plans	Commerce and industry	Corporate codes of conduct/standards, certification and incentive systems [e.g. for biodiversity-friendly business plans , codes of conduct for aquaculture practices and responsible fisheries, LGU Environment Codes, National Ecotourism Strategy and Action Plan (2013-2022)]
	Science and technology	Biosafety and biotechnology standards, access and benefit sharing
	Agriculture	Traditional and indigenous practices, certification schemes, action plans [e.g. National Action Plan to Combat Desertification, Land Degradation and Drought (2010-2020); Globally Important Agricultural Heritage Systems (GIAHS)]
	Biodiversity, Forestry, Environment and Natural Resources	State of the environment reports, action plans (e.g. Cave Action Plan 2011-2016, National Wetlands Action Plan 2011-2016, Biodiversity Partnerships Project (BPP); New Conservation Areas in the Philippines Project (New CAPP);Biodiversity+ Watershed Improved Services for Stronger Economy and Ecosystem Resilience (B+WISER)]
Governance	President, Department Secretaries, justice departments, legislature, local government bodies	Decentralization policies, civil society participation, , access to information and decisions, judicial reforms (e.g. Rules of Procedures for Environmental Cases)

Adapted From: World Resources Institute. 2008. Ecosystem Services: a Guide for Decision Makers.

2.3.1 National and Subnational Policies, Programs and Plans

National and subnational policies and directives guide local level priorities and program implementation.

Philippine Development Plan (PDP) 2011-2016

The PDP 2011-2016 details the strategies, programs and projects that the country sets out to accomplish during the term of the incumbent president. It adopts a framework of inclusive growth, or "sustained growth that creates jobs, draws the majority into the economic and social mainstream and continuously reduces mass poverty." By highlighting the protection and conservation of biodiversity as a special area of concern, the PDP acknowledges the threats to the country's natural resource wealth and uses this to inform priority actions to implement. To achieve the goal of improved protection and conservation of biodiversity, the PDP enumerates the following strategies:

- Conserve, preserve and manage protected areas, wildlife and their habitats;
- Prepare Protected Area Management Plans incorporating vulnerability and adaptability of sectors to disaster risk reduction and climate change;
- Institute and operationalize the concept of Payment for Environmental Services; and
- Continue implementing international commitments on biodiversity conservation, protection and rehabilitation.[86]

Biodiversity conservation is also considered in other chapters of the PDP. These include the chapters on Agriculture and Fisheries and Social Development, which include strategies for ecosystems-based management for increased resilience and better environmental management in Indigenous Peoples' Ancestral Domains.[87]

Local Land Use and Development Plans

As early as 2006, the Philippines had already taken steps toward mainstreaming by integrating principles of environmental stability and ecological integrity in the process of preparing Provincial/ City/Municipal Comprehensive Land Use Plans (CLUP). The guide prepared by the Housing and Land Use Regulatory Board (HLURB) likewise provided for a participatory approach to CLUP preparation, with "detailed area-specific plans such as coastal management plans, waste management plans, forest land use plans, heritage preservation plans" incorporated into the CLUP.[88]

At the national level, a draft bill providing for the crafting of a National Land Use Plan is currently pending before Congress. This draft policy proposes the creation of a National Physical Framework Plan which categorizes land resources according to those for Protection, Production, Settlements Development and Infrastructure Development. The President certified this bill as urgent in 2013.[89]

Meanwhile, to better mainstream the concepts of biodiversity conservation at the local level, the DENR-BMB has partnered with the HLURB to prepare guidelines to integrate biodiversity into CLUPs with assistance from the GEF-UNDP Project on Partnerships for Biodiversity Conservation: Mainstreaming in Local Agricultural Landscapes or the Biodiversity Partnerships Project (BPP). This Project runs from 2010 to 2016 and addresses fragmentation of PAs and KBAs by "making certain that activities in the production landscape conserve species assemblages and maintain ecosystem functions."[90].

To accomplish this, the capacity of LGUs has been given special attention with the view of enabling them to "plan and manage economic activities and growth in ways that meet landscape-level biodiversity conservation and sustainable use objectives in critical eco-regions."[91] Capacity building is supplemented by tools such as

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86 National Economic Development Authority. "Biodiversity Conservation in the Philippine Development Plan 2011-2016." Presentation given at the Visayas Regional Consultation for the Updating of the PBSAP, Cebu City, Philippines, 28 August 2013.
87 Id
88 Housing Land Use and Regulatory Board. *A Guide to Comprehensive Land Use Preparation Vol. 1.* Quezon City, Philippines: HLURB, 2006. Accessed November 2013. http://old.hlurb.gov.ph/uploads/agency-profile/lgu/brief-description.pdf
89 Casauay, Angela. "Aquino Certifies National Land Use Act as Urgent." *Rappler,* 2 February 2013. Accessed March 12, 2014. http://www.rappler.com/nation/20929-aquino-certifies-national-land-use-act-as-urgent.
90 United Nations Development Program. "Partnerships for Biodiversity Conservation: Mainstreaming in Local Agricultural Landscapes/ Biodiversity Partnerships Project." Accessed March 3, 2014. http://www.ph.undp.org/content/philippines/en/home/operations/projects/environment_and_energy/Biodiversity-Partnerships-Project/
91 Id

biodiversity overlays for land use plans to delineate corridors and buffer zones, fiscal and economic tools to promote biodiversity conservation, local tax incentives for biodiversity-friendly business development and financing and market incentives.[92] In addition, land use management options to conserve biodiversity have been recommended, among them the: a) assessment of the long-term implications of existing land uses on PAs, KBAs and critical habitats; b) integration of PA zoning with CLUP zoning; c) zoning of KBAs and critical habitats as part of CLUP zoning; d) monitoring of KBAs and critical habitats and limiting agriculture and settlements to multiple use zones; and, e) relocation of incompatible land uses within and in the periphery of critical habitats, KBA protection areas and PA core or strict protection zone.[93]

The project is being implemented in collaboration with the DA, DILG, Department of Trade and Industry (DTI), National Commission of Indigenous People (NCIP), Department of Tourism (DOT), Philippine Commission on Women (PCW), League of Provinces, Cities and Municipalities, Conservation International (CI) Philippines, Haribon Foundation, Flora and Fauna International (FFI), Philippine Eagle Foundation (PEF), Lake Mainit Development Alliance (LMDA) and Philippine Biodiversity Conservation Foundation, Inc. (BCFI) and LGUs in 8 project sites. These sites include the Magapit Protected Landscape in Cagayan province, Quirino Protected Landscape in Quirino province, Mt. Siburan in Mindoro, Malampaya Sound, Central Panay Mountains, Northern Negros National Park, Lake Mainit in Surigao del Norte and Mt. Hamiguitan in Davao Oriental. These span 700,000 hectares in 5 bio-geographic regions.

National Framework Strategy on Climate Change 2010-2022 (NFSCC) and National Climate Change Action Plan 2011-2028 (NCCAP)

The NFSCC 2010-2022 was formulated pursuant to the Climate Change Act of 2009. It is the roadmap for a national program on climate change and establishes an agenda, which is further elaborated in the National Climate Change Action Plan (NCCAP).[94] Broadly, the NFSCC sets out the national goal for climate change: to build the adaptive capacity of communities and increase the resilience of natural ecosystems to climate change and optimize mitigation opportunities towards sustainable development.[95]

The NCCAP outlines seven strategic priorities to achieve this goal: 1) food security; 2) water sufficiency; 3) environmental and ecological stability; 4) human security; 5) sustainable energy; 6) climate-smart industries and services; and 7) knowledge and capacity development. Recognizing that climate change will bring about additional adverse impacts to ecosystems, the NCCAP has prioritized the protection and rehabilitation of ecosystems and the restoration of ecological services.[96]

Five outcomes are expected to achieve this objective:

1) Climate Change mitigation and adaptation strategies for key ecosystems developed and implemented

2) Management and conservation of PAs and KBAs improved

3) Environmental laws strictly implemented

4) Capacity for integrated ecosystem-based management approach in PAs and KBAs enhanced

5) Natural resource accounting institutionalized.[97]

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92 Mercene, Renato. "Multi-sector Partnership Crucial in Eco-Conservation." *Business Mirror,* 21 November 2012. Accessed February 25, 2014. http://businessmirror.com.ph/index.php/en/news/nation/3697-multi-sector-partnership-crucial-in-eco-conservation

93 Id

94 Philippines -- Climate Change Commission. "National Framework Strategy on Climate Change 2010-2022".

95 Id, 16

96 Philippines -- Climate Change Commission. 'National Climate Change Action Plan 2011-2028.' Accessed March 10, 2014. http://adaptationmarketplace.org/data/library-documents/NCCAP_TechDoc.pdf

97 Id, 9

2.3.2 Economic and Fiscal Incentives

Balancing biodiversity conservation with the needs of local communities for subsistence and livelihood is key for effective and sustainable national resource management. Philippine policies and programs allow for opportunities to provide local communities with sustainable sources of funds for PA management and support for biodiversity-friendly livelihood activities. Because of these, communities are incentivized to protect biodiversity in their areas to maintain the ecosystem services that they provide.

National Framework Strategy on Climate Change 2010-2022 (NFSCC) and National Climate Change Action Plan 2011-2028 (NCCAP

The IPAF is a mechanism created under the NIPAS Act to provide a source of funding for the continued protection, maintenance and management of the PA. It is derived from taxes from the permitted sale and export of flora and fauna and other resources from within the PA, proceeds from the multiple use areas, contributions from industries and facilities and other fees. The IPAF seeks to address "uncertainty in competing for national appropriation and ensures that the revenues raised from the site will be invested back to protect it."[98]

Twenty years since the passage of the NIPAS Act, the IPAF collection has reached Php220 million, with majority of the funds coming from top-earning PAs (Table 11).

Table 11. IPAF collection from top-earning PAs.

Protected Area	IPAF Collection (PhP)	IPAF Collection (USD)
Ninoy Aquino Parks and Wildlife Nature Center	78,522,680.00	1,869,587.00
Apo Island Protected Landscape/ Seascape	35,420.594.05	843,347.00
Hinulugang Taktak National Park	13,023,843.00	310,091.00
Lower Agno Watershed Forest Reserve	11,574,963.00	275,594.00
Upper Agno River Basin	10,625,000.00	252,976.00
Apo Reef Marine Reserve	10,496,877.00	249,976.00
Tañon Strait Protected Seascape	9,330,454.75	222,153.00
Manleluag Hot Spring	5,111,352.17	121,698.00
Mt. Pulag National Park	4,820,707.53	114,778.00
Biak-na-Bato National Park	4,608,975.00	109,737.00

Source: UNDP et al. 2012. Communities in Nature: State of Protected Areas Management in the Philippines

98 United Nations Development Program et al. *Communities in Nature: State of Protected Areas Management in the Philippines*. Philippines: DENR-PAWB, 2012.

As of December 2013, a total of PhP 282.8 million has been deposited to the IPAF. Seventy-five percent or PhP 212.1 million has accrued to the IPAF Sub-Fund or that which can be accessed by depositing PAs while 25% or PhP 70.7 million has been deposited to the Central IPAF which is available to non-revenue generating PAs and/ or for activities benefitting PAs. A review of IPAF collections, procedures and status of all 240 PAs undertaken by the GEF-UNDP NewCAPP showed that the IPAF implementation from 1992 to2012 has been problematic. Only 62% or 149 of the 240 PAs have IPAF sub-funds, and only 66% of the 149 PAs are able to generate revenues. The low income is attributed to low user and development fees. Table 12 shows the IPAF revenues as of December 2013.

Table 12. IPAF revenues as of December 2013

IPAF Fund	Income (PhP)
Central IPAF	70,692,669
PA Sub-Fund	212,078,006
Total IPAF	282,770,674

Source: DENR-BMB

Linkages have been established with the Department of Budget and Management (DBM) and Bureau of Treasury (BTr) to streamline and strengthen IPAF access and utilization and draft an IPAF Handbook to guide Protected Area Superintendents in setting up, accessing, recording, reporting and monitoring IPAF collections. In September 2013, Republic Act 10629 was passed allowing retention of 75% of IPAF revenues generated by PAs. A joint DBM-DENR Memorandum Circular providing implementation guidelines for this new policy is being drafted.

Reducing PA Funding Gap through Business Planning and Innovative Financing Mechanisms

Development of biodiversity-friendly business plans and new livelihood activities at the community level have been prioritized in PAs and KBAs. Under the GEF-UNDP Partnerships for Biodiversity Project, biodiversity-friendly businesses were documented in two demonstration sites in Mt. Siburan in Occidental Mindoro and Mt. Hamiguitan in Davao Oriental. Under the Sustainable Financing of Protected Areas Project of the World Bank-DENR National Program Support for Environment and Natural Resource Management Program (NPS-ENRMP), 18PA Business Plans were developed to help generate revenues, which include options to implement Payment for Ecosystem Services (PES) schemes necessary to sustain PA management. A total of PhP 2.6 billion was estimated as investment requirement for 18 PA Business Plans of which only PhP 553.6 million is expected to be generated. Table 13 shows several financing mechanisms designed and pilot-tested in specific PAs.

Table 13. Financing mechanisms pilot-tested in specific PAs.

Financing Mechanisms	PA Sites
Payment for Ecosystem Services (PES)	1) Mts. Banahaw-San Cristobal Protected Landscape (MBSCPL) 2) Mt. Malindang Range Natural Park (MMRNP) 3) Mt. Kalatungan Range Natural Park (MKaRNP)
User Fees	4) Mt. Isarog Natural Park (MINP) ▪ Water use fee (water districts, minihydro) ▪ Entrance fee ▪ Facilities user fee
	5) Bulusan Volcano Natural Park (VBNP) ▪ Entrance fee ▪ Facilities user fee ▪ Water use fee (water districts)
	6) Sagay Marine Reserve (SMR) ▪ Entrance fee, diving fee (Carbin Reef, Suyac *Island Mangrove Eco-Park)* ▪ Resource Use Fees ▪ Facilities fee
	7) Naujan Lake National Park (NLNP) ▪ Entrance fee ▪ Fishery resource use fee ▪ Agricultural production fee ▪ Water use fee (water districts)
	8) Bataan National Park (BNP) 9) Central Cebu Protected Landscape (CCPL) 10) Mt. Malindang Range Natural Park (MMRNP) 11) Ninoy Aquino Parks and Wildlife (NPWNC) ▪ Special Use Agreement for Protected Areas (SAPA) fees ▪ Telecommunications fees ▪ User fees for filming and still photography in PAs ▪ Entrance fees
Public-Private Partnership	▪ Ninoy Aquino Parks and Wildlife Center (NAPWC) ▪ Mt. Isarog Natural Park (MINP) 12) Mt. Apo Natural Park (MANP)
Damage Estimation	▪ Mt. Apo Natural Park (MANP) 13) Mt. Kanlaon Natural Park 14) Mt. Kitanglad Range Natural Park (MKRNP)
Enterprise Development	15) Northern Negros Natural Park (NNNP) 16) Mt. Kanlaon Natural Park (MKNP)

***There were no financing mechanisms pilot-tested in two sites- Manleleuag Spring National Park and Palay – Palay National Park. Only business planning processes were envisioned for these two sites.**

Under the ICRMP, 55 enterprises (e.g. Reef Discovery, River/Mangrove Expedition, Forest Adventure, Culinaryservices, Nature Village, Arts & Crafts, Island/Forest Spa) were developed in 22 sites and 1,118 self-reliant group members (34% women) trained in entrepreneurial skills.[99]

99 Department of Environment and Natural Resources. *Sustaining our Coasts: The Ridge-to-Reef Approach -- A Compilation of Technical and Policy Papers: National Integrated Coastal Management Program (NICMP).* Quezon City, Philippines: DENR Integrated Coastal Resources Management Project (ICRMP), 2013.

2.3.3 Sector Policies, Programs and Plans

Specialized environments and industries give rise to unique areas of concern. In recent years, efforts have been made to develop strategies and plans that address particular issues and needs of individual sectors that interface with the mandates and resources of government agencies and the expertise of CSOs and other stakeholders.

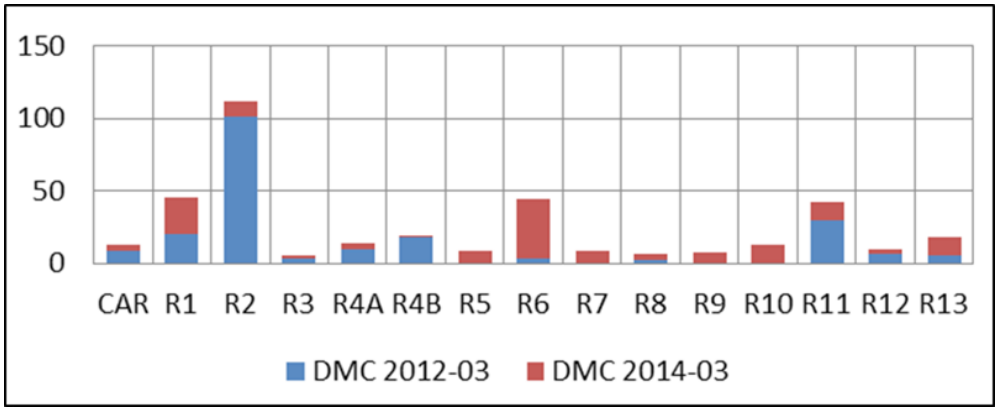
National Cave Action Plan (2011-2016)

The National Cave Action Plan (2011-2016) was formulated to implement the Cave Management, Protection and Conservation Program (CMPCP), the national program developed pursuant to under Republic Act 2072, or the National Caves and Cave Resources and Protection Act of 2001 and its Implementing Rules and Regulations.

The Action Plan lists six goals, framed to correspond to the components of the CMPCP. These include: 1) Caves and Cave Resources Assessment, Management and Conservation; 2) Sustainable Utilization of Cave Resources for Subsistence and Commercial Purposes; 3) Visitor Impact Management; 4) Conservation, Education and Public Awareness; 5) Human Resource Development and 6) Research and Development. It provides for the preparation of individual Cave Management Plans for each classified cave or cave system, which shall be harmonized with existing biodiversity management plans. Correspondingly, the presence of rare, endangered or endemic species is a factor considered in closing off portions of caves to visitor entry.[100]

Many caves have been officially classified for appropriate use based on assessment results, starting with an initial list of 76 caves, to 158 caves in 2012 and 206 caves in 2014 (Table 14[101,102])

Table14. List of classified caves, 2012 and 2014.



Source: DENR-BMB, 2014.

100 DENR-Protected Areas and Wildlife Bureau. *A Handbook on Cave Classification for the Philippines.* Quezon City, Philippines: DENR-PAWB, 2008.

101 Philippines – DENR Biodiversity Management Bureau. "PAWB Cue Cards FY 2014." Presentation from the DENR Biodiversity Management Bureau

102 Based on Department Memorandum Circular (DMC) 2007-04, DMC 2012-03 and 2014-03. DMC 2007-04, Section 3 classified caves according to: Class I - Caves with delicate and fragile geological formations, threatened species, archaeological and paleontological values, and extremely hazardous conditions; Class II- Caves with areas or portions which have sections that have hazardous conditions and contain sensitive geological, biological, archaeological, cultural, historical, and biological values or high quality ecosystem; and Cave III- Caves generally safe to inexperienced visitor with no known threatened species, archaeological, geological, natural history, cultural and historical values.

National Ecotourism Strategy and Action Plan (2013-2022)

The National Ecotourism Strategy and Action Plan (NES) 2013-2022 was completed in February 2014, updating the earlier strategy which was implemented from 2002 to 2012 (see related story in Box 4). This plan was launched during the World Ecotourism Conference in February 2014.

The NES aims to promote "environmentally and socially responsible ecotourism development that safeguards the integrity and diversity of its natural resources, provides education and enjoyment to visitors and delivers larger and more widely distributed income and employment opportunities to the local communities and their constituents, especially women, youth, indigenous peoples and other vulnerable groups."[103]

The conservation of biodiversity is given high priority in the NES. Biodiversity significance is considered in the selection of priority ecotourism sites. The Action Plan likewise specifically includes an objective on monitoring visitor impact of ecotourism activities on biodiversity.

Updated National Action Plan (NAP) to Combat Desertification, Land Degradation and Drought 2010-2020

The NAP 2010-2020 developed in 2010 focuses on: a) highland, hilly land and upland ecosystems in which climatic drivers and human-induced activities result in land degradation and loss of biodiversity and b) lowland ecosystems which experience seasonal aridity and drought that could result in low productivity and reduced farm income. It consists of three long-term strategic thematic programs, namely: 1) creation of livelihood to affected population; 2) sustainable use and management of affected ecosystems; and 3) formulation of a national adaptation platform to climate change for food security and improved resilience to natural disasters.

The NAP is a working document for synergy among the three Multilateral Environmental Agreements (MEAs) on biodiversity, climate change and land degradation at the country level and the convergence of actions among national government agencies, LGUs and CSOs to contribute to hunger mitigation and poverty reduction and environmental sustainability. One of the expected outputs of the NAP is a compendium of bio-references for the selection of suitable agricultural commodities for agro-biodiversity and forest development. The current NAP is being updated for alignment with the UNCCD 10-year Strategic Plan and Framework.

National Wetlands Action Plan (2011-2016)

The National Wetlands Action Plan 2011-2016 guides the promotion and implementation of strategies and actions for the conservation and wise use of wetlands, incorporating urgent concerns such as biodiversity conservation and climate change mitigation and adaptation."[104]

The current plan is an updated version of the 1993 Wetlands Action Plan and takes into account new developments and issues, such as the threats presented by climate change. It was prepared at the National Conference on Wetlands, Climate Change Adaptation and Biodiversity Conservation in 2009 and subjected to a series of Regional Consultations and validations with key stakeholders throughout 2012.[105] It harmonizes and engages government agencies, LGUsCSOs, business sector, small communities and IPs in the management and sustainable use of wetlands.

The Action Plan envisions Philippine wetlands that are "ecologically healthy and are able to provide products, functions and services for the equal benefit of people and nature."[106] To accomplish these, four thematic areas with respective supporting goals were identified, namely: – Wetlands Policy, Inland Wetlands, Coastal and Marine Wetlands and Enabling Strategies.The Action Plan also recognizes ecotourism as a conservation strategy that will spur inclusive growth of the basic sectors dependent on wetland resources and address water and food security. Nine inland wetlands and 28 coastal and marine wetlands have been prioritized to optimize resources and achieve maximum impacts and outcomes.[107]

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103 DENR Biodiversity Management Bureau. "National Ecotourism Strategy and Action Plan (2013-2022)".

104 Philippines – DENR Biodiversity Management Bureau. "National Wetlands Action Plan 2011-2016." Accessed March 15, 2014. http://www.psdn.org.ph/wetlands/nwap_phils_2011_part3.pdf.

105 Id.

106 Id 37

107 Id 38

National Action Plan for the Sustainable Use and Protection of Philippines Peatlands

The National Action Plan for the Sustainable Use and Protection of Philippines Peatlands takes off from the ASEAN Peatland Management Initiative and the ASEAN Peatland Management Strategy developed in 2009 with concerned government agencies, local government units and academe and non-government organizations.[108]

This Plan's ultimate goal is to "promote the sustainable management and wise use of peatlands through awareness raising, capacity building and enhanced inter-agency cooperation for the conservation of biodiversity, climate change mitigation and the benefit of the local community."[109] To this end, it proposed strategies for peatland management, institutional strengthening and allocation of resources. A multisectoral inter-agency working group was likewise created to oversee the development of an institutional framework for peatland management.[110]

Pilot sites for these strategies were the Caimpugan Peatlands within the Agusan Marsh and the Peatlands in the Leyte Sab-a Basin. Since 2012, key personnel from national government agencies and LGUs as well as stakeholders from local communities have been trained in peatlands assessment and management, participating in activities such as study tours and on –the-job trainings. Information materials on peatlands conservation have likewise been translated into local languages and have been disseminated.[111]

Through these efforts, the Caimpugan Peatlands were included in the proposed expansion area of the Agusan Marsh Wildlife Sanctuary. Lobbying for the declaration of the Leyte Sab-a Peatlands as a Critical Habitat has also been underway. Mapping of other probable peatland areas in the Philippines has been ongoing since 2010.[112]

2.3.4 Governance

Governance, at all levels, is key to biodiversity conservation and management. This includes participation by all stakeholders from national government agencies (including the executive, judiciary and legislative bodies), LGUs, CSOs and research institutions, private sector and local communities. Some examples of governance mechanisms are mentioned below.

Table 15. LCA approaches in pilot areas.

Pilot Areas	LCA Approaches
Municipality of Mangatarem, Pangasinan	Expansion of the Manleluag Protected Landscape and Seascape, an existing PA
Bud Bongao Municipality, Tawi-Tawi	Co-management Agreement between the DENR-ARMM, DENR-PAWB and LGU
Nug as Lantoy KBA, Cebu	Agreement between three municipalities to establish an LCA biodiversity corridor
Mt. Nacolod, Southern Leyte	Agreement between seven LGUs to establish an LCA covering 14,000 hectares of forests
Mt. Tapulao, Zambales	Establishment of 17,000 hectares of LCAs
Pollillo Group of Islands, Quezon	Agreement between five LGUs to establish a network of LCAs covering more than 10,000 hectares

Source: GEF- UNDP-DENR NewCAPP

108 Philippines – DENR-Protected Areas and Wildlife Bureau. *National Action Plan for the Sustainable Use and Protection of Philippine Peatlands.* Quezon City, Philippines: DENR-PAWB, 2009.

109 Id 7

110 Id 8

111 National Economic Development Authority. "Integrating Biodiversity into Poverty Reduction Strategies and Development". Presentation given at the Second Expert Group Meeting on Biodiversity for Poverty Eradication & Development, Chennai, India, December 2013.

112 Id

Box 4. Milestones and Next Steps in Philippine Ecotourism Development

Anchored on Executive Order 111, the formulation of the National Ecotourism Strategy and Action Plan (NESAP) 2002– 2012 was one of the components of the first phase of the National Ecotourism Project (NEP I) funded through a grant from New Zealand AID (NZAID) and jointly implemented by the Department of Tourism (DOT) and Department of Environment and Natural Resources (DENR). The NESAP aims to provide an integrated management plan for a comprehensive direction for ecotourism development in the Philippines.

The approval of the NES in 2001 and its implementation from 2002 to 2012, under NEP I, was accompanied by capacity-building trainings of EO 111 bodies and development of ecotourism products in four pilot sites (Banaue Rice Terraces, Sapang Bato in Pampanga, Pamilacan Island in Bohol and Mt. Apo Natural Park in Davao). Aside from these, publicity and information dissemination on ecotourism through the creation of website (www.ecotourismphilippines.com) and quarterly newsletters, were also improved.

The second phase of the NEP (NEP II) built on the outcomes of Phase 1 with an overall goal of mainstreaming ecotourism into DENR's community-based resource management programs. Among the highlights of Phase II are the following:

- Establishment of income generation projects and creation of employment among disadvantaged groups including women, youth and indigenous peoples at the phase II banner sites (Hundred Islands National Park, Mt. Mayon Volcano National Park, Lake Sebu Watershed and Forest Reserve, Rajah Sikatuna Protected Landscape in Bohol);
- Expansion of employment opportunities and community income generation at two of the three Phase I banner sites (Sapang Bato in Pampanga, Pamilacan Island in Bohol);
- Improvements in sustainable resource management and reduction in unsustainable activities at a number of banner sites;
- Development of training modules in ecotourism;
- Development of key policy initiatives, such as the DOT Ecotourism Standards
- Implementation of a number of ecotourism-focused marketing initiatives by DOT

Mt. Kitanglad Range Natural Park, Bukidnon
Photo by: Earl Ryan Janubas

Apo Reef Natural Park
Photo by: George Tapan

The NESAP 2013–2022 is paving the way towards globally competitive ecotourism sites, services and products that will contribute to the country's inclusive growth, incorporating recently issued policies that provide better frameworks for ecotourism development such as the new Tourism law (Republic Act or RA 9593), the PDP and the recently formulated National Tourism Development Plan (NTDP), among others.
NESAP 2013–2022 carries the vision of: "The Philippines as a globally competitive ecotourism destination with its wealth of natural beauty and cultural richness, conscious of the need to conserve, enhance, sustain and develop these assets and ensure equitable sharing of benefits among its people." This is set to achieve through the following strategies:

1. Developing and marketing diversified and competitive ecotourism products
2. Creating conducive environment for ecotourism investments
3. Maximizing economic benefits for the host communities
4. Promoting and developing a culture of ecotourism
5. Strengthening institutional capacity
6. Developing and strengthening partnerships
7. Establishing Mechanisms for Sustainable Financing
8. Monitoring outcomes and impacts

DENR Administrative Order 2013-19 (1 July 2013) prescribes further Guidelines on Ecotourism Planning and Management in Protected Areas. This outlines the four phases for Ecotourism Planning and Management, including site assessment, ecotourism planning, implementation and monitoring and evaluation. Ecotourism development pursuant to these Guidelines is being piloted in the Apo Reef National Park, Taal Volcano Protected Landscape, Calbiga Caves Protected Landscape and Mt. Pulag National Park.

Climate Change, Biodiversity and Eco-towns

The Climate Change Commission (CCC) has also spearheaded the establishment of Eco-towns, to implement the NCCAP at the local level. Eco-towns are "planning units composed of municipalities or a group of municipalities located within and around boundaries of critical KBAs, which are at high risk to climate change. They will be built around PAs and KBAs, using ecosystem-based approach that will scale up best practices." This approach aims to increase the communities' adaptive capacity to climate change impacts by providing eco-friendly economic opportunities and promoting the protection, conservation and management of ecosystems.[113]

Currently, demonstration sites have been launched in: 1) San Vicente, Palawan; 2) Siargao Island in Surigao del Norte; 3) the province of Eastern Samar; 4) the province of Batanes and 6) the Upper Marikina River Basin and Protected Landscape.

Managing natural resources in the new Bangsamoro Political Entity

The signing of the Framework Agreement on the Bangsamoro in October 2012, and the Comprehensive Agreement on the Bangsamoro (CAB) in March 2013 culminated 7 years of peace negotiations between the Philippine State and the Moro Islamic Liberation Front (MILF) over one of the country's most conflict-ridden areas. Through the peace accord, both parties agreed to establish a new Bangsamoro political entity, with defined exclusive powers.

Under the Annex on Revenue Generation and Wealth Sharing, income derived from the exploration, development and utilization of natural resources within the Bangsamoro shall be allocated as follows:

- For non-metallic minerals such as sand, gravel and quarry resources within the Bangsamoro, revenues pertain to the Bangsamoro and its local government units;

- For metallic minerals within the Bangsamoro, seventy-five percent (75%) of revenues pertain to the Bangsamoro; and

- For fossil fuels such as petroleum, natural gas and coal, and uranium, revenues shall be shared equally between the Bangsamoro and Central governments.[114]

Once finalized by the legislature and through a plebiscite in identified areas, the Bangsamoro territory could potentially cover critical ecosystems such as the Liguasan Marsh, which spans the provinces of North Cotabato and Maguindanao. The marsh is one of the richest biodiversity areas in the region and is notably home to the endangered Philippine Crocodile. Its potential for natural gas extraction has been flagged, but has yet to be officially verified.

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113 Philippines -- Climate Change Commission. "Ecotown Demonstration Framework." Accessed March 10, 2014. http://www.climate.gov.ph/project/ecotown

114 Annex on Revenue Generation and Wealth Sharing (13 July 2013), Section VII, available at http://www.opapp.gov.ph/milf/news/annex-revenue-generation-and-wealth-sharing

Enforcing Environmental Justice

In 2010, the Philippine Supreme Court approved the Rules of Procedure for Environmental Cases.[115] These special rules cover civil and criminal cases and special civil actions involving the enforcement and violation of environmental laws. These rules also allow aggrieved individuals, communities or organizations to avail of the remedies of the Writ of Continuing Mandamus and Writ of Kalikasan where judicial action is required to safeguard their right to a balanced and healthful ecology.

The remedy of the Writ of Continuing Mandamus is available to compel government agencies or officers to perform an act or series of acts in connection with the enforcement or violation of environmental laws. It was introduced to Philippine jurisprudence even prior to the Rules of Procedure, in a landmark action brought to clean up and rehabilitate the Manila Bay.[116] In ordering the concerned government agencies to carry out this clean up and rehabilitation, as well as undertake actions to preserve and restore its waters, the Supreme Court recognized that Manila Bay required not only a cosmetic clean up, but a long-term solution. Continuing mandamus was the remedy to ensure that the Court's decision "would not be set to naught by administrative inaction or indifference."[117]

Actions have been taken to comply with the Court's judgment. In 2011, the final draft of the 2011-2015 Operational Plan for the Manila Bay Coastal Strategy was presented to the Manila Bay Advisory Council and the Court. This Plan includes measures such as improving wastewater and sanitation facilities that empty out into the Bay, coastal clean-up of the Bay and its catch basins, mangrove reforestation and identifying areas for phyto and bio-remediation.[118]

The remedy of the Writ of Kalikasan may be sought where the environmental damage involved is of such a "magnitude as to prejudice the life, health or property of inhabitants in two or more cities or provinces."[119] The Rules of Procedure for Environmental Cases also allow for the issuance of a Temporary Environmental Protection Order (TEPO) in cases where urgent action is required. Several Writs of Kalikasan have been issued by Philippine courts.

In October 2010, the DENR adopted the Wildlife Law Enforcement Manual of Operations as guide for the Wildlife Enforcement Officers (WEO), DENR Wildlife Traffic Monitoring Units (WTMU), Deputy/Special Deputy Environment and Natural Resources Officers (DENRO/SDENRO) and other stakeholders in the enforcement of the provisions of R.A. No. 91 47 and other relevant wildlife laws, rules and regulations. This Manual provides the sets of standards and protocols in investigation and surveillance, search, arrest and detention of suspects, apprehension, seizure and handling of evidence and filing and prosecution of cases. It takes into consideration the existing procedures of various agencies such as the investigation process of the National Bureau of Investigation, the rules of engagement of the Philippine National Police and the Rules of Procedure for Environmental Cases of the Supreme Court, among others. It also presents a set of protocols to address implementation gaps in wildlife law enforcement scenarios in airports and seaports as well as the protocols to be observed relating to the custody of seized and confiscated wildlife specimens, by-products and derivatives.

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115 AM No. 09-6-8-SC

116 Metro Manila Development Authority et al v. Concerned Residents of Manila Bay G.R. Nos. 171947-48 (18 December 2008)

117 *Id*

118 DENR Foreign Assisted and Special Projects Office. "2011 Annual Performance Report".

119 Rule VII Sec 1 AM No. 09-6-8

CHAPTER 3

Progress towards the 2020 Aichi Biodiversity Targets and Contribution to the 2015 Targets of the Millennium Development Goals

3.1 Progress towards the 2020 Aichi Biodiversity Targets

Even prior to the completion and adoption of the updated PBSAP 2014-2025, macro frameworks, policies, programs, projects and activities have already integrated the goals and objectives of the Strategic Plan for Biodiversity 2011-2020 and the Aichi Biodiversity Targets.

Some of these programs/plans/activities (P/P/As) are under preparation while others are already being implemented and are directly or indirectly contributing to the actualization of the Aichi Biodiversity Targets (Annex 3). Others being undertaken by different stakeholder groups are not listed in Annex 3, hence efforts should be made to update this list and determine the aggregate impact of these conservation efforts.

The discussion of each target under specific goals represents examples of P/P/As. Some of these examples, however, also respond to other targets under other goals. It is hoped that once the updated PBSAP is finalized, the next national report will specifically focus on reporting on targets using indicators identified in the PBSAP.

Goal A: Address the underlying causes of biodiversity loss by mainstreaming biodiversity across government and society

The relevant Aichi Targets to accomplish Goal A are Targets 1 (Awareness of biodiversity), 2 (Integration of biodiversity values), 3 (Incentives) and 4 (Use of natural resources). These targets are currently addressed through some initiatives described below.

Target 1. Awareness of biodiversity

Awareness of biodiversity continues to increase as a result of regular and donor-funded programs, plans and activities that incorporate communication, education and public awareness (CEPA). The BMB's CEPA activities are informed by a communications plan, which was first drafted in 2012 and is currently being updated to reflect the increased scope of the Bureau's functions and the implementation of new donor-funded projects. The DENR-BMB likewise developed branding strategies in 2014, focusing on the interconnectedness and interdependence of biodiversity elements. This message can be customized to different ecosystems and biodiversity concerns.

The DENR-BMB continues to conduct CEPA activities on biodiversity and nature conservation through various approaches such as the conduct of orientation-seminars, lectures, trainors' trainings using the Dalaw- Turo (literally "visit –teach"), press briefings, radio and television plugs, social media blogs, exhibits, summer camps, interpretive tours and eco-walks, calendars, special events and produce learning materials such as coloring books, field guides and coffee table books.[120] Schools and selected barangays in Metro Manila in particular have acquired new knowledge through biodiversity road shows and caravans. In-house education and capacity building is also a priority, with an education program on the Bureau's various biodiversity initiatives for DENR-BMB personnel implemented in 2012 and 2013.

In addition, the DENR-BMB maintains the Philippine Clearinghouse Mechanism (CHM), a web-based system that facilitates the sharing of data and information on the conservation and sustainable use of biodiversity between and among the various stakeholders in the country."[121] While it is an important source of information, updating and sustaining a dynamic CHM remains

120 DENR-PAWB/BMB Major Accomplishments 2013

121 "About Philippine CHM." Philippine Clearinghouse Mechanism for Biodiversity. Accessed 15 February 2014. http://www.chm.ph/

a continuing challenge unless biodiversity partners start and/or continue to contribute and populate it with information and data and human resources are available to ensure continuous and regular information flow, updates and web maintenance.

Several programs that incorporate CEPA as a component have also been implemented. These include some major programs funded by development partners and donor agencies such as multilateral and bilateral organizations, civil society organizations and the private sector. Through the ADB-assisted Project on Integrated Coastal Resource Management (ICRMP 2007-2014), several CEPA materials have been printed and distributed to DENR regional partners and other government agencies and institutions. The materials include quick guides, field guides, advocacy posters, educational posters and policy papers on the National Integrated Coastal Management Program (NICMP), foreshore management, mangrove management, user fees and resource rents.

The UNDP-GEF Project on Strengthening Coordination for Effective Environmental Management (STREEM) (2007-2013) aims to improve the coordination among focal point agencies of three multilateral environmental agreements (MEAs), namely the United Nations Convention on Biological Diversity (UNCBD), United Nations Framework Convention on Climate Change (UNFCCC) and United Nations Convention to Combat Desertification (UNCCD), collectively known as the Rio Conventions. The project developed a comprehensive CEPA strategy addressing low awareness of national and local stakeholders about the Rio Conventions. Seminars and orientations were done, accompanied by short mass media campaigns directed at various stakeholders such as district supervisors and teachers of the Department of Education (DEpEd), LGUs, NGOs, Peoples' Organizations (POs) and farmers. IEC materials such as handbooks (Facilitator's Handbook on Mainstreaming MEA in Barangay Development Planning), guides, flyers and posters were produced and key campaign messages were formulated to highlight the interconnection between and among biodiversity, climate change and land degradation.

A MEA portal website, linked to the Philippine CHM, was also developed to facilitate access, sharing and systematic storage of information on MEAs, particularly among partner agencies and stakeholders. A Speakers Bureau on MEAs, composed of regular staff of the Public Affairs Office of national and local government agencies was also formed to sustain communication efforts. These CEPA approaches are expected to help mainstream awareness and understanding by the stakeholders the Project aimed to reach, and even beyond.[122] The USAID/DA-BFAR and DENR Project on Ecosystems Improved for Sustainable Fisheries Project (Ecofish, 2012-2017) developed toolkits, sourcebooks and case studies on ecosystems-based approach fisheries management (EAFM), MPA and climate change and fishery law enforcement procedural handbook and instructional videos.

Through the NewCAPP project, a nationwide Knowledge, Attitudes and Practices (KAP) survey was also conducted by the Resources, Environment and Economics Center for Studies, Inc (REECS, Inc) with the Department of Development Journalism of the University of the Philippines Los Baños. This KAP study is a "strategic step by the DENR-BMB to use evidence-based or research-based information to plan an IEC or strategic advocacy plan, as well as generate inputs for the development of a policy framework for different management regimes."[123] Along with the KAP survey, an IEC/advocacy strategy was also formulated with the end of increasing "support of stakeholders and decision makers for the management and conservation of the national PA system, including the New CAPP areas and ICCAs."[124]

Other best practices reported by stakeholder groups in the updated PBSAP consultations include development and integration of biodiversity into the school curriculum and related materials: a) DepEd's Basic Education Curriculum for K-12; b) pilot-testing of curriculum for Grades 1-4 in Davao in coordination with the Philippine Eagle Foundation Inc. (PEFI); c) Kalahan Educational Foundation's school curriculum and books; d) Tebtebba Foundation's resource book on indigenous knowledge; and e) TREES Tagum children's coloring books in the local language.

The collective outcomes of these initiatives, however, have not been adequately measured. The updated PBSAP has recommended a comprehensive CEPA strategy for biodiversity conservation and management with indicators and targets.

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122 DENR FASPO. *Draft Project Completion Report of the UNDP-GEF STREEM Project.* (DENR-FASPO, 2013)

123 UP Los Baños College of Development Communication, "CDC-DDJ Conducts KAP Research on Biodiversity, Validates Results in National Workshop," 25 May 2013. Accessed 20 August 2014. http://www.devcom.edu.ph/site/cdc-ddj-conducts-kap-research-on-biodiversity-validates-results-in-national-workshop.html

124 REECS and CDC-UPLB, *Communication Plan for Biodiversity Conservation in the Philippines,* 2013. Accessed 20 August 2014. https://newcapp.files.wordpress.com/2013/12/communication-plan.pdf

Target 2. Integration of biodiversity values

The valuation of biodiversity and ecosystem services and accounting of their true economic contribution continues to be a priority of the country to help inform development planning and policy.

The Philippines implemented ENR accounting in the 1990s through the USAID-funded Environment and Natural Resources Accounting Project (ENRAP) which measured the depreciation of ENR but not the full accounting of natural assets, including biodiversity and ecosystem services and economic losses caused by environmental degradation. This gap is being addressed by several programs and projects that have been and are being implemented. Among these are the WB- supported program on Wealth Accounting and Valuation of Ecosystems Services (WAVES, 2013-2018) which aims to develop national accounts for minerals and mangroves using the System of Environmental-Economic Accounts (SEEA), construct ecosystem accounts for Southern Palawan and the Laguna Lake Basin and analyze trade-offs associated with different resource and ecosystem use and build capacity for institutionalization of the SEAA. WAVES supports existing plans such as the PDP, the Strategic Environmental Plan for Palawan and the National Climate Change Action Plan which all underscore the significance of resource accounting and valuation.[125] The EU-UNDP-funded project on Building Transformative Policy and Financing Frameworks to Increase Investment in Biodiversity Management (BioFin/ (2013-2015) also complements this effort through the development of a framework and methodology for mainstreaming biodiversity into national development and sectoral planning and addressing the biodiversity financing gap.[126]

More biodiversity-related programs are now incorporating components on resource valuation and accounting as well as financing mechanisms. The DENR-BMB has initiated the complementation and harmonization of component activities and sites in order to maximize resources and broaden the reach and impact from these programs. The WB-funded project on Sustainable Financing of PAs (2013) reviewed existing policies that constrain sustainable financing of PAs, explored financing options and helped develop business plans for 18 PAs. The GEF-UNDP NewCAPP developed sustainable financing and resource mobilization tools and enhanced financial sustainability of the terrestrial PA system. The USAID-Ecofish Project (2012-2017) is implementing a revenue generation system and sustainable financing programs (e.g. business plans, inter-LGU trust funds, Payment for Environmental Services (PES) schemes and value chain analysis) for EAFM in select LGUs in eight marine KBAs, namely: . Lingayen Gulf, Verde Island Passage, Calamianes Island Group, Lagonoy Gulf, Danajon Reef, South Negros Island, Surigao del Sur and del Norte and Sulu Archipelago.[127] The GEF-UNDP BPP project is also looking into PES in the context of encouraging target communities and stakeholders in three sites (Quirino Protected Landscape, Northern Negros National Park, and Mt. Hamiguitan Wildlife Sanctuary) out of nine sites covered by the project. The PBSAP consultation/workshops also generated information on individual, isolated and site-specific practices such as the PES in Mt. Mantalingahan Protected Landscape and Mt. Kitanglad Natural Park and PES for mangroves and fisheries in the coastal areas of Cagayan Province and carbon sequestration in Quirino Protected Landscape and Penablanca Protected Landscape and Seascape. Ensuring that conservation work pay for itself can help provide economic benefits to poor, natural resources-dependent communities as well as alleviate poverty.

More recently, the NewCAPP, in cooperation with the Resources, Environment and Economics Center for Studies, Inc. (REECS), successfully brokered agreements between six major cooperatives in Bukidnon and the Mindanao Development Authority to contribute to a PES Fund to be managed by the Xavier Science Foundation. These funds will be used to finance the Community Development Plan of the Miarayon community in Mt. Kalatungan PA, located along the Cagayan de Oro river basin. Such partnerships between the "buyers" and "sellers" of ecosystem services was forged following documentation of the initiatives of the IP community in the expansion of forest cover along the headwaters of the Batang watershed, which contributes to reducing the impacts of typhoon Sendong to downstream communities and agro industries in the Cagayan de Oro city and environs.[128]

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125 DENR, "Eco-system Valuation Kicks off in the Philippines" *DENR News and Features*, 18 September 2013. Accessed March 12, 2014. http://www.denr.gov.ph/news-and-features/latest-news/1522-eco-system-valuation-kicks-off-in-the-philippines.html.

126 Anabelle Plantilla. "Building Transformative Policy & Financing Frameworks to Increase Investment in Biodiversity Management." (Presentation from the DENR Biodiversity Management Bureau)

127 Ecosystems Improved for Sustainable Fisheries Sustainable Fisheries (ECOFISH), "ECOFISH Project: a Partnership of the Department of Agriculture-Bureau of Fisheries and Aquatic Resources and USAID, 2012-2017." (Presentation from the DENR Biodiversity Management Bureau)

128 "Mt. Kalatungan." New Conservation Areas in the Philippines Project. Accessed February 25, 2014. http://www.newcapp.org/kalatungan.php

Target 3.Incentives

Incentives can entice or motivate communities and institutions to get involved in the conservation and management of the environment. They also come in the form of liabilities, also called disincentives, e.g. polluter's tax or charge. The imposition of taxes or charges encourages corporations and other concerned entities to engage in safe environmental practices which in the long-term generate savings and contribute to giving them a good image. There are, however, incentives that can be harmful to biodiversity. For example, the Agriculture and Fisheries Modernization Act of 1997 exempted certified agricultural and fisheries enterprises from the payment of tariff and duties for the importation of all types of agriculture and fisheries inputs, equipment and machinery for five years from the effectivity of the law.[129] It has been raised, however, that these fiscal incentives that make fishing equipment and gear cheaper and more accessible may eventually lead to the faster extraction and unsustainable use of fishery and aquatic resources (Batongbacal, 2002).[130]

The Philippine Environment Partnership Program (PEPP) is a partnership program with industries, in cooperation with the other environment-related agencies, which was established in 2003 pursuant to DENR Administrative Order 2003-14. It recognizes industries (individual firms and industry associations) that voluntarily self-regulate and demonstrate superior environmental performance through awards and incentives. From 2009-2012, a total of 57 individual firms have been awarded with a DENR Official Seal of Approval under Track 1 Category, which is given to large companies that go beyond compliance and are driven by competitiveness, image and supply chain requirements to improve performance. Track 2 Category refers to companies that are mostly Small and Medium Enterprises (SMEs) and are currently unable to comply with regulations.[131]

In 2014, 10 industries were awarded the DENR Official Seal of Approval for exemplary environmental performance bringing the total number to 67. Among these are Aboitiz Power Hedcor Sibulan, Inc. and Energy Development Corporation (EDC) – Mt. Apo Geothermal Project, both located within the Mt. Apo Natural Park. Hedcor's environmental management programs cover solid waste, water and energy conservation and greening, coupled with

some Corporate Social Responsibility (CSR) activities such as riverbank stabilization, agro-forestry, reforestation, road rehabilitation and tree planting, Eco-Market Day and Adopt-a-River. EDC has similar environmental management programs, coupled with CSR activities that include watershed management, Binhi (Greening Program) and HELEN (Health, Education, Livelihood and Environment). Awardees benefit from relaxed reportorial requirements in terms of frequency of submission, longer validity of permits and simplified requirements for securing an Environmental Compliance Certificate (ECC) for expansion projects.[132]

In 2013, the first ever Protected Area Recognition (PAR) Awards for exemplary work in PA management were given by the DENR to PAs listed in Table 16. The awards were given to PA Superintendents and staff for their "impressive efforts, initiatives and innovative practices".[133]

Among the finalists for the PA Awards, Mt. Kitanglad Range Natural Park received the highest number of nominations (8) and awards (3).

Similar awards and recognition have also been given to MPAs since 2007 in an effort to promote good standards, practices and champions in the management of coastal and marine resources. There are enough legal bases for financial incentives and disincentives such as economic instruments in the form of licenses, user fees, taxes, charges, permit fees, fines and penalties, which have also been used to encourage conservation and management. On the other hand, R.A. 7942 or the Philippine Mining Act of 1995 grants holders of large-scale mining contracts certain auxiliary rights which are deemed necessary to carry out mining operations. These include timber rights and water rights, which allow them to cut trees or timber and access water resources within the mining area. These auxiliary rights give holders of large-scale mining contracts significant leeway in their use of natural resources within areas which are often also critical habitats and ecosystems.

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129 Republic Act 8435 (1997), Sec. 109

130 Jay Batongbacal. "Agriculture and Fisheries Modernization Act and the Fisheries Code of 1998: Key Areas of Conflict and Recommended Courses of Action (2002) 19." Accessed 13 August 2014 http://oneocean.org/download/20020426/afma_policy_study.pdf.

131 DENR-EMB, *Annual Report for CY 2012* (DENR-EMB: 2012)

132 "2013 Major Accomplishments.' DENR-EMB. Accessed November 2013.

133 PAWB/BMB. 2013 Major Accomplishments

Table 16. Protected area recognition awards.

	Protected Area	Award
1	Mt. Kitanglad Range Natural Park	Engagement with IPs/Local Communities
2	Mts. Banahaw-San Cristobal Protected Landscape	Partnership with Local Government Unit
3	Mt. Mantalingahan Protected Landscape	Partnership with the Civil Society Organizations
4	Tubbataha Reefs Natural Park	Partnership with Other Government Agencies
5	Taal Volcano Protected Landscape	Law Enforcement
6	Apo Island Protected Landscape/ Seascape	Sustainable/Innovative Financing
7	Mt. Kitanglad Range Natural Park	Institutional Organization/Functional PAMB
8	Mt. Kitanglad Range Natural Park	Actual Bio-Physical Improvements
9	Mt. Pulag National Park	Impacts on Local Communities

Source: DENR-BMB

Other biodiversity- related programs, among them the USAID-funded Biodiversity and Watersheds Improved for Stronger Economy and Ecosystem Resilience (B+WISER) help generate financial incentives and build capacity to address the drivers of biodiversity loss and deforestation.

In addition, DENR Administrative Order 2010-16 established the "Adopt a Wildlife Species Program" to encourage the private sector and civil society to participate in the conservation of threatened wildlife resources and prevention of species extinction through in situ conservation approaches. Participants of the Program are incentivized through tax exemptions that they may claim in accordance with Bureau of Internal Revenue (BIR) regulations. To date, two private companies have established partnerships under this Program: CEMEX Philippines has contributed to the conservation of the Philippine tarsier, and the Energy Development Corporation has participated in the conservation of the large flying fox, Golden-crowned flying fox, Philippine eagle, Philippine eagle owl, Philippine brown deer and Philippine warty pig.

Target 4. Use of natural resources

The natural capital of the country provides various resources and options for livelihood. Diversifying livelihood options for stakeholder groups, including communities, has proven to be an important strategy to reduce pressures on ecosystems and biodiversity. This need has become a springboard for social enterprise projects that promote the sustainable use of ecosystems services while fostering community capacity building and empowerment.

Special attention has been paid to balancing conservation and the economic needs of local communities. For example, assessments of biodiversity –friendly businesses/ livelihood in the eight demonstration sites and trainings on value chain have been conducted under the Partnerships for Biodiversity Project (BPP).[134]

In addition, development partners such as the UNDP-GEF Small Grants Program (SGP), Foundation for the Philippine Environment (FPE) and the Philippine Tropical Forest Conservation Foundation (PTFCF) have been providing support for sustainable biodiversity-friendly livelihood initiatives of people's organizations and local communities. Examples include PTFCF's funding of local initiatives to conserve mangrove areas in Mindanao, thereby encouraging the culture of crabs and fish as a livelihood activity for the community[135] and FPE's assistance for micro-enterprise development and livelihood enhancement for farmers and fisherfolk in the Liguasan Marsh.[136]

Another biodiversity-friendly livelihood that has proven fruitful for local communities is the production of essential oils from natural sources, the success stories of which are featured in Box 5. Information on other uses of natural resources in the country are interspersed in various parts of this Report.

134 DENR-BMB. 2013 Major Accomplishments (2013), 249

135 Philippine Tropical Forest Conservation Foundation. "Forest Conservation Program" (Powerpoint presentation available at http://code-ngo.org/home/images/stories/pdf/CODE-NGO_ResourceBuildingSeminar_Oct2010_PTFCF.pdf) and "2013 PTFCF Grant Agreements." Posted March 25, 2013. Accessed May 11, 2014. http://ptfcf.org/data/uploads/2013_grants.pdf

136 "Marshals of the Marsh." Posted 3 March 2014. Foundation for the Philippine Environment. Accessed March 18, 2014. http://fpe.ph/impact_story/marshals-of-the-marsh/6.

Box 5. Conserving Biodiversity through Social Enterprises

Lemongrass harvesting in Negros Occ.
Photo from: PFEC

The Philippines posts a high demand for naturally extracted essential oils for use in the production of cosmetics, household items and in the catering industry. As such, production of these oils has been encouraged as an alternative livelihood in rural communities, with technical, marketing and funding support from government bodies, civil society and the private sector.

The community of Barangay Camalanda-an in the municipality of Cauayan, Negros Occidental relied on charcoal making as a primary economic activity for many years. Due to lack of options, charcoal making provided a livelihood of "last resort," despite the risks it posed to human health, social conflicts it created and its effects on the depletion of the Southern Cauayan Municipality Forest and Watershed Reserve. In 2010, growing concern over the threats posed by charcoal making prompted stakeholders, including a local people's organization – the Camalanda-an Agro-forest Association (CAFA), the Cauayan municipal government, a private company – the RU Foundry and Machine Shop Corporation (RU Foundry) and its nonprofit social arm – the Ecological and Agricultural Development Foundation Inc. (EcoAgri), to start a social enterprise project for the production of lemongrass essential oils.

EcoAgri's strategy employed "Trade Off Community-Based Watershed Conservation" where communities commit to protect and sustainably manage the watershed through "rainforestation and diversified farming, including organic agriculture" in return for EcoAgri support in technology, product development and marketing and "buying back" of excess products. The success of this initiative translates to not only economic gains, but to a long-term effort to improve the area's ecosystem services.

As of February 2013, the community meets a demand of 30 liters per month, sold to EcoAgri at Php1, 500 per liter. As lemongrass is a low maintenance crop, minimal physical work is required for its care and maintenance. This frees up additional time for rainforestation and diversified farming for the eventual rehabilitation of the watershed. Secondary benefits include improved working conditions that avoid the health risks associated with charcoal making and increased opportunities to explore additional pursuits such as ecotourism and other economic activities.

Similarly, communities in the Mt. Kitanglad Range Natural Park (MKRNP) have found a niche in the production of citronella essential oils. This venture is supported by the Protected Area Management Board of the MKRNP and the nonprofit organization Philippine Federation for Environmental Concerns (PFEC).

PFEC provides technical and marketing assistance to the MKRNP communities. As the communities' business arm, it sources extracted oils from communities and provide quality control. These are then marketed to domestic companies who use the oils as raw material for their products. PFEC has also developed models for market profiling and preparing business plans for essential oils, which contemplate value-adding at every stage of the production.

The Kitanglad Essential Oils can only currently satisfy a small portion of the demand – producing 10 to 15 liters of citronella oil per month. Nonetheless, there is much potential to increase production, especially as the demands from the market grow.

Kitanglad Citronella Oil
Photo from: Mt. Kitanglad Agri-Eco Techno-Demo Center

Goal B: Reduce the direct pressures on biodiversity and promote sustainable use

The relevant Aichi Targets to accomplish Goal B are Targets 5 (Loss of habitats), 6 (Sustainable fisheries), 7 (Areas under sustainable management), 8 (Pollution), 9 (Invasive alien species) and 10 (Vulnerable ecosystems), currently addressed through the following initiatives and policies:

Target 5. Loss of habitats

Major policies focusing on key habitats and habitat loss have been issued, among them Executive Order (EO) 23 issued in 2011 and EO 79 issued in 2012 by President Aquino. EO 23 imposed a moratorium on the cutting and harvesting of timber in natural and residual forests. The enactment of this moratorium was coupled with the implementation of the NGP which targeted reforestation of 1.5 billion trees from 2011 to 2016.The reforestation efforts in the NGP draw greatly from the mobilization of national government agencies, LGUs, CSOs, private sector and local communities. EO 79, on the other hand, institutionalized and implemented reforms in the mining sector. This issuance identified areas closed to mining applications, including PAs under the NIPAs, fish refuges and sanctuaries, island ecosystems and other critical areas that the DENR may later identify as "No Go Zones". However, this prohibition only applies to mining contracts, agreements and concessions approved after EO 79 comes into force. Those already approved prior to EO 79 remain valid.

Threats to marine habitats, particularly coral reefs, come from coastal development, marine-based pollution, sedimentation, overfishing and destructive fishing. These are being addressed through various programs. Among them is the Sustainable Coral Reef Ecosystem Management Program (SCREMP) 2012-2020, considered as the NGP of the seas, which aims to increase by 5% hard coral cover and fish density and increase by 10% income of fishing communities in the project sites by 2016. Under the SCREMP, coral reefs are to be delineated, assessed and databanked in 34 nationally protected MPA, and sustainable livelihood operationalized in 340 local communities. SCREMP is expected to contribute to efforts in sustaining the integrity of the environment, adapting to and mitigating climate change, reducing poverty and empowering poor and vulnerable communities.[137]

Target 6. Sustainable fisheries

Other programs on coastal and marine management have contributed to efforts to ensure sustainable fisheries through various approaches such as protecting, conserving and rehabilitating habitats, supporting growth in the agriculture and fishery sector and building adaptive capacities of coastal communities and resilience of natural systems. Among these programs are the Coral Triangle Initiative on Coral Reefs, Fisheries and Food Security (CTI-CFF), the National Integrated Coastal Management Program (NICMP) for Sustainable Development of the Coastal and Marine Environment and Resources of the Philippines and the SCREMP mentioned above.

The Philippines is one of the six countries in the CTI-CFF, a multilateral government partnership formed in 2009 to protect the Coral Triangle and to implement a Regional and National Plan of Action that: a) designates and manages seascapes; b) applies an ecosystem approach to fisheries management; c) establishes a fully functional marine protected area system; d) strengthens climate change adaptation and resilience; and e) improves the status of threatened marine species. Similarly, the NICMP uses an ecosystems approach or "ridge-to-reef" approach towards a more holistic, multisectoral, integrated and sustainable coastal management and fisheries, especially at the level of local governments and communities. Technical assistance to develop and implement ICM plans has been provided to 150 coastal municipalities and cities. The SCREMP supplements these efforts by ensuring biologically healthy and productive coral reef habitat and fisheries, increasing public stewardship of coral reef ecosystems and improving socioeconomic conditions and resiliency of communities.

137 DENR-BMB. "Sustainable Coral Reef Ecosystem Management Program." (Presentation from the DENR Biodiversity Management Bureau

There are also bilateral projects that support sustainable fisheries. The USAID- Ecosystems Improved for Sustainable Fisheries (EcoFish) Project is supporting the implementation of a 5-year project with the Department of Agriculture to improve the management of coastal and marine resources to conserve biological diversity, enhance ecosystem productivity and restore profitability of fisheries.[138] The project is being implemented in eight Marine Key Biodiversity Areas (MKBAs), namely: Calamianes group of islands in Palawan, Lingayen Gulf in Pangasinan, Ticao Pass and Lagonoy Gulf in Bicol region, San Bernardino Strait in Leyte-Samar region, Danajon Double Barrier Reef spanning Bohol, Cebu, Leyte, Southern Negros Occidental and Surigao, Sulu archipelago and Verde Island Passage, in Batangas.

Target 7. Areas under sustainable development

There is limited data to determine if areas are under sustainable development, especially if there are no identified indicators to measure sustainable development. Suffice it to say that many P/P/As already mentioned in this Report and in Annex 3 aim to achieve sustainable development of resources in their specific project sites.

The use of tenure instruments such as the Protected Area Community-based Management Agreements (PACBRMA) provide PA communities the opportunities to manage, develop, use, conserve and protect resources in the PA multiple use and buffer zones in accordance with the PA Management Plan and the Community Resource Management Plan (CRMP) and in partnership with the Protected Area Management Board. The PACBRMA is a stewardship agreement between a community organization and the DENR lasting for 25 years, renewable for another 25 years. As of March 2013, a total of 68 PACBRMAs occupying a total area of 39,138.32 hectares has benefited 5,457 households and 15,568 individuals in 21 PAs nationwide. Majority of these households engage in agriculture-related activities. Of the 68 PACBRMAs, 12 have been affirmed by the DENR, 15 have been completed and 41 are in the process of completion.[139] However, much needs to be done to ensure that these areas are sustainably developed and managed. This remains a continuing challenge to both PA management and tenure holders/beneficiaries.

Target 8. Pollution

Pollution is a major contributor to resource degradation in the country. It is manifested through; a) indiscriminate dumping of solid waste in river systems, other waterways, urban and coastal areas, thereby clogging and polluting downstream waterways; b) industrial waste and agricultural run-off e.g. fertilizers, pesticides, insecticides; c) excessive construction of illegal fishpens leading to overstocking and uncontrolled feeding; d) mining; e) excessive use of fertilizers degrading water quality leading to red tide; and f) informal settlements.

The DENR-Ecosystems Research and Development Bureau (ERDB) has embarked on a Research and Development Program for environmental management and pollution control by developing bioremediation as an approach to water pollution control in selected priority rivers in the country.[140]

Fish cage operations that overstock fish and feeds pollute and degrade habitats leading to fishkills. A massive fish kill in February 2012 in Lake Sebu was attributed to fish cage operations. This pollution is cause for concern, as the water from Lake Sebu flows into the Seven Falls, which are being touted as a prime tourist destination. Dismantling of fish cages and a moratorium on additional fish cage operations have been recommended to allow the lake to regenerate.[141] Similar actions have been made in Taal Lake and Lake Buhi as mentioned in Chapter 1.2.3 of this Report.

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138 ECOFISH, "ECOFISH Project"

139 DENR-BMB. List of PACBRMAs as of March 2013.

140 "2013 ERDB Annual Report." DENR-ERDB. Accessed July 20, 2014. http://erdb.denr.gov.ph/files/erdb_ar2013.pdf.

141 Bong Sarmiento. "Special Report: Moratorium on Fish Cage Operations Sought to Save Lake Sebu from Dying." Mindanews, 10 March 2013. Accessed 11 May 11, 2014. http://www.mindanews.com/special-reports/2013/03/10/special-report-moratorium-on-fish-cage-operations-sought-to-save-lake-sebu-from-dying/

Target 9. Invasive alien species (IAS)

Threats to biodiversity from IAS, especially in forest ecosystems, inland water ecosystems and to agro biodiversity have been recognized for decades.[142] A report submitted to the Asia-Pacific Invasive Species Network in 2006 identified 16 potential IAS in the Philippines, with 10 higher plant species, three insect pests and three pathogens.[143] The need for a national framework to address the impacts of IAS was noted and consultations to this end were held in 2006 and 2009.[144]

Under the GEF-UNEP Project on Removing Barriers to Invasive Species Management in Production and Protection Forests in Southeast Asia, the Philippines reviewed the enabling institutional, policy and regulatory frameworks that are relevant to IAS management in the Philippines and found that "mechanisms to halt biodiversity loss by preventing and controlling IAS are almost non-existent in the Philippines."[145] Available guidelines in the areas of wildlife, forestry, agriculture, fisheries, PAs, ecotourism and environmental regulations were found to be "inadequate, fragmented or poorly implemented."[146] This Report seconded the need for a "clear, integrated, and multisectoral IAS management strategy and action plan."[147] In 2013, a draft National Invasive Species Strategy and Action Plan (NISSAP) was prepared to provide an enabling policy and institutional arrangement for invasive species management in the country and identified general principles for the implementation of the Strategy, as well as the lead government agencies for these actions (see Box 3). Management of the buyo-buyo shrub (Piper aduncum), an IAS "linked to degradation of natural forests and found to suppress natural regeneration of forests, was piloted at the Allah Valley Watershed Forest Reserve in Lake Sebu, South Cotabato."[148]

The NISSAP provides a framework for coordinated and multisectoral management of IAS. It aims to foster cooperation among relevant government, civil society organizations, industries, local communities and other stakeholders for a collective and coordinated action to reduce the rate of biodiversity loss through the prevention of the introductions and spread of IAS, and minimize their impacts. It has a total of 16 objectives and 84 Planned Actions to be implemented during the period 2015-2025, across three timelines: short-term (2015-2017), medium-term (2018-2020), and long-term (2021-2025).

Target 10. Vulnerable ecosystems

Many of the country's islands are considered vulnerable ecosystems and are critical hotspots for biodiversity. Species that are endemic to specific islands, such as the endangered Tamaraw (Bubalus mindorensis) found only in the island of Mindoro, the Philippine mouse deer (Tragulus nigricans) in the islands of Palawan, the Philippine eagle (Pithecophaga jefferyi) in the islands of Luzon, Mindanao, Samar and Leyte and the pitcher plant (Nepenthes hamiguitanensis) in the island of Mindanao, are particularly vulnerable. The Verde Island Passage Marine Corridor is recognized as the "center of the center of marine shorefish diversity in the world" while the Sulu Sulawesi Marine Ecoregion is recognized as having the highest coral diversity in the world. Many of these biodiversity-rich islands are also severely threatened by overutilization of resources, loss of habitats and climate change.[149]

Under EO 79 (2012), island ecosystems are among the "No-Go Zones" considered closed to mineral contracts, concessions and agreements. The implementing rules define these ecosystems as "terrestrial, inland water and coastal marine environments in an oceanic island possessing unique but fragile and vulnerable ecosystems, where a community of living organisms (plants, animals and microbes), in conjunction with the non-living components of their environment, are interacting as a system."[150] Their declaration as "No-Go Zones" means that no new mines can be opened in island ecosystems. However, mining contracts, agreements and concessions approved before the effectivity of EO 79 continue to be valid, but are subject to periodic review and monitoring by the DENR to determine their compliance with laws, rules and regulations.

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142 Assessing Progress Towards the 2010 Biodiversity Target: The 4th National Report to the Convention on Biological Diversity Republic of the Philippines.

143 Id 23

144 Id 94

145 Id 89

146 Id

147 Id

148 Philippine Star. "DENR Launches Invasive Alien Species Project." The Philippine Star, 13 January 2013. Accessed May 11, 2014. http://www.philstar.com/agriculture/2013/01/13/896222/denr-launches-invasive-alien-species-project

149 DENR, "Paje Calls for Protection of Island Biodiversity Ecosystems." *DENR News and Features,* 24 May 2014. Accessed May 30, 2014. http://www.denr.gov.ph/news-and-features/latest-news/1809-paje-calls-for-protection-of-island-biodiversity-ecosystems.html.

150 DENR Administrative Order 2012-07 (10 September 2012) Sec. 3(e)

Goal C: Improve the status of biodiversity by safeguarding ecosystems, species and genetic diversity

The relevant Aichi Targets to accomplish Goal C are Targets 11 (Protected areas), 12 (Preventing extinctions) and 13 (Genetic diversity). These targets are currently addressed through some initiatives described below.

Target 11. Protected areas

PA categories may be distinguished according to their specific institutional arrangements or governance structures. This expands the International Union for Conservation of Nature (IUCN) and NIPAS Act definition of PAs, allowing any number of governance types to apply as long as the management objective is achieved. There are four distinct governance types for each of the PA categories: 1) state; 2) shared; 3) private; and 4) indigenous peoples or local communities [151] Currently, 202 areas spanning 2,567,317.91 hectares are under the NIPAS, 196 of these are under DENR administration, with the remaining six under the administration of other government agencies.[152]

An assessment of state and shared governance, particularly on the management effectiveness of protected areas was also undertaken through the Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ)-funded project on Protected Area Management Enhancement in the Philippines (PAME). The project aimed to: a) improve the protection and management of 61 existing terrestrial and MPAs in KBAs; b) improve the management and technical capacities of relevant DENR BMB staff at all levels; c) establish additional 100 conservation areas under innovative conservation management systems; and d) improve knowledge management and awareness about the values of biodiversity. In 2013, PAME assessed the management effectiveness of over 25% of 240 NIPAS sites using the Management Effectiveness Tracking Tool (METT) and found out that management effectiveness in 61 PAs remain poor.[153]

Through the NewCAPP, Indigenous Community Conservation Areas (ICCAs) have been instituted as a new governance regime and a cost-effective approach to the management of KBAs and other areas with high conservation and cultural values. The system of ICCAs complements the national PA system, thereby ensuring adequate coverage, with due recognition to the important roles the indigenous peoples (IP) communities and ancestors have played in KBA protection. Seven pilot sites have been identified: 1) Menuvu community in Mt. Kalatungan Range Natural Park, Bukidnon; 2) Ayta community in the Cabangan, Zambales KBA; 3) Tau Buid and Buhid Indigenous Peoples in the Mindoro KBA; 4) Balbalan and Balatok Indigenous Peoples in the Banao Watershed, covering the Balbalasang-Balbalan Natural Park in Kalinga; 5) Dumagat Remontados community in Mts. Irid Angelo and Binuang in the Sierra Madre Biodiversity Corridor; 6) The community in the San Felipe, Zambales KBA; and 7) Mamanwa Indigenous Peoples in the Mt. Hilong Hilong KBA in Surigao (see Box 6).

The Menuvu IP community in the Mt. Kalatungan Range in Bukidnon and Indigenous Peoples' Organization Maporac Ayta Association in the Cabangan, Zambales KBA have been registered at the United Nations Environment Program/ World Conservation Monitoring Center (UNEP/ WCMC) Global ICCA database. The Philippine experience with ICCAs also garnered attention at the 11th Conference of the Parties (COP11) to the CBD, where it was cited as a best practice and a viable parallel approach to PA governance and achievement of the Aichi Biodiversity Targets.

In March 2014, the DENR-BMB led the launch of a National PA System Master Plan aiming to: 1) define a more strategic perspective in assessing the current portfolio of PAs; 2) rationalize the expansion of PAs under a national system; and 3) provide a better rationale on the need for PAs within the broader context of national sustainable development.[154]

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151 Norma Molinyawe. "Philippine Protected Area Master Plan Formulation." (Presentation given at the PA System Master Plan Launch Workshop, 4-5 March 2014, Quezon City)

152 DENR-BMB. "PAWB Cue Cards 2014." (Presentation from the DENR Biodiversity Management Bureau)

153 E. S. Guiang and G.C. Braganza. *National Management Effectiveness and Capacity Assessment of Protected Areas in the Philippines: Draft Report.* Manila, Philippines: GIZ, 2014.

154 DENR-BMB. "Preparation of the National Protected Area System Master Plan: Launch of Stage 1 – Stocktaking Process." Workshop proceedings from the Protected Area System Master Plan Launch Workshop, Quezon City, Philippines, March 2014.

Box 6. A Mix of Tradition and Innovation:
Empowering Indigenous Cultural Communities in Fostering Conservation

A development in PA management in the country is the recognition of traditional governance as practiced in Indigenous Community Conserved Areas (ICCAs). Regardless if the State recognizes them or not, ICCAs are regarded to exist and have long played a direct role in the conservation and maintenance of ecosystems and the species that inhabit them.

Under the Indigenous Peoples Rights Act (IPRA) of 1997, indigenous cultural communities or ICCs are vested the right to manage their ancestral domains through traditional resources management practices. Through the Ancestral Domain Sustainable Management and Protection Plan (ADSDPP), they further have the right to define the development and conservation priorities of these ancestral domains.

As of 2012, a total area of 4,323,782.7227 hectares is covered by Approved Ancestral Domains, of which 158 are CADTs and 258 CALTs. The estimated ICCA coverage is 69,011 hectares or 12 percent of total terrestrial area.

In response to the increasing recognition of ICCAs by the international community and the national government, coupled with the growing need to empower the IPs in their role in the new governance regime, a national consortium was formed with the Koalisyon Ng Katutubo at Samahan Ng Pilipinas (KASAPI) designated to establish the National ICCA Network in the Philippines.

In November 2011, the consortium launched a series of subnational workshops in the National Capital Region, Davao City and Cagayan De Oro. The gatherings were attended by more than 90 IP representatives, mostly practitioners of customary law, peace and development and 50 delegates from the academe, private and nongovernment sectors and government agencies that were supportive of the ICCA. These culminated in the Manila Declaration on ICCAs in March 2012 which expressed demand of IP communities for support in documentation, mapping and registration, setting up of an ICCA Registry and the organization of a national consortium as a means for exchange, advocacy and solidifying their stand on issues threatening the sustainability of ICCAs.

There is an increasing demand by more IP communities to have their own ICCAs documented and mapped. Already, community requests have been expressed by the following:

- **Tau Buhid tribe in Mts. Iglit- Baco National Park**
- **Katibean na Mamanwa ka CARAGA – ICCA declaration in their respective ancestral domain and the whole of Lake Mainit KBA**
- **Talaandig in Miarayon in Mt. Kalatungan Range Natural Park**
- **Higaunon of Kalanawan in Misamis Oriental and Bukidnon**
- **Manobo tribe in Magpet, North Cotabato located in Mt. Apo Natural Park**
- **Kalinga and Abra provinces in Cordillera (Binongan tribe, Mabaca tribe, 3 barangays in Banao area, Gubang tribe, and Masadiit tribe**

Photo from: DENR-BMB

Target 12. Preventing extinctions

There are many efforts and approaches being undertaken by the national and local governments, civil society organizations and the business sector to prevent extinction. These include species-specific programs on the endangered Philippine Eagle undertaken by the Philippine Eagle Foundation Inc. and the Philippines Raptors Conservation Program of government, the Tamaraw Conservation Program and several others cited in Chapter 1 of this Report. Components of these programs include CEPA, captive propagation and population surveys, among others.

Other approaches to prevent extinction include law enforcement and cooperation between and among enforcement agencies on illegal trade. From 2009 to 2013, government law enforcement agencies have successfully effected 136 confiscations of illegally traded wildlife, including live mammals, reptiles and birds, insects and wildlife by-products and derivatives (Table 17).

Table 17. Confiscated Wildlife, 2009-2013

Wildlife	2009	2010	2011	2012	2013	Units
Mammals	11	183	24	36	2948	head
Birds	722	775	427	244	687	head
Reptiles	66	1510	1962	223	438	head
Insects		3724				pcs
Arachnids	25	25	2			pcs.
Wildlife by-products & derivatives	208	17	166	88	9228	pcs.
Various products			*7.02	**344.4	***2	various

***kg.of turtle meat, deer meat**
**** kg. turtle meat, turtle scutes, pangolin meat, snake skin and meat, pangolin scales, bird's nest,**
***** sacks of marine turtle meat**
Source: DENR-BMB

Confiscations of wildlife from 2009 to 2013 have resulted to the filing of 62 cases against the alleged perpetrators in accordance with Philippine laws (Table 18).

Table 18. Confiscations of wildlife and cases filed in court, 2009-2013

	2009	2010	2011	2012	2013
Total no. of confiscations	15	32	45	31	14
Total no. of cases filed in court	5	15	15	15	12

Source: DENR-BMB

More recently, in February 2014, five persons were apprehended and charged for smuggling 79 exotic birds and animals from Indonesia into the country. The confiscated animals included species listed under the Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES) Appendix I and the IUCN list of critically endangered species[155].

In addition, consistent with the country's obligations as a party to the CITES, the DENR destroyed over four tons of illegal ivory in 2013 to show its commitment to stop illegal wildlife trade. This was the first time that an Asian country and a non-elephant range state destroyed its ivory stockpile and was a significant effort for a country identified as a major transit point for illegal ivory (see Box 7).

155 Mindanews, "Raps Filed vs. Smugglers of Wildlife from Indonesia." *Mindanews,* 24 February 2014. Accessed February 26, 2014. http://www.mindanews.com/top-stories/2014/02/24/raps-filed-vs-smugglers-of-wildlife-from-indonesia/

Box 7. Stopping Ivory Smuggling and the "Cycle of Killing"

On 21 June 2013, the DENR destroyed over four tons of confiscated ivory amounting to PhP 420 million (US$10 Million) at the grounds of the Ninoy Aquino Parks and Wildlife Center in Quezon City. The event was attended by key DENR officials, representatives from African governments, anti-ivory trade advocates and media. All of DENR's ivory stock were destroyed, except 106 pieces to be repatriated to Kenya and few other pieces held in custody for purposes of training, enforcement and education. The tusks were initially crushed and later cremated at the animal crematorium of the Bureau of Animal Industry.

The ivory was part of the total cargo of elephant tusks, reported to be smuggled from source countries like Kenya, Tanzania, Zambia and Uganda, that was intercepted by the customs officials since nationwide operations in 2009 and handed over to the DENR- PAWB (now BMB) for storage.

This dramatic gesture was done to issue a strong statement of the Philippines' support and commitment towards the international campaign to end illegal wildlife species trade. According to DENR Secretary Ramon Paje, despite the value of the ivory, what they represent are hundreds of poached elephants. Paje pronounced that the Philippines refuses to be part of the cycle of killing and will not tolerate illegal wildlife trade. This is a bold step forward for one of the "gang of eight" countries that have been identified by the CITES as parties in the illegal ivory trade. The Philippines is particularly cited for being both a consumer of ivory and transit country for smuggled ivory making its way from the African countries to China, one of the two biggest markets.

Photo credit: Alex Hofford

See related news articles:

Http://news.nationalgeographic.com/news/2013/06/130618-philippines-ivory-crush-elephants-poaching-world-asia)
Http://newsinfo.inquirer.net/427439/denr-to-crush-seized-elephant-tusks-drops-ceremonial-burnin)
Http://globalnation.inquirer.net/77083/p420m-worth-of-elephant-tusks-to-be-crushed-burned-by-denr-on-june-2)
Http://www.rappler.com/nation/31840-five-tons-ivory-tusks-crushed

To further step up these efforts, the Philippine Operations Group on Ivory and Illegal Wildlife Trade (POGI) was instituted in 2013. This is a multi-agency group that combines officers from the DENR, Bureau of Customs, National Bureau of Investigation, Philippine National Police and the National Intelligence Coordinating Agency to combat wildlife poaching and the illegal wildlife trade by improving enforcement of pertinent laws and regulations. POGI launched the "Wildlife Enforcement Awards" to encourage support and assistance of the whole citizenry in the fight against illegal wildlife trade. Sixty-two (62) private individuals and officers from non-POGI member-agencies received the First Wildlife Enforcement Awards in November 2013.

Target 13. Genetic diversity

For many decades, the country's focus has been more on agricultural productivity than agrobiodiversity conservation. However, the negative effects of unregulated agricultural intensification have brought attention to the need for agrobiodiversity conservation. The GEF-FAO Project on Globally Important Agricultural Heritage Systems (GIAHS) has contributed to increasing the awareness of the importance of agrobiodiversity, including recognition of traditional crop varieties and livestock breeds and traditional practices that conserve these.

There are more than 5,500 traditional rice varieties and their wild relatives, indigenous and endemic species of vegetable and crops including varieties of eggplants, mungbeans, taro, yam, banana and abaca, among many others.[156] Local communities, particularly smallholder and family farmers, have long held traditional agricultural practices that conserve and enhance these resources. However, many of these practices are threatened. Farming of traditional varieties are now confined to specific highland areas while monocultures and agricultural practices incompatible with the conservation of agrobiodiversity dominate lowland agricultural systems.[157]

The country also has the "largest national germplasm collection in Southeast Asia." To conserve this, the University of the Philippines – Los Baños, with support from the Department of Science and Technology (DOST) began a Program to Restore National Germplasm in 2012. This program aims to restore crop diversity, particularly of key products such as vegetables, food legumes, feed crops, cereals, industrial crops, fruits and nuts and develop new in-vitro conservation strategies.[158]

The National Research and Development Program on Organic Vegetables is also currently underway. This program studies methods of "varietal selection and seed production, nutrient management, insect pest and disease control and transfer of developed products and technologies" to preserve the genetic diversity of local vegetables while improving vegetable crop production.[159]

To conserve the genetic diversity of animal species, the Bureau of Animal Industry (BAI) began implementing the Philippine Native Animal Development Program. This was mandated by Department of Agriculture Administrative Order No. 15, issued in 2010. Among this program's aims is to centralize a gene pool for native pigs and poultry at the BAI, while strengthening collaboration with the academe and research institutions.

A recent study on marine mollusks done by the University of the Philippines- Marine Science Institute (UP-MSI) in collaboration with universities in North America showed that these mollusks have unusual bacteria strains that have potentials for utility as drugs for nervous system disorders and cancer. There are more benefits that can be tapped from our genetic resources but there has been little investment in studying these resources and benefits. [160]

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156 The Philippines Country Report on the State of Plant Genetic Resources for Food and Agriculture (Nestor and Teresita H. Borromeo. *The State of the Plant Genetic Resources for Food and Agriculture of the Philippines (1997-2006): A Country Report*. Philippines: Department of Agriculture (DA) - Bureau of Plant Industry (BPI), 2007) provides a detailed breakdown agricultural species and varieties.

157 "Identification Form on "RicePlus" – Dynamic conservation and sustainable use of agro-biodiversity in rice-based farming systems of the Philippines." Global Environment Fund. Accessed March 21, 2014. http://www.thegef.org/gef/sites/thegef.org/files/gef_prj_docs/GEFProjectDocuments/Biodiversity/Philippines%20-%20(5549)%20-%20RicePlus-Dynamic%20Conservation%20%20and%20Sustainable/Philippines_PIF_for_resubmission_29_August_2013.pdf

158 Erika Devega. "PGR and Veggies R and D Programs Reviewed." *PCAARRD,* 17 June 2013. Accessed May 11, 2014. http://www.pcaarrd.dost.gov.ph/home/ssentinel/index.php?option=com_content&view=article&id=2160%3Apgr-and-veggies-rad-programs-reviewed&Itemid=41

159 Id

160 Z. Lin et al. "A Bacterial Source for Mollusk Pyrone Polyketides," *Chemistry and Biology* 20:1 (2013). Accessed February 25, 2014. http://www.sciencedirect.com/science/article/pii/S1074552112004206

Goal D. Enhance the benefits to all from biodiversity and ecosystem service

The relevant Aichi Targets to accomplish Goal D are Targets 14 (Essential ecosystem services), 15 (Ecosystem resilience) and 16 (Nagoya Protocol on Access and Benefit-Sharing). These targets are currently addressed through some initiatives described below.

Target 14. Essential ecosystem services

One of the essential goods and services provided by a healthy watershed is water for domestic, agricultural, industrial and commercial uses, among many others. There are current programs focused on ensuring the protection, conservation and sustainable use of watersheds, among which are the DENR-River Basin Control Office-led preparation of river basin master plans of 18 major river basins, of which seven have been completed as of 2013. These are Cagayan, Mindanao, Buayan-Malungon, Agusan, Pampanga, Pasig-Laguna de Bay and Agno River Basins. The river basin master plans for Abra, Bicol, Abulog, Tagum-Libuganon, Ilog-Hilabangan, Panay, Tagoloan, Agus, Davao and Cagayan de Oro and Jaluar River Basins are still under preparation. The ADB-funded Integrated Natural Resources and Environmental Management Project (INREMP) is assisting the Chico River Basin in Cordillera Administrative Region, Wahig Inabanga River Basin in Bohol Island, Lake Lanao River Basin in the Autonomous Region of Muslim Mindanao and the Upper Bukidnon River Basin in Bukidnon in river basin and watershed planning, and capacity building of IPs and resource-poor communities to reduce the degradation of watersheds and associated ecosystem services caused by forest denudation and unsustainable farming practices.

In addition, the National Convergence Initiative of the DA, Department of Agrarian Reform, DENR and the Department of Interior and Local Governments was launched in 2012 to improve, conserve, protect and rehabilitate natural resources. One of the objectives is to promote sustainable upland development and forest management, using an integrated ecosystems approach as a tool for intervention.[161] Under this initiative, over 100 watersheds have been targeted, many outside of the priority river basins.

It is hoped that these initiatives can contribute to ensuring essential ecosystem services are sustained.

Target 15. Ecosystem resilience

The National Climate Change Action Plan seeks, among others, to enhance the adaptive capacity of communities and the resilience of natural ecosystems to climate change. To implement this plan at the local level, the strategy of "building ecologically sound, stable and economically-resilient towns or eco-towns" was launched in 2012. These eco-towns are "planning units composed of municipalities or a group of municipalities located within and around boundaries of critical key biodiversity areas, which are at high risk to climate change."[162] This strategy is currently being piloted in six localities and is implemented in partnership with the Global Green Growth Institute, USAID and the Asian Development Bank.

It is expected that the eco-town framework will yield benefits for both ecosystems and the people that depend on them. Communities enjoy increased income through climate-resilient livelihood projects and financing schemes, supported by climate-smart infrastructure. Ecosystems are given the opportunity to regenerate as biodiversity is conserved, and watersheds and mangrove areas are given adequate protection.[163]

Other approaches to ensuring ecosystem resilience include the restoration and maintenance of healthy mangroves to combat strong typhoons and storm surges. Several P/P/As are in place, among them the ICRMP which is complementing the NGP by supporting the rehabilitation and reforestation of about 2,000 hectares of mangrove and about 7,000 hectares of watershed areas with active participation of local communities in about 80 LGUs nationwide.[164]

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161 Executive Order No. 26 s. *2011 Declaring an Interdepartmental Convergence Initiative for a National Greening Program* and Draft DA-DAR-DENR-DILG Joint Administrative Order s. 2012 *Strengthening the Policy and Implementation Framework for the National Convergence Initiative among DA, DAR, DENR, and DILG*

162 Ecotown Demonstration Framework." Climate Change Commission. Accessed March 10, 2014. http://www.climate.gov.ph/project/ecotown

163 Id

164 DENR. *Sustaining our Coasts: The Ridge-to-Reef Approach -- A Compilation of Technical and Policy Papers: National Integrated Coastal Management Program (NICMP).* Quezon City, Philippines: DENR Integrated Coastal Resources Management Project (ICRMP), 2013, 79.

Target 16.Nagoya Protocol on Access and Benefit-Sharing (ABS)

The Philippines has been at the forefront on the issue of ABS since 1995 when EO 247 was issued, prescribing guidelines and establishing a regulatory framework for the prospecting of biological and genetic resources, their by-products and derivatives, for scientific and commercial purposes and for other purposes. EO 247 attempted to ensure that benefits derived from the use or commercialization of these resources are shared with source communities by requiring that prior informed consent (PIC) of local or IP communities and research agreements are obtained prior to bioprospecting. The implementation of EO 247 proved to be a constraint especially to academic and research and development communities because of the tedious process of approval. From 1995-2009, there were only four approved applications for research agreements, all from one university.

Under this regime, only two bioprospecting applications for organisms with medicinal and therapeutic uses were approved (GRIP-09, 2010)[165] from 13 applications for Commercial Research Agreement and one Academic Research Agreement out of 20 applications. Regulations on bioprospecting were streamlined with the passage of RA 9147, which redefined bioprospecting as research, collection and utilization of biological resources for commercial purposes. Consequently, a Joint DENR-DA-PCSD-NCIP Administrative Order (AO) No. 1 or the Guidelines for Bioprospecting Activities in the Philippines was issued, which subsumed the ABS provisions and superseded EO 247.

Likewise, in the recently revised NCIP Administrative Order No. 3 (2012) or the Revised Guidelines for Free, Prior and Informed Consent (FPIC) and Related Processes, bioprospecting in Ancestral Domains is considered an intrusive activity that must comply with the full FPIC process. Academic research and other research activities on IP Knowledge, Systems and Practices (IKSP) must likewise comply with a shorter consent process, detailed in NCIP Administrative Order No. 1, or the IKSPs and Customary Laws Research and Documentation Guidelines, also adopted in 2012.

The Philippines has participated actively in the negotiations on the international regime on ABS since 2004. While not yet a signatory to the Nagoya Protocol on Access and Benefit Sharing, the country participates in the negotiations and meetings to address outstanding issues. At present, the Instrument of Ratification/Accession to the Nagoya Protocol has been transmitted by the Department of Foreign Affairs to the Office of the President.

Goal E: Enhance implementation through participatory planning, knowledge management and capacity building

The relevant Aichi Targets to accomplish Goal E are Targets 17 (NBSAPs), 18 (Traditional knowledge), 19 (Biodiversity knowledge) and 20 (Resource mobilization). These targets are currently addressed through some initiatives described below.

Target 17. NBSAPs

Annex 3 shows the updated PBSAP 2014-2025 which is currently being finalized after a series of multistakeholder consultations throughout the country. Indicators, targets, implementation and monitoring and evaluation plans are also being finalized.

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165 ASEAN Centre for Biodiversity. *Policy Brief on Access and Benefit Sharing: Issue 3 (October 2013)*. Laguna, Philippines: ASEAN Centre for Biodiversity, 2013 citing GRIP-09, 2010

Target 18. Traditional knowledge

The Philippine legal system recognizes the value of traditional knowledge of IPs and provides for safeguards to ensure that this knowledge is protected and maintained.[166]

Under the Indigenous Peoples Rights Act (IPRA) of 1997, the IPs' right to cultural integrity entitles them to full ownership and protection of their cultural and intellectual rights (Sec. 34). The IPRA likewise mandates the State to take measures to ensure IPs' right to restitution of any cultural, intellectual, religious and spiritual property that has been taken without their consent (Sec. 32). To this end, FPIC is required for activities that may affect spiritual and religious traditions, customs and ceremonies, including the conduct of research on Indigenous Knowledge Systems and Practices (IKSP).

RA 8293 or the Philippine Intellectual Property Law of 1997 affirms this protection. RA 8423 or the Traditional and Alternative Medicine Act of 1997 establishes as State policy the need to put in place a "legally workable basis by which indigenous societies can own their knowledge of traditional medicine" and demand acknowledgement and shares of financial returns from commercial use in cases where this knowledge is used by outsiders (Sec. 2). To do this, the Implementing Rules of this law provide for the creation of mechanisms to inventory and document knowledge systems relevant to the utilization of biological and genetic resources that are applied in traditional and alternative health care and monitor and obtain redress against natural health products that have not complied with pertinent regulations (Rule IX). In addition, RA 10055 or the Philippine Technology Transfer Act of 2009 requires Research and Development Institutes that avail of funding from government to disclose any biodiversity and genetic resource, traditional knowledge and IKSP in their applications for Intellectual Property protection (Sec. 8). Recently, RA 10076 or the National Cultural Heritage Act of 2009 identified as intangible cultural heritage such practices, representations, expressions, knowledge, skills – as well as the instruments, objects and artifacts associated therewith, that communities, groups and individuals recognize as part of their cultural heritage, such as: (1) oral traditions, languages and expressions; (2) performing arts; (3) social practices, rituals and festive events; (4) knowledge and practices concerning nature and the universe; and (5) traditional craftsmanship (Sec 3x). It also identified as intangible cultural property peoples' learned processes along with the knowledge, skills and creativity that inform and are developed by them, the products they create and the resources, spaces and other aspects of social and natural context necessary for their sustainability (Sec 3y).

Inter-agency convergence was also strengthened by the signing of a MOA among the NCIP, National Commission for Culture and the Arts (NCAA) and Intellectual Property Office of the Philippines (IPO) in June 2011. This MOA sought to establish a "coherent and coordinated inter-agency initiative to work towards preserving, protecting and promoting the intellectual property of the indigenous peoples and the indigenous cultural communities and safeguard the country's cultural heritage."[167]

Target 19. Biodiversity knowledge

In December 2008, RA 9512 or the National Environmental Awareness and Education Act was passed, mandating the integration of environmental education in the school curricula at all levels. Per the law's definition, environmental education shall include modules, activities, projects and programs on, among others "tree planting, freshwater and marine conservation, forest management and conservation and relevant livelihood opportunities and economic benefits."[168] Pursuant to this, the Department of Education (DepEd) issued Order No. 52 series of 2011, on strengthening environmental education in public and private schools. This order mandated, among others, intensified lessons on environmental concerns in science subjects, enhanced methods for environmental education and increased capacity building for school administrators, officials and teachers.

R.A. 9512 also declared November of every year "Environmental Awareness Month" throughout the country.[169] As part of the celebrations, a National Search for Sustainable and Eco-friendly Schools was held in 2009, 2011 and 2013 to encourage academic institutions to participate in finding solutions to environmental issues.[170] This competition received strong support from private sector partners.

The 2011 winner for the secondary schools category, the Camarines National High School, distinguished itself with its "School in a Garden" program, maintaining a mini-garden, mini-forest, urban vegetable garden, orchidarium, and a 3-hectare area in the Mt. Isarog National Park.[171]

The Philippine CHM continues to be a repository of biodiversity data contributed by other data holders. Information is also being shared through scientific conferences like the Annual Symposia of the Wildlife Conservation Society of the Philippines and the Philippine Association of Marine Science and the National Cave Congress, among others. Information on biodiversity is also generated from various research and development agenda such as the DENR-ERDB's R&D Program and through citizen science.

166 Elpidio Peria. "Traditional Knowledge and Indigenous Peoples: The Philippine Legal Landscape" (Presentation given at the Forum on Intellectual Property and Indigenous Knowledge, 21-22 March 2012, Manila)

167 Robert Nereo Samson. "Intellectual Property and Indigenous Knowledge." (Presentation at the Forum on Intellectual Property and Indigenous Knowledge, Manila, Philippines, 21 March 2012)

168 Republic Act 9512 (2008) Sec. 3

169 Id Sec 5

170 DENR, "DENR Opens National Search for Sustainable and Eco-friendly Schools." *DENR News and Features,* 4 November 2012. Accessed March 15, 2014. http://www.denr.gov.ph/news-and-features/latest-news/1025-denr-opens-2013-national-search-for-sustainable-and-eco-friendly-schools-.html

171 Additional information is available at http://www.sustainableschools.ph/index.html

Target 20. Resource mobilization

Resources can be mobilized from various sources, among them national and local governments, overseas development assistance, CSOs, private sector and other development partners.

The NIPAS Act provided for the establishment of an Integrated Protected Areas Fund (IPAF) where revenues generated from PAs are deposited and utilized for the protection, maintenance, administration and management of the PAs. As of 2014, only 149 PAs (62%) of the 240 PAs have established their PA funds and only 30 PAs (20%) of these 149 PAs have accessed their funds. Entrance fees and facilities user fees are often the most collected fees, with only 44 (18%) of the 240 PAs charging entrance fees and 31 (13%) PAs imposing facilities user fees. [172]

The Wildlife Management Fund established pursuant to Section 29 of RA 9147 became operational in 2011 by virtue of Republic Act 10147 (General Appropriations Act for FY 2011) and upon designation of a Special Account for the Fund in the National Treasury (coded as Fund 151) by the Department of Budget and Management. The DENR can utilize a maximum limit of PhP5.50M from the Wildlife Management Fund annually for enforcement, monitoring and enhancement of capabilities of relevant agencies, among other allowable activities.

Annex 4 and 4a show a list of biodiversity-related P/P/As funded by multilateral, bilateral, CSOs and the private sector. Other funds for biodiversity-related work such as research, advocacy, capacity building and community enterprise can be sourced from the FPE, PTFCF, Foundation for a Sustainable Society Inc., Peace and Equity Foundation and the UNDP-GEF Small Grants Program, among others.

3.2 Contribution of Actions towards the 2015 Millennium Development Goals (MDG)

The MDGs focus on eight major goals to be attained by 2015, namely: 1) end poverty and hunger; 2) universal education; 3) gender equality; 4) child health; 5) maternal health; 6) combat HIV/AIDS; 7) environmental sustainability; and 8) global partnership.

Biodiversity-related actions have mainly addressed MDG 7, particularly the following identified targets under this Goal: Target 10 (Implement national strategies for sustainable development by 2005, to reverse loss of environmental resources by 2015); Target 11 (Halve the proportion of people with no access to safe drinking water and basic sanitation or those who cannot afford it by 2015); and Target 12 (Achieve a significant improvement in the lives of at least 100 million slum dwellers by 2020). Nonetheless, note that the targets and indicators for MDG 7 comprise only a small part of what it means to ensure environmental sustainability.

For Target 10, the following indicators used were:

Proportion of land area covered by forest	↑	20.5 (1990)		23.9 (2003)	↓	22.8 (2010)
Consumption of ozone-depleting Chlorofluorocarbon CFCs (Ozone Depletion Potential or ODP tons)	↓	2981 (1990)		236 (2009)	↓	0 (2012)
Ratio of area protected to maintain biological diversity to surface area		8.5 (1990)	↑	13.5 (2010)	↑	13.6 (2012)
Number of faunal species threatened with extinction		183 (1992)	↑	221 (2006)	↓	207 (2012)

Sources: NSCB 2013, MDG Watch; NSCB 2014, MDG Watch; DAO No. 2004-15 re: National List of Threatened Terrestrial Species of Wild Fauna and 2011 CITES Appendices

In general, the data from the DENR-FMB cited by the National Statistical Coordination Board (NSCB) shows that forest cover decreased. Data from the DENR-EMB shows that the consumption of ozone-depleting CFCs (ODP tons) was eliminated. Finally, data from the DENR-PAWB shows that the coverage of Protected Areas increased slightly and the number of species threatened with extinction decreased.

172 REECS. *Final Report on Sustainable Financing of Protected Areas: Report submitted to DENR-BMB and World Bank*. Quezon City, Philippines: REECS, 2014.

Several policies, programs and plans listed in Section 2.3 of Chapter 2 are currently in place to meet this target. There is specific guidance from relevant biodiversity-related provisions of the PDP 2011-2016, local Land Use and Development Plans and from the Strategy and Action Plans on wetlands, caves, peatlands, river basins, climate change, disaster risk reduction and management and desertification, land degradation and drought, among others. A major challenge, however, is the actual implementation of these plans, particularly the sectoral plans and tracking aggregate results and impact on environmental resources and human well-being.

For Target 11, the following indicators used were:

Proportion of population with access to safe water supply	73.0 (1990)	84.1 (2008), 84.4 (2011)	86.5 (2015 target)	☺
Proportion of households with sanitary toilet facility	67.6 (1990)	89.0 (2008), 91.9 (2011)	83.8 (2015 target)	☺

Source: NSCB 2013, MDG Watch; NCSB 2014, MDG Watch

In sum, the data shows a more than 10-percent increase in the proportion of the population with access to safe water supply over an 18-year period. With this trend, NEDA et al projected in 2007 that the 2015 target of 86.5 percent is likely to be achieved.[173]

A government initiative that paid particular attention to improving access to water was the Sagana at Ligtas na Tubig Sa Lahat (SALINTUBIG) Program implemented by the DILG, Department of Health and the National Anti-Poverty Commission in 2010. SALINTUBIG aimed to enable identified waterless municipalities improve their provision of water services by providing capacity building and infrastructure investment.[174]

Similarly, there was a more than 20-percent increase in the proportion of households with sanitary toilet facilities, already meeting the target set by the National Statistics Office Annual Poverty Indicators Survey in 2004.[175]

Consistent with these projections, data from 2011 supplied by the Philippine Statistics Authority shows that 84.4 percent of the population enjoyed access to safe water supply and 91.9 percent of households had sanitary toilet facilities. With more than 0.9 percent progress, there is thus a high probability of meeting the 2015 goals for these two targets.[176] It is implied that a healthy watershed, clean water sources and systems can help maintain and sustain the well-being of communities in these areas.

For Target 12, the following indicator was used:

Proportion of households with access to secure tenure	91.0 (1990)	↓	90.8 (2010)	

Source: NSCB 2014, MDG Watch

Data shows a slight decrease in the proportion of households with access to secure tenure.

Nonetheless, the National Priority Plan for 2014, or the list of the government's priority projects, programs and activities issued by NEDA on an annual basis, includes the Community Mortgage Program (CMP) and the High Density Housing Program (HDHP). These programs, whichvv are implemented by the Housing and Urban Development Coordinating Council and Social Housing Finance Corporation provide financing options to organized associations of residents in depressed areas to enable them to acquire security of tenure and build their communities.[177] More than tenure, it is important that these communities are built in environmentally-secure and safe areas, where exposure to geologic and climate hazards are minimal.

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173 NEDA et al *Philippines Midterm Progress Report on the Millennium Development Goals* (Pasig City: NEDA: 2007), 37 and Roehlano Briones, et al. *Assessing Development Strategies to Achieve the MDGs in the Republic of the Philippines* (Philippines: United Nations Department for Social and Economic Affairs, 2011), 14

174 NEDA, *Socioeconomic Report of the first two years of the Aquino Administration* 2010-2012 (Pasig City: NEDA: 2010), 93

175 NEDA et al, *Philippines Midterm Progress Report on the Millennium Development Goals* (Pasig City: NEDA: 2007), 37-8

176 "MDG Watch 2014," Data as of May 2014, Accessed 5 August 2014, http://www.nscb.gov.ph/stats/mdg/mdg_watch.asp

177 "2014 National Priority Plan," NEDA, Accessed 6 August 2014. http://www.neda.gov.ph/?p=2723,

3.3 Lessons learned

3.3.1 Highlights of Accomplishments and challenges

Among the major highlights of accomplishments to meet the Strategic Plan 2011-2020 and the Aichi Biodiversity Targets are in the areas of PA governance, wildlife enforcement and mainstreaming of biodiversity concerns through policy guidelines. These include:

Establishing Indigenous and Community-conserved Areas (ICCAs)

Traditional governance as practised in ICCAs has long played a direct role in the conservation and maintenance of ecosystems and the species that inhabit them. There is increasing recognition of ICCAs by the international community, the national government and by the IPs in their role in this new governance regime. A national consortium called Koalisyon Ng Katutubo at Samahan Ng Pilipinas (KASAPI) was designated to establish the ICCA Network in the Philippines. More IP communities have expressed to have their own ICCAs documented and mapped.

Through the NewCAPP, the Philippines experience in the recognition of ICCAs was presented during COP11 and was cited as pioneering and one of the best practices in global initiatives on the recognition of ICCAs as a viable parallel approach to PA governance and in the achievement of Aichi targets. Aside from ICCA recognition, the role of LGUs in local legislation and partnership with stakeholders in this effort are being strengthened.

Mainstreaming Biodiversity in the Local Land Use Planning Process of LGUs.

The conservation and sustainable use of biodiversity concerns all stakeholders. It is important to harness the cooperation of LGUs and local stakeholders' organizations in the implementation of biodiversity –related programs. This can be addressed by ensuring that biodiversity conservation is mainstreamed into the LGUs' governance system, particularly in decision-making, land use planning, zoning, investment planning and program implementation. This will also help institutionalize the co-management of PAs, KBAs and Critical Habitats between the DENR and LGUs.

Through the BPP, a framework and methods for mainstreaming biodiversity into the Comprehensive Land Use Plans (CLUP) of LGUs has been prepared as a supplementary guide to LGUs in the preparation of their plans. Among the various land use management options proposed to conserve biodiversity are: a) assessment of the long-term implications of existing land uses on PAs, KBAs and Critical Habitats; b) integration of PA, KBAs and CH zoning with CLUP zoning; c) monitoring of KBAs and Critical Habitats and limiting agriculture and settlements to multiple use zones of PAs; and d) relocation of incompatible land uses within and in the periphery of Critical Habitats, KBA protection areas and PA core or strict protection zone. Given the novelty of this tool, key government and LGU planners need to be trained in its application. It is hoped that at the end of the Project, pilot LGUs have integrated and mainstreamed biodiversity into their land use planning process and positive outcomes are realized by the LGUs and their citizenry.

Leading action in wildlife traffic.

In 2013, the Philippines destroyed over four tons of seized ivory worth roughly USD$6.5 million, becoming the world's first ivory-consuming nation to destroy its national ivory stock. It sent the message that the country denounces the continuous killing of elephants for illicit ivory trade and does not tolerate illegal wildlife trade in both international and domestic markets.

Developing biodiversity-friendly businesses.

Several P/P/As have also focused on the development of biodiversity-friendly businesses as a means to address livelihood needs of communities living in or in the peripheries of PAS, KBAs and Critical Habitats and contribute in significant wealth creation for these communities and for the country.

Biodiversity-friendly businesses refer to economic activities and practices that promote the sustainable use of biodiversity. These include environment-friendly and sustainable enterprises and livelihoods (e.g. natural salt production, reef discovery, ecotourism, including nature and agri-tourism). The BPP has categorized these businesses into: a) those directly contributing to biodiversity conservation (e.g. planting of trees, nature and agri-tourism); b) those that divert attention from PAs, KBAs and Critical Habitats (e.g. copra and coco sugar production); c) those that involve payment for ecosystem services (e.g. tour guiding, cave guiding); and d) those that use non-timber products or non-endemic aquatic resources (e.g. bag production using rattan, water lily).

These major accomplishments are just in their infancy and will encounter many hits and misses in their implementation before any major outcome can be achieved. It is hoped that the lessons learned can be properly documented and disseminated for future guidance.

3.3.2 Next Steps

The following actions are recommended to enhance implementation of the CBD and meet the strategic goals and targets of the Strategic Plan for Biodiversity 2011-2020:

Creating/establishing an updated PBSAP coordination and management process and structure.

The PBSAP project management and stakeholders have recommended that there shall be created, through an EO, a management structure that clearly sets the roles, functions and initial funds for the implementation, monitoring and evaluation of the PBSAP. This approach will ensure that the indicators and targets of identified direct and supporting actions are properly tracked against baselines and progress or constraints to progress are identified and addressed accordingly;

Strengthening inter-agency, cross-sectoral and multistakeholder partnerships and coordination.

The conservation and sustainable use of biodiversity is the concern not only of the DENR or the BMB but other national and local governments, CSOs, academe and research institutes, private sector and local communities as well. At the national level, the institutional responsibility for biodiversity appears to be fragmented and focused largely on the DENR. Biodiversity and its attendant ecosystem services are not limited to the ENR sector alone but cuts across various ecosystems, national and local agencies and development sectors and should therefore be addressed in an integrated manner- across sectors, agencies and disciplines.

Harmonizing and complementing biodiversity actions and sites.

There are many ongoing P/P/As with components on policy formulation, CEPA, biodiversity-friendly business on enterprise, capacity building and sustainable financing, among others. However, there is no comprehensive system for the harmonization and complementation of these projects and project sites to ensure that resources are maximized and used judiciously and contributions to change or collective outcomes are measured. The DENR-BMB has initiated efforts to harmonize activities related to sustainable financing and PA management; however, this should be expanded to cover other important components like CEPA, etc.

Encouraging private sector corporate responsibility and investments.

In most discourses and consultations on biodiversity and ecosystem services, including in the updating of the PBSAP, there has been limited participation by the private sector. This does not mean that they are less engaged since their corporate social responsibility often includes environment-related activities such as tree-planting, community service, etc.

More than corporate social responsibility, however, the private sector can also invest in biodiversity-friendly businesses or engage communities as part of the value chain and help communities improve their livelihoods. Documentation of best practices of private sector engagement in biodiversity-friendly businesses, whether as micro, small, medium and large, can be a useful guide for other stakeholders who are similarly interested.

Building appreciation and capacity of local governments on biodiversity for wealth creation.

Biodiversity is wealth and this is a message that should be sent across to LGUs to enable them to recognize the vast assets within their territorial jurisdiction. Local accounting and valuation of biodiversity and ecosystem services can help local officials with planning and decision-making.

Addressing urbanization and food security through urban biodiversity and agro-biodiversity.

Both urban biodiversity and agrobiodiversity are relatively novel focal areas compared to terrestrial, inland wetlands, coastal and marine ecosystems. Yet its importance cannot be overemphasized. The level of urbanization in the Philippines is estimated to be at 65% by 2030, up from the current estimate of 49% by the National Economic and Development Authority (Ambanta, 2013). Rapid urbanization has led to the expansion of city boundaries, counting biodiversity decline and habitat loss as some of the most apparent yet poorly understood costs of growth. While the economic performance of cities is hailed as a priority metric of development, this is measured with little regard for the biodiversity and ecosystem services that are compromised by urbanization. It is important to: a) create a knowledge base about urban biodiversity values that will be the reference point for future valuation and formulation of strategies and action plans and b)enhance governance and capacities of national and local implementing bodies in addressing urban biodiversity.

The same can be said of agrobiodiversity. Land use change and resulting habitat loss, overexploitation and pollution have threatened many indigenous and endemic varieties and practices causing pressure or loss of globally significant agricultural biodiversity in the Philippines. Among others, it is important to improve the status of agrobiodiversity and promote biodiversity-friendly agriculture through direct actions that incorporate agro biodiversity concerns in the management plans of biodiversity conservation areas under PA or in non-PA conservation areas.

Documenting and scaling up best practices.

Many P/P/As have generated best practices in biodiversity conservation and sustainable use. Undocumented best practices should be documented and documented best practices should be properly disseminated for broader adoption, replication and/or scaling up. The first Protected Area Recognition Awards can be expanded to include awards for best practices not by the PA but by national and local agencies, business sector, academe, media, or even individual champions who have contributed to a positive change in biodiversity conservation.

Valuating and financing biodiversity.

The real value of the ENR sector includes the ecosystem services that they provide but these are hardly monetized and therefore not appreciated for their economic value which may be more valuable than the market price of natural resources products.

The recent midterm review of the PDP has identified as a policy challenge the absence of ENR valuation and accounting. Challenges to operations, on the other hand, include the inadequate and non-sustained financing for ENR, climate change adaptation/mitigation and disaster risk reduction and management. More efforts should be focused on these areas to ensure proper planning and decision making by national and local authorities, and sustainability of PA operations and management, among others.

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ANNEX 1

PHILIPPINE FACTS AND FIGURES

Area:

Total	..... 300,000 km^2
Land	..... 298,170 km^2
Water	.....1, 830 km^2

Boundaries:

North:	Balintang Channel
South:	Sulu and Celebes Sea
East:	Philippine Sea/Pacific Ocean
West:	South China Sea

Total Coastline: .....36, 289 km^2

Maritime Claims:

Total Territorial waste area including	
Exclusive Economic Zone	2,200,000 km^2
Coastal	266,000 km^2
Oceanic	1,934,000 km^2
Continental shelf area	184,600 km^2

Climate:

Tropical; northeast monsoon (Nov. to April);
Southwest monsoon (May to October)

Terrain:

Mostly mountains, with narrow to extensive coastal lowlands

Elevation extremes:

Lowest point	Philippines Sea 0 m.
Highest Point	Mt. Apo 2, 954 m

Land use:

Arable land	18%
Permanent crops	17%
Forest Cover	25%
Others	40%
Forestland	14.21 M has
Alienable and Disposable Lands	15.98 M has

Protected Areas (PA & Buffer) Zone (BZ)	5.23 M has (PA); 0.22 M has (BZ) ;
Terrestrial ecosystem	4.09 M has (PA); 0.20 M has (BZ);
Marine Ecosystem	1.14 M has (PA); 0.19 M has (BZ)

Environment – International Agreements:

Party to: Climate Change-Kyoto Protocol, Endangered Species, Hazardous Wastes, Marine Dumping, Nuclear Test Ban, Ozone Layer Protection, Biodiversity-Cartegena Protocol, Wetlands, Migratory Species, World Heritage Whaling, POPs

GDP (constant 2000 prices, 2012) PhP 10,564,886 M
GDP Growth Rate (2012) 8.9% (from 2011)
GDP composition by sector: (constant 2000 prices)
Agriculture (2012) PhP 698,937 M
Industry (2012) PhP 2,022,623 M
Services (2012) PhP 3,590,111 M

Unemployment Rate (4Q, 2013) 7.2%
Industrial production growth rate 5.39%
Agriculture production growth rate 2.81%
Agriculture – products: rice, corn, sugar, sugarcane, banana, pineapple, mango, cassava, and carabao, cattle, hogs, goats, chicken, ducks, livestock, and poultry products
Exports (constant 2000 prices) **USD 77.07 M**
Imports **USD 85.06 M**
Exchange Rate (2012, Average) **PhP 42.2**

Population (2010) 92,337,852
Population growth rate (1990-2010) 2.12%
Urban population (2010) **45.3%**
Access to safe water **82.5%**
(% of population 2010)
Life expectancy at birth (2015-2010)
Male 68.81
Female 74.34
Simple Literacy (2008) **95.6%**
Functional Literacy (2008)
Male **84.2%**
Female **88.7%**
Elementary Participation rate
SY 2008-2009 **89.12%**
SY 2009-2010 **89.43%**
SY 2010-2011 **95.92%**
SY 2011-2012 **97.32%**
SY 2012-2013 **95.24%**
Visitors Arrivals (2013) **4,477,695**

National Capital Manila
Geo-political Subdivisions
Regions *17*
Provinces *81*
Cities *140*
Municipalities *1,494*
Barangays *42,026*
Independence June 12, 1898

Sources: Updated from 4th National Report; Philippine Statistical Yearbook 2013, 2010 Census of Population and Housing, United Nations Statistical Yearbook (53rd Issue), Asian Development Outlook 2013

ANNEX2

PHILIPPINE BIODIVERSITY STRATEGY AND ACTION PLAN 2014-2025
(Draft as of April 2014)

AICHI Strategic Goals being addressed B. Reduce the direct pressures on biodiversity and promote sustainable use. C. To improve the status of biodiversity by safeguarding ecosystems, species and genetic diversity. D. Enhance the benefits to all from biodiversity and ecosystem services.				
Terrestrial Ecosystems				
Priority Strategy 1	**Direct Actions**	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
Protect and conserve existing natural habitats and pursue restoration of the functionality of degraded habitats.	1. Ensure all natural habitat types are known and represented in the existing plans.	2, 5, 11, 12, 14	S	BMB*, FMB, ERDB
	2. Implement action plans on forests, wetlands, caves, peat lands, and mangroves.	4, 5, 7, 11, 12, 14, 15	L	Depends on the plan
	3. Recognize the contribution of IPs and LGUs to biodiversity conservation.	1, 2, 4, 5, 11, 14, 18	M	BMB*, NCIP, DILG, LGUs
	Supporting Actions	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
	4. Mainstream biodiversity conservation into national and local planning processes.	1, 2, 4, 5, 11,	S, M, L	PIA*, BMB*
	5. Increase awareness of various stakeholders on Biodiversity to effect behavioral change.	1, 5, 11, 18, 19	S, M, L	BMB*, Congress, NEDA
	6. Implement priority legislative and policy actions.	1-20	S	BMB*, FMB, ERDB

Priority Strategy 2	Direct Actions	AICHI Strategic Targets	Timeframe	Responsible Agencies
Effectively regulate use of resources within sustainable limits.	7. Improve capacities of local stakeholders and communities to control and limit overexploitation and destructive practices on agriculture and forestry resources.			
	8. Facilitate the provision of biodiversity friendly livelihood to the locals.			
	9. Adopt existing and develop new technologies to reduce utilization of existing resources.			
	10. Implement national species conservation action plans for globally and nationally threatened species.			
Priority Strategy 3	**Direct and Supportive Actions**	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
Conserve and protect natural ecosystems to improve the resilience of vulnerable communities.	Same as Direct and Supportive Actions in Priority Strategies 1 and 2.			
Priority Strategy 4	**Direct Action**	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
Arrest the proliferation of invasive alien species through coordinated efforts on awareness raising, research, capacity building and law enforcement.	11. Implement the National Invasive Species Strategy and Action Plan (NISSAP).			
AICHI Strategic Goals being addressed				

Aquatic Ecosystems (Freshwater and Marine)				
Priority Strategy 5	**Direct Actions**	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
Implement habitat rehabilitation programs and strengthen collaboration among relevant agencies and stakeholders on land and water use, resource extraction, ecosystem restoration, law enforcement and sustainable livelihoods especially for vulnerable sectors such as indigenous peoples, women and youth.	12. Rehabilitate identified priority areas (criteria to be developed) i.e. degraded riparian forests, peatlands, beach, mangrove, intertidal areas, seagrass, soft-bottom, coral reef habitats.	5	L	DENR (FMB, BMB, NAMRIA, DA-BFAR,
	13. Establish additional critical habitats and appropriately sized marine/wetland protected areas and networks based on the KBA identification process.	11, 15	L	DENR (FMB, DILG, BMB, LLDA, special agencies, NCIP, BFAR), CSOs, Academe
	Supporting Actions	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
	14. Sustainably manage important Philippine ecosystems through the implementation of relevant action plans.	11, 15	S, M, L	DENR, NEDA, DBM, LGUs, CSOs, Academe, BFAR
	15. Strict enforcement of existing easement policies within priority areas.	2	S, M, L	DENR-EMB, DILG, CSOs, Private sector (e.g. Chambers), LGUs
	16. Mainstream biodiversity conservation into national and local planning processes.	2	S, M, L	DENR-BMB, DILG, CSOs, Private sector (e.g. Chambers), LGUs, HLURB, NEDA, Leagues, NIA, MWSS, RDCs, Transco, NWRB, LLDA, NCIP, PCSD
	17. Implement CEPA activities for various stakeholders on biodiversity to effect behavioral change.	1	S, M, L	DENR, PIA, DepEd, CHED, Academe, CSOs,

				All mass media, Private sector, Religious sector
Priority Strategy 6	**Direct Actions**	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
Enhance the participation and involvement of local communities for a more responsive governance mechanism and national and local implementing bodies	18. Implement viable biodiversityfriendly, sustainable livelihood interventions for the locals.			
	Supporting Actions	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
	19. Improve capacities of local stakeholders and communities to control and limit overexploitation and destructive practices on fisheries, agriculture, aquaculture and forestry resources through policy reform and advocacy, trainings and intensive and extensive awareness raising activities.			
	20. Manage a more equitable utilization of mineral resources (e.g. from mining and quarrying) and ensure minimal impact on aquatic biodiversity).			
	21. Implement national species conservation action plans for globally and nationally threatened and CITES species.			

AICHI Strategic Goals being addressed
A. Address the underlying causes of biodiversity loss by mainstreaming biodiversity
B. Reduce the direct pressures on biodiversity and promote sustainable use.
C. To improve the status of biodiversity by safeguarding ecosystems, species and genetic diversity.
E. Enhance implementation through participatory planning, knowledge management and capacity-building

Agro Biodiversity				
Priority Strategy 7	**Direct Actions**	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
Improve status of Agro biodiversity and promote biodiversity-friendly agriculture.	22. Incorporate agro biodiversity concerns in management plans of biodiversity conservation areas under PA or in non-PA conservation areas outside the PA system (managed by communities or LGUs).		M	
	23. Incorporate Agro biodiversity concerns in land use guidelines of agricultural landscapes not declared as conservation areas.		M	
	24. Increase number of in situ and ex situ sites actually conserving and propagating diverse indigenous species and varieties.		M	
	Supporting Actions	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
	25. Promulgate research-based policies that acknowledge the role of Agro biodiversity in food security, environmental management and climate change adaptation; as well as enhance such role through implementation of agricultural support services forcommunities that harbor high Agro biodiversity.			
	26. Consider Intellectual Property Rights.			
	27. Strengthen the education system and agriculture support services system for IP managed areas with high Agro			

	biodiversity(to address cultural erosion).			
	28. Undertake Research and Development that establish the true value of areas of agricultural landscapes harboring high biodiversity, as well as value addition to traditional products of Agro biodiversity.			
	29. Activate Sharing Network			
AICHI Strategic Goals being addressed A. Address the underlying causes of biodiversity loss by mainstreaming biodiversity B. Reduce the direct pressures on biodiversity and promote sustainable use. D. Enhance the benefits to all from biodiversity and ecosystem services E. Enhance implementation through participatory planning, knowledge management and capacity-building				
Urban Biodiversity				
Priority Strategy 8	**Direct Actions**	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
Enhance governance and capacities of national and local implementing bodies in addressing urban biodiversity.	1. Adapt the Cities Biodiversity Index (CBI) to Philippine conditions as the guiding framework. 2. Accelerate implementation of basic environmental management function (SWM, water, coastal management)	1, 2, 8, 14, 17, 18, 19, 20	S, M, L	LGU, DILG, Leagues of C/P, DENR, HLURB, Academe, Private sector, DENR, DPWH, DOTC, DA
	Supporting Actions	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
	3. Enhance LGU-led multi sect oral and capacity building for the identified actions.	1, 2, 8, 14, 17, 18, 19, 20	S, M, L	HLURB, DILG, Leagues and LGUs, DENR, CSO, SUCs

Genetic Resources (for all ecosystems)				
Priority Strategy 9	**Direct Actions**	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
Implement the Nagoya Protocol consistent with national legislation	33. Create a working group composed of Tier 1 agencies (agencies implementing 2005 guidelines)	16	S, M, L	BMB with inter-agency member agencies
	34. Obtain inventory of researches on biodiversity and indigenous knowledge systems and practices (IKSP)		S	BMB with inter-agency member agencies
	35. Put in place unified system of access and benefit-sharing (ABS) schemes		S, M	FSI, UP Institute for LegalStudies
	Supporting Actions	**AICHI Strategic Targets**	**Timeframe**	**Responsible Agencies**
	36. Raise awareness on ABS.	16	S	BMB with inter-agency member agencies
	37. Strengthen national network of biodiversity conservation research institutions.	16	S	BMB
	38. Explore the need for a comprehensive framework on biodiversity research.	16	S	BMB with inter-agency member agencies
	39. Undertake economic studies.	16	S, M, L	NEDA
	40. Develop an information system, which includes tracking/monitoring systems.	16	S, M	DENR-BMB, NCIP, PCHRD, DA-BFAR
	41. Build capacity of key agencies for ABS implementation.	16	S	DENR, DA, NCIP, Palawan Council for Sustainable Development

ANNEX 3

PBSAP 2014-2025: NATIONAL TARGETS & INDICATORS (Draft as of April 2014)

Priority Strategy 1

Protect and conserve existing natural habitats and pursue restoration of the functionality of degraded habitats.

National Targets	Indicators
By 2015, identify all known natural habitat types, identify gaps and include them in the existing plans.	Maps and plans where they are incorporated
	Trends in representation gaps
At most, Xpercent of identified habitat type lost (X to be determined by April 2015).	Percentage of forest cover from 2010 baseline
	Number of hectares of each type of natural ecosystem
At least Xpercent of identified degraded habitat (X to be determined by April 2015) restored where technically appropriate.	Number of hectares of habitats restored
By 2020, identify all known traditionally and locally conserved areas, identify gaps and strengthen their recognition.	Progress in mapping traditionally and locally conserved areas.
	National registry of ICCAs and LCAs established.
By 2025, Xpercent of LGUs mainstreaming biodiversity into their CLUPs and allocating budgets for it .	Trends in LGUs that have mainstreamed and budgeted for biodiversity from 2013 baseline
	Number of ordinances passed affording protection to biodiversity from 2013 baseline.
By 2016, biodiversity and ecosystem services are incorporated and applied to the processes of EIA and SEA.	Amended EIA policy and procedural guidelines; Formulate SEA guidelines for key sectors.
Xpercent of the population are aware of the benefits of the ecosystem they are dependent upon.	Trends in awareness levels.
Xpercent of the population practicing environmentally appropriate way of life.	Trends in populations involved in environmentally sustainable practices.
Gather data on specific offenses on PAs and other habitats.	Number and types of offenses in PAs filed (other habitats a key challenge).
Reduce the trend in (a) by Xpercent by 2025.	Trends in offenses in PAs
	Threats and extent of impact of offenses on biodiversity.

Priority Strategy 2

Effectively regulate use of resources within sustainable limits.

National Targets	Indicators
By 2025, relative abundance of threatened species maintained or improved.	
Gather data on utilization of economically important species by;	
Number of communities, which have defined carrying capacities of resources that they use.	
Xpercent of population engaged in biodiversity environmentally sustainable practices.	
Reduce unsustainable use of economically important species by Xpercent by 2025.	
By ____ ,Xpercent of livelihoods in PAs and Ypercent of livelihoods outside PAs are biodiversity friendly. (NOTE: X>Y)	Trends in dependence of target populations on forest resources
Xpercent of households and Ypercent of industries adopting/practicing new technologies.	Number of households applying new technologies
Develop and implement a national certification system for natural resources.	Trends in number of organizations/companies certified from 2013 baseline
By 2025, relative abundance of threatened species maintained or improved.	Number of sighting encountered
Improve conservation status of nationally threatened species.	Conservation status of nationally threatened species from 2013 baseline

Priority Strategy 3

Implement habitat rehabilitation programs and strengthen collaboration among relevant agencies and stakeholders on land and water use, resource extraction, ecosystem restoration, law enforcement and sustainable livelihoods especially for vulnerable sectors such as indigenous peoples, women and youth.

Priority Strategy 4

Arrest the proliferation of invasive alien species through coordinated efforts on awareness raising, research, and capacity building and law enforcement.

National Targets	Indicators
Establish leadership and strengthen collective action in the implementation of the NISSAP and to adapt the management of IAS in light of new and emerging scientific information.	A Joint Administrative Order/EO on IAS to strengthen and expand the memberships of existing committees and their functions; creating a National IAS Coordinating Body
Stop the entry and new introductions of IAS, as the first-line of defense.	No new IAS introduced by 2016 (baseline 2013)
	IAS mainstreamed to the existing EIS system to include prevention, control and regulation of IAS in protected areas, critical habitats, and protected forests
	IAS clearing house/database with published research studies and roster of experts on IAS
Identify, report, and promptly respond to newly introduced IAS by eradicating or containing them before they become widespread.	Detection integrated with Biodiversity Monitoring System and other site assessment programs
	Reporting system developed (online/clearing house, centralized reporting system)
	New infestations eradicated
Reduce the impacts of widespread IAS by containing and reducing the spread of invasive populations and minimizing their harmful effects.	Task Force or IAS Units established
	Field surveys of native species in areas to be de-infested
	IAS population reduced
	IAS integrated into PA Management Plans
Rehabilitate areas (in particular areas of high biodiversity value) where IAS have been contained or eradicated.	Number of hectares restored (2013 baseline)
Generate basic and applied scientific knowledge about IAS problems, provide policy advice to efficiently control and manage IAS, and generate online database and information exchange program.	Research gaps identified and addressed
	National IAS Research and Information Network
Promote better and broader understanding and awareness of the threats of IAS and foster stakeholder support for the implementation of the NISSAP.	IAS information campaign and public awareness program launched
	Increased awareness on IAS
Strengthen the role of the Philippines in meeting its commitments to international treaties, agreements, etc., urging for technical and financial support to enhance national capacities and capabilities to implement the NISSAP.	Ratification of the Ballast Water Convention
	IAS concerns incorporated into the Philippine Ecotourism Strategy and Action Plan
Strengthen the technical and management capacities of relevant government units, at the national and local levels, as well as concerned stakeholders in implementing the NISSAP.	Capacity-building program on IAS for NGAs funded and implemented

Priority Strategy 5

Implement habitat rehabilitation programs and strengthen collaboration among relevant agencies and stakeholders on land and water use, resource extraction, ecosystem restoration, law enforcement and sustainable livelihoods especially for vulnerable sectors such as indigenous peoples, women and youth.

National Targets	Indicators
At the minimum, no net loss in natural ecosystems in priority areas such as riparian forests (check with NAMRIA), peat swamp and beach forests (Baseline 2010?) by 2025	Extent of natural forest ecosystems cover
At the minimum, no net loss in natural ecosystems in priority areas such as mangrove, intertidal areas, seagrass, soft-bottom, coral reef habitats (Baseline 2010?) by 2025	Extent of natural ecosystems cover showing species diversity and abundance
	Extent of natural ecosystems cover showing species diversity and abundance
All natural ecosystems effectively managed	percent of area of natural ecosystems under various effective management regimes
All degraded natural ecosystems rehabilitated/restored (Baseline from SCREMP, NACRE)	percent of area of degraded natural ecosystems rehabilitated/restored
Action plans funded and relevant stakeholders take action	Number of action plans sufficiently funded and effectively implemented
Popularization and effective management of easement policies	Number of LGUs incorporating easement protection principles in their policies, plans & programs
	Number of LGUs monitoring and addressing violations
Development, adoption and effective implementation of biodiversity-responsive guidelines in the EIS process	Number of ECCs with biodiversity conditionalities that conform to EIS guidelines
Promote implementation of enhanced CLUPs using HLURB framework on biodiversity mainstreaming guidelines	Number of LGUs implementing enhanced CLUPs
Promote species and ecosystems-based land and water use planning (eg regional, island, biogeographic zone, corridor, bay-wide, basin-wide, PA-wide, KBA)	Number of plans jointly prepared by LGUs and other stakeholders
Increase awareness levels on biodiversity from 17percent baseline (2005) to 45percent by 2025	Trends in awareness levels
Science-based information on aquatic biodiversity translated into popular media to educate the general public on best practice	Number of available media materials
	Trends on adoption of best practices (eg violations, dulong, padas, ludong, eels)

Priority Strategy 6

Enhance capacities and governance mechanisms for regulating access of national and local implementing bodies.

National Targets	Indicators
Develop and implement biodiversity friendly sustainable livelihoods	Trends in ecotourism-based and other biodiversity friendly livelihoods
	Trends in number of individuals benefitting from ecotourism and other biodiversity friendly livelihoods
	Trends in incomes from ecotourism (LGU, PO etc) and other biodiversity friendly enterprises
Develop & implement standards for biodiversity friendly sustainable livelihoods (BPP)	Number of biodiversity friendly sustainable livelihoods adhering to the standards implemented in priority areas
Develop and implement incentive systems (e.g. certification) for biodiversity friendly and sustainable livelihoods	Incentive system in place
LGUs in priority aquatic ecosystems/areas with working permitting/regulating access systems in place	Number of LGUs, communities, etc. with working permitting/regulating access systems in place
LGUs in priority aquatic ecosystems/areas with working permitting/regulating access systems in place	Number of LGUs, communities, etc. with working permitting/regulating access systems in place
No mining activities in coastal and riparian areas	Incidence of mining activities in coastal areas
Review and reduce perverse incentives and subsidies that promote mining and quarrying in priority /important riparian and coastal areas and extraction of associated biodiversity (cross ref with IAS)	Trends in perverse incentives and subsidies that promote mining and quarrying in priority /important riparian and coastal areas and extraction of associated biodiversity
No extinction and improved conservation status of nationally threatened species (assuming there is a database on species and actions for the species reported and monitored)	Threat status of nationally listed threatened species
National population of globally threatened species stable	Level of threats on globally threatened species

Priority Strategy 7

Improve status of Agro biodiversity and promote biodiversity-friendly agriculture.

National Targets	Indicators
Agro biodiversity opportunities are incorporated in PA management plans (e.g. in multiple use zones) in at least ___percent of terrestrial PAS with known high agro biodiversity increase the number of areas recognized as ICCAs and LCA over baseline	Number of PAs with Agro biodiversity as part of management plans developed Number of ICCAS and LCA
Agro biodiversity opportunities are incorporated in management plans of other declared conservation areas (100percent of ICCAs; xxx percent of LCAs).	
Increase the number of community based breeding and seed production programs over baseline.	Number of in situ conservation areas
Increase in number of pilot agricultural heritage sites applying dynamic conservation approaches with LGU support.	
Increase in number of ex situ conservation M programs over baseline (following an integrated strategy for in situ and ex situ conservation).	Number of ex situ conservation areas
The use of biodiversity friendly CLUP guidelines is adopted in at least 50percent of LGUS located in and benefiting from biodiversity.	At least x LGUs use the biodiversity friendly CLUP guidelines to update their CLUPs
Policy – Agro biodiversity in Protected Areas and ICCAs	
National Targets	**Indicators**
Presence of Agro biodiversity is included in the criteria for or identification and prioritization of Key Biodiversity areas.	Agro biodiversity is included in baseline info and discussion for the prioritization.
Guidelines are developed to incorporate Agro biodiversity conservation and sustainable use in Protected Areas management plans.	Guidelines for PA management planning contain Agro biodiversity conservation protocols
Policy promulgation recognizing Indigenous community Conservation Areas (ICCAs) that host Agro biodiversity.	Number of ICCAs over baseline
Agro biodiversity concerns are incorporated in in guidelines for the formulation of Ancestral Domain Sustainable Development Plans (ADSDPP) and documentation of IKSP	Guidelines for updating ASDPP preparation incorporate Agro biodiversity conservation concerns. NCIP staff and key NGO networks trained on Agro biodiversity.
Policy – Agro biodiversity in Agricultural programs	
National Targets	**Indicators**
Establishment of a Nationally Important Agricultural Heritage Systems (NIAHS) as currently jointly proposed by the DENR, DA,	Compendium of heritage agriculture systems. Number of agricultural heritage sites declared.

National Targets	Indicators
NCCA and National Museum that would potentially regards NIAHS sites as part of the cultural heritage system.	
Overall policy (EO) and implementing guidelines are established for guiding in situ and ex situ conservation, management and utilization of PGRA in consonance with the ITPGRFA.	EO on PGRFA conservation and sustainable use strategies promulgated.
Agro biodiversity concerns are incorporated in the guidelines for the AFMA mandated National Protected Area for Agro Industrial Development (NPAAD) as well as the SAFDZ agricultural land use planning Agro biodiversity is included in the criteria for zoning conservation areas process.	Agro biodiversity is included in the criteria for zoning conservation areas.
Clear DA policy and program is established to support farming communities who harbor high Agro biodiversity. Such policies may include improving access to credit and extension as well as certification of organic farm products.	Mechanisms such as Participatory Governance Systems (PGS) are incorporated in OA regulations.
Existing guidelines for the review of GMO introductions are amended to include independent risk assessment (by the DENR? or 3rd party???)	AO guidelines
AO promulgated to include planned introduction of GMO under the EIA review system	AO guidelines
Promulgate legislation or Exec order on labeling of GMO products EO or draft legislation under technical review.	EO or draft legislation under technical review
Governance and Capacity Building	
National Targets	**Indicators**
Increases in scores on Management Trends in management effectiveness scores from 2013 baseline effectiveness of PAS	Trends in management effectiveness scores from 2013 baseline.
Strengthen the implementation of revised FPIC S process (NCIP AO of 2012) for development works in ancestral domains	Number of FPIC considered compliant with proper processes
Increase in number of school of living traditions (SLT) that incorporate Agro biodiversity in their curriculum	Number of SLTS over baseline.
Assess current efforts and good practices of community based breeding /seed production and launch replication program	Integrated program by DA, NGO networks, SUC network for expanding in situ conservation
Participatory guarantee system (PGS) or equivalent system is adapted as a supplemental PGS established in selected heritage.	PGS established in selected heritage agricultural sites.

National Targets	Indicators
Research and Development and Knowledge Management	
Update inventory and characterization and geographic referencing of heirloom varieties, crop wild relatives and other underutilized crops and communicate information to key decision makers.	Food Exhibitions, joint ventures for agricultural product processing
Valuation is established on of role of traditional agricultural systems that harbor high agro biodiversity and its niche in modern agriculture	Human resources development program for PGRFA, NCIP, DENR, DA, DILG- LGA Number of Government and Non-Government personnel trained on targeted topics.
Dedicated Research program is undertaken to develop strategies that reduce dependence on GMO products in addressing agricultural problems (e.g. control of pest and disease etc.)	Updated inventory and assessment of communication programs.
The NISM (National integrated sharing network S) for PGRFA is revived and fully implemented in order to maximize benefits from ex situ and in situ conservation initiatives.	NISM is activated and funded by interagency agreement; meets at least 2 x a year.
Valuation is established on of role of traditional M agricultural systems that harbor high agro biodiversity and its niche in modern agriculture.	Results of valuation study taken up by sub cabinet clusters for agriculture, CC and environment.
Dedicated Research program is undertaken to develop strategies that reduce dependence on GMO products in addressing agricultural problems (e.g. control of pest and disease)	NISM is activated and funded by interagency agreement; meets at least 2x a year
The NISM (National integrated sharing network) for PGRFA is revived and fully implemented in order to maximize benefits from ex situ and in situ conservation initiatives.	
Research and Development program in place that Include products of Agro biodiversity (e.g. heirloom varieties) in current promotion of alternative lifestyle /health programs or ecotourism promotion)	Health and Nutrition communication products and events Agri ecotourism programs that contain Agro biodiversity.

Priority Strategy 8

Enhance governance and capacities of national and local implementing bodies in addressing urban biodiversity.

National Targets	Indicators
One urban model per region reflecting CBI starting with remnant natural resources)	No. of Urban model reflecting CBI established
Pilot biodiversity assessment and actions in urban areas (pockets) e.g. campuses, parks (manmade parks)	No. of areas/pockets assessed and action plan
Pilot or expand pilots alternative designs for (landscaping, green building)	Designs developed
LGU Implementing of ENR programs (e.g. SWM, coastal)	LGUs implementing ENR programs
Rehabilitation of polluted water ways	Percent of areas/waterways rehabilitated
Inventory of remnants habitats and natural habitats	List of remnant habitats and their coverage
IEC actions (including recognition system)	
Integration of urban biodiversity in CLUP	Guidelines/Polices integrating urban biodiversity in the CLUP developed
Adapt/Adopt the CBI by the leagues of LGUs	Policy/resolution adopting the CBI by the Leagues

Priority Strategy 9

Implementthe Nagoya Protocol consistent with national legislation.

National Targets	Indicators
To harmonize existing internal procedures	Signed Special Order creating the inter-agency working group
To identify policy areas where immediate actions can be taken	• Fee system • Expedited procedure for renewal applications • Full procedure for new applications • Sanctions for non-compliance • Dialogue with researchers • Streamlined and clear BMB/NCIP procedures
To require all publications to carry the following notice: Collection of species _____ covered by Gratuitous Permit/BU No. _____; dated _____; issued by _____	• List of publications bearing the required notice • Disclosure of sources and permits in patent applications • Coding of species covered by Materials Transfer Agreement including species number
To develop a national ABS policy framework incorporating Nagoya Protocol provisions	• Bill filed in Congress • Nagoya Protocol provisions are

	incorporated into agency IRRs
To get status of and compile past, present and future biodiversity/IKSP-related researches	• Number of funded projects/researches • Pipeline of past and current projects/researches
To identify benefit-sharing claims from past biodiversity researches	MOA provisions in past researches
To coalesce the ITPGRFA and PIP Framework with the Nagoya Protocol	Study on options for Philippine implementation
To develop an information package (integrated process flow) on existing ABS rules and supporting documents (e.g. affidavits of undertaking) for dissemination by regions in all sectors	• Presence of information in DENR, NCIP and other relevant government agencies' websites hyperlinked with Tier 2 agencies • Hard copies of the information package
To establish collaboration between and among concerned institutions	Number of collaborations
To undertake a study/review of the existing biodiversity research framework	Report on the review effort
To utilize study results in later ABS agreements	Economic studies
To put in place a functional information system	• Established ABS/IKSP information system • National MIS/bioinformation databases on biodiversity resources • Open access baseline information
To create a speakers pool at the national level	Number of special orders supporting formation of experts within the lead national implementing agencies
To train regional focals/LGUs	Number of regional focals/LGUs trained

ANNEX 4

MATRIX OF BIODIVERSITY-RELATED PROGRAMS/PROJECTS/ACTIVITIES

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
MULTI-LATERAL P/P/A							
1	Samar Island Biodiversity Project (SIBP) Phase II	The Samar Island Biodiversity Project is being implemented within the Samar Forest Reserve, which comprises around 360,000 hectares. The Project would establish the Samar Island Natural Park (SINP), a new protected area zoned for multiple uses centering on protection, but providing for sustainable harvests of non-timber forest products, and institute a comprehensive range of ancillary conservation measures to protect the park from human pressures. Park management would be operationalized in partnership with forest-edge communities with the aim of establishing a "social fence" against threats.	Forest-Edge Communities	Biodiversity	Region VIII - Eastern Samar, Western Samar & Northern Samar	UNDP-GEF/ TRAC	2008-2011
2	Globally Important Agricultural Heritage System (GIAHS)	The GIAHS aims to provide a systematic support to conservation and adaptive management of GIAHS from site to national to global level strategy project implementation. Seven countries, including Chile, China, Peru, Algeria, Morocco, Tunisia and the Philippines (through the Ifugao Rice Terraces (IRT)) representing five different agricultural heritage systems, were selected as pilot areas. The inclusion of IRT in this global initiative will help provide opportunity for the country to redress the erosion of traditional practices and customary use of biological resources among the indigenous communities.	Smale-Scale farmers, traditional & & indigenous family, target communities within GIAHS sites (IRT)	Forestry and Biodiversity	CAR - Ifugao	FAO/GEF	2008-2013
3	Rehabilitation and Sustainable Use of Peatland Forests in South-East Asia	The Project is to promote the sustainable management of peatlands in South East Asia to sustain local livelihoods to reduce risk of fire and associated haze and contribute to global environmental management, particularly biodiversity conservation climate change mitigation. A key strategy to develop sustainable uses of peatlands by local communities and conservation measures for areas of high biodiversity is the implementation of trial projects with local communities in pilot sites. Two pilot sites are proposed for the component: The Caimpugan peat area in the Agusan Marsh and Sab-a Basin Peatland on Leyte Island in the Visayas.	Local Community	Biodiversity	Region VIII - Leyte; CARAGA - Agusan Marsh	ASEAN/ GEF	2009-2013

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
4	Expanding and Diversifying the National System of Terrestrial Protected Areas in the Philippines (NewCAPP)	The NewCAPP was conceptualized to address key barriers/threats in biodiversity conservation (i.e. bio-geographical representative, limited capacity for PA management, and inadequate system for financial planning, budgetary management and revenue generation) and to expand and strengthen the terrestrial PA system in the country by developing new PA models and building capacity for effective management of the system.	Local Government Units (LGUs), Non-Government Units (NGOs), Local Communities, and Indigenous Peoples (IPs)	Protected Areas	CAR- Kalinga, Mt. Province; , Regions 3 - , Zambales, Tarlac, Bulacan; Region 4A - Rizal, Quezon; Region 4B - Mindoro Oriental, Mindoro Occidental; Region 7 - Cebu; Region 8 - Southern Leyte; Region 13 - Agusan del Norte, Surigao del Norte, Agusan del Sur; and ARMM - Tawi-tawi	UNDP-GEF	Nov. 2009-Nov. 2014
5	Partnership for Biodiversity Conservation: Mainstreaming in Local Agricultural Landscapes (BPP)	The BPP aims to demonstrate how Local Governments Units (LGUs), with enhanced capacities, and working together with local and national partners, can plan and management economic activities and growth in ways that meet landscape-level biodiversity conservation and sustainable use objectives in critical biogeographic regions.	LGUs, NGOs and Communities	Biodiversity	Region II - Cagayan, Quirino; Region 4B - Occ. Mindoro, Palawan; Region VI - Antique, Iloilo, Capiz, Aklan, Negros Occ.; Region XI - Davao Oriental; Region XIII - Agusan del Norte, Surigao del Norte	GEF UNDP	June 2010-June 2016

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
6	Integrated Coastal Resources Management Project (ICRMP)	The project covers provinces and municipalities surrounding marine biodiversity corridors of national and global importance as identified by the Philippine Biodiversity Conservation Priorities, as follows. (i) the Babuyan corridor along the northern coast of Luzon, (ii) Ticao Pass – San Bernardino Strait – Samar corridor, (iii) Daanbantayan corridor straddling the Visayas Sea and the Tanon Strait, (iv) Pujada Bay corridor, (v) the Zambales marine ecosystem in the Luzon Sea, and (vi) Siquijor small-island marine ecosystem between the Bohol Sea and Sulu Sea. Six provinces and 68 municipalities within the marine biodiversity corridor and ecosystems identified were then selected based on strategic location, status of communities that can potentially benefit from the program, and willingness of provinces and municipalities to support the program.	Coastal Communities in project sites	Coastal/Marine, Forestry	Regions II - Cagayan; Region III - Zambales; Region V - Masbate; Region VII - Cebu, Siquijor; Region XI - Davao Oriental; Region IVB - Romblon (TA only)	ADB/GEF	July 2007-June 2013
7	National Programme Support-Environment and Natural Resources Management Project (NPS-ENRMP)	The NPS-ENRMP is a budget support program that will directly support the DENR to meet major thematic thrusts prioritized in the Medium Term Development Plan (MTDP 2004-2010) related to Environment and Natural Resources management. The Program will ensure that DENR will have timely availability of budgetary resources for operation and capital expenses to finance agreed priority activities under its regular program. Focusing expenditure on priority rather than broad based operations and activities will, in turn, enable the agency to manage budgetary resources more strategically, improve resource allocation, operating efficiency, and overall effectiveness in delivery of services. The GEF grant component will provide financing for the application of an integrated ecosystem management approach in priority watershed areas & selected sites of global significance. The Components are: 1) Policy, Planning, Monitoring and Evaluation; 2) Integrated Ecosystem Management; and 3) Strengthening Environmental Management.	DENR & LGUs	Forestry, Mines, Protected Area, Biodiversity & Environment	Nationwide (SIM); GEF sites: Region 4A - Rizal & Quezon; Region 5 - Camarines Sur & Camarines Norte; Region 6 - Negros Occidental; Region 12 - North Cotabato, Sultan Kudarat; ARMM - Maguindanao	WB/GEF	November 2007-December 2012
8	PA Sustainable Financing Project	This Project aims to: a) support selected PAs in the development of business plans, and implement priority activities to secure additional financing; b) review existing policies that constrain sustainable financing of PAs, and make specific recommendations how to overcome these; c) cover 18 PAs, the selection of which shall be decided in close consultation with PAWB; d) explore a range of financing sources, based on specific potential in each PA; e) work with various stakeholders on specific strategies, develop business plans, and implement priority activities under the Plans, with a view to securing additional financing for PA management.	18 PAs	Protected Areas/Biodiversity	Mts. Palay-Palay-Mataas na Gulod NP, NAPWNC Manleluag Spring PL, Bataan NP Bulusan Volcano NP, Mt. Isarog NP Mts. Banahaw-SC PL, Mt. Mantalingahan PL, Apo Reef NP, Naujan Lake NP, Sagay Marine Reserve, Mt. Kanlaon NP,	WB/DENR	2013

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
					Northern Negros NP, Central Cebu PL, Mt.Kitanglad NP, Mt. Apo NP, Mt. Kalatungan Range NP, Mt. Malindang NP		
9	Environment and Natural Resources Capacity and Operations Enhancement Programme (ENR-CORE)	Following a two-pronged approach of policy development & capacity building interventions, the program will facilitate the strengthening of compliance framework of enabling laws on ENR management through an overarching legislation defining the ground rules and principles governing ENR, the institutionalization of the policy development & planning process through guidelines and the standardization of a science-based, gender-balanced and inclusive policy development policy making process, sub-sectoral investment planning, particularly for priority areas such as forestry, and advocacy for the effective implementation of these legislative issuances and sectoral plans, programmes including multisectoral environmental agreements (MEAS). Interventions for capacity building will consider the role enhancement of key stakeholders (government, civil society, academe and the private sector, including the MSMEs) in ENR management operations, the promotion, development and utilization of energy in sustainable & productive manner, and preparing for and responding appropriately to environmental emergencies in critical ecosystems in localities vulnerable to natural hazards.		Multisectoral	Nationwide	UNDP	2005-2009 (ext. 2010-2011)
10	Strengthening Coordination for Effective Environmental Management (STREEM)	The STREEM Project aims to generate global environmental benefits through improved coordination in the implementation of the MEAs in the Philippines. Specifically, it intend to establish/strengthen cross-sectoral/convention institutional and coordination structures and mechanisms at local and national levels to comply with the Country's commitments under the three (3) Multilateral Environmental Agreements (MEA) i.e. the UNCBD, UNCCD and UNFCCC and ensure mainstreaming of the MEA activities in the work plan of the concerned national government agencies and at the same time enhance synergies, collaboration, coordination and complementation of activities and task among the different actors of the three conventions on MEAs.	3 MEA Focal Point Agencies (PAWB, EMB & BSWM), DFA, LGU Puerto Princesa, CSOs, PCSD		Region IVB - Palawan	UNDP/ GEF	June 2009-June 2012

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
11	MDGF 1656: Joint Programme on Strengthening the Philippine Institutional Capacity to Adapt to Climate Change	This Joint Programme (JP) is classified under the MDG-F thematic window on Environment and Climate Change, which is aligned to the outcome "Enhancing Capacity to Adapt to Climate Change". It will be implemented over three (3) years from 2008-2010. The Programme has three major components, namely, (a) policy development, planning and programming, (b) capacity development of duty bearers, i.e., national governmental institutions, local government units and higher educational institutions, and claim holders, i.e., vulnerable communities and sectors, and (c) development of climate change adaptation measures that can be demonstrated.	NGAs, LGUs & Academe	Climate Change & Environment	Nationwide; Demo sites: CAR; NCR - Metro Manila; Region 5 - Albay, Sorsogon; Region XIII - Agusan del Norte	UNDP/ Spain MDG Achieve-ment Fund	Dec. 2008-Dec 2011
12	Philippine Climate Change Adaptation Project Phase 1	The Philippine Climate Change Adaptation Project Phase 1 has four major components: (1) Strengthening the enabling environment for CCA ; (2) Demonstrating Climate Change Adaptation Strategies in the Agriculture and Natural Resources Sectors; (3) Enhanced Provision of Scientific Information for Climate Risk Management; and (4) Project Management.	DENR-PAWB, DA-BSWM, NIA, DOST-PAG-ASA and Phil. Crop Insurance	Climate Change		WB/GEF	June 2010-2015
13	Philippines Climate Change Adaptation Project	This Project aims to: a) develop and demonstrate approaches that would enable targeted communities to adapt to the potential impacts of climate variability and change; b) strengthen existing institutional frameworks for CCA; and, c) demonstrate cost-effective adaptation strategies in agriculture and natural resources management	Targeted communities in the Philippines	Climate Change	Region 2 - Cagayan (Penablanca, Tuguegarao) Region 6 - Iloilo (Janiuay, Pototan, Dumangas & Mina) Region 13 - Surigao del Norte (Gen. Luna, Del Carmen & Dapa in Siargao Islands)	WB/GEF/DENR	2010-2015
14	Integrated Natural Resources and Environmental Management Project (INREMP)	This Project aims to: a) reduce and reverse degradation of watersheds and associated environmental services caused by forest denudation and unsustainable farming practices; and, b) rovide incentives to local communities, LGUs and the DENR for improving natural resource management by generating sufficient and tangible economic benefits.	Selected LGUs and communities, DENR	Coastal	Chico River Basin Wahig-Inabanga River Basin, Lake Lanao River Basin, Upper Bukidnon River Basin	ADB/IFAD/ GEF/CCF/ DENR	
15	Agusan River	The PPTA will generate feasibility studies and project design for communal		Forestry, Mines,	Region XI -	ADB	Feb. 2010-

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
	Basin Integrated Water Resources Management (FS) - PPTA	irrigation, water supply and sanitation, water quality management, watershed management, biodiversity and wetlands management, flood control, and chemical spills management including the organizational and institutional arrangement for a comprehensive river basin management.		Environment	Compostela Valley; CARAGA - Agusan del Sur Province, & Agusan del Norte	GEF	March 2011
16	Removing Barriers to Invasive Species Managment in Production and Protection Forest in Southeast Asia	To protect forest biodiversity by managing IAS through strengthening of policy, creating awareness, building capacity, implementing management strategies at pilot sites and strengthening regional cooperation in the management of IAS. Activities: 1. Gather baseline information on IAS occurring in the country and analysis of forest IAS 2. Design the information and awareness campaign 3. Stakeholder Consultation: identify key national and international stakeholders and assess capacity 4. Complete project design, proposal preparation, and mobilize co-finance 5. Develop Project Monitoring and Evaluation Plan.		Forestry	TBD	UNEP/GEF	Sept. 2010-2011
17	5th Operational Phase of the GEF Small Grants Programme in the Philippines	The Program aims to secure global environmental benefits through community-based biodiversity conservation initiatives and actions in selected priority sites. Project outcomes include: 1) Effective models for community-based governance of protected areas are demonstrated; 2) Community-managed landscapes and seascapes explicitly integrate biodiversity conservation objectives; 3) Alternative biodiversity friendly agriculture, fisheries and forestry products produced and marketed by 30 communities; 4) Increased capacity of GEF-GEF-SGP stakeholders to diagnose and understand the complex and dynamic nature of global environmental problems and to develop local solutions; and, 5) Enhanced capacities of GEF-GEF-SGP grantees to monitor and evaluate their projects and environmental trends.	NGOs and Community-based organizations	Biodiversity	nationawide	GEF/UNDP	2013-2017
18	Wealth Accounting and Valuation of Ecosystem Services - Philippines (Phil-WAVES)	This global partnership program aims to implement wealth accounting that focuses on the value of natural capital and integration of green accounting in development planning and analysis. It also intends to analyse policies and inform development planning and sustainable use of key natural resources.	Philippines	Environment	Nationwide	WB/DENR	2013-2017
19	Building Transformative Policy & Financing Frameworks to Increase Investment in Biodiversity	This global project aims to contribute to closing the global financing gap for the conservation and sustainable use of biodiversity by assisting developing countries in identifying, accessing, combining and sequencing sources of biodiversity funding to meet their specific needs	Argentina, Ecuador, Soeychelles, Malaysia, Uganda, South Africa, Kazakhstan, Philippines	Biodiversity	Manila Bay	GEF/UNDP/ DENR	2013-2015

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
	Management (BioFin)						
20	National Biodiversity Planning to Support the Implementation of the CBD 2011-2020 Strategic Plan in the Republic of the Philippines	This Project aims to address the country's need to continue to fulfill its obligations under the CBD, with particular focus on the Convention's Article 6 (General Measures for Conservation & Sustainable Use) and the CBD COP Decision X/2 (Strategic Plan for Biodiversity and the Aichi Targets), and contribute to efforts towards implementing the CBD Strategic Plan 2011-2020 at the national level	Philippines	Biodiversity	Nationwide	GEF-UNDP/ DENR	2013-2014
BILATERAL P/P/A							
21	Camiguin Coastal Resource Management Project (CCRMP)	The CCRMP is a coastal resource management initiative that will address the complex issues of the sustainable management of coastal and marine and sustainable economic activities particularly in the province of Camiguin. It has a total project cost of P116 Million and will be implemented for five (5) years. This project has five (5) components, namely: a) Institutional Strengthening; b) Pilot Area development; c) Community-Based Projects; d) Resource Mobilization; and e) Learning and Communication.	Fisherfolks, coastal women and children, municipalities	Coastal	Region X - Camiguin	NZAID	June 2007-2012
22	Ecosystems Improved for Sustainable Fisheries (ECOFISH) Project	This Project aims to improve the management of important coastal and marine resources and associated ecosystems that support livelihoods and economies. It is designed to: a) conserve biological diversity; b) enhance ecosystem productivity; and, c) restore profitability of fisheries in select marine key biodiversity areas using ecosystem-based approaches to fisheries management.	Selected MKBAs in the Philippines	Coastal/Marine, Biodiversity	Lingayen Gulf, Verde Island Passage, Calamianes Island Group, Lagonoy Gulf, Danajon Reef, South Negros Island, Surigao del Sur & del Norte, Sulu Archipelago	BFAR/USAID	2012-2017

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
23	Philippine Environmental Governance Project II (Eco-Gov II)	The EcoGov supports USAID Philippine's overall goal of enhanced security, governance and capacities for sustainable, equitable economic growth through the Mission's environment strategic objective of strengthened management of productive and life- sustaining natural resources. The EcoGov Phase 2 is a five-year initiative that aims to build and expand on the experiences achieved under the EcoGov Phase 1. EcoGov 1 has achieved significant results in environmental policy and advocacy, in assessment, surveying and planning at the local level that reflects increased transparency, accountability, participation and responsiveness on the part of local governments. Progress has been made towards improved governance on the ground which EcoGov 2 will build upon to further strengthen and sustain environmental governance. It will continue to support governance initiatives in forests and forest lands, coastal resources, wastewater and solid waste including opportunities for local financing. It will implement activities in conflict-affected areas of the country, with a focus on biologically important eco-regions of Mindanao, Central Visayas and Northern Luzon.	LGUs, NGAs and POs	Forestry, Coastal & Environment	Region II - Nueva Viscaya, Isabela, Quirino; Region III - Aurora; Region VII - Bohol, Cebu, Negros Oriental; Region IX - Zamboanga del Sur, Zamboanga Sibugay; Region XI- Davao City; Region XII - North Cotabato, South Cotabato, Sarangani, Sultan Kudarat; ARMM - Maguindanao, Lanao del Sur, Basilan	USAID	Oct. 2004-October 2009 (Ext. - October 2011)
24	Environment & Rural Development (EnRD) Program - Phase 2	The program focuses on three areas: (i) promoting policies and strategies at National and Local levels, which are conducive towards the conservation of the environment and the sustainable use of natural resources; (ii) ensuring that Government Agencies and Local Government Units (LGUs) offer sustainable and sound service packages and strengthening cooperation among and between these actors; (iii) promoting sustainable technical and managerial procedures in natural resource management. Key components of the EnRD Program include: 1) Policy Advocacy and Strategic Steering; 2) Governance of Natural Resources at the Local Government Level; 3) Management of Coastal Fisheries; 4) Community-Based Forest Management; and 5) Food Security.	LGUs, NGAs and POs	Forestry, Coastal & Environment	Region VI - Iloilo; Region VIII - Provinces of Leyte & Southern Leyte	GTZ	July 2009-2012
25	Support to the Implementation of the Tri-national Sulu-Sulawesi Marine Ecoregion Comprehensive Action Plan	The overall project goals are to support: a) capacity building on climate-smart spatial development planning in the SSME countries; and, b) the implementation of selected elements of the SSME Comprehensive Action Plan which explicitly demonstrates bilateral or tri-national collaboration with focus on the following goals: 1) Sustainable Fisheries and Enhancement of Livelihoods; 2) Protection of Threatened, Migratory and Charismatic Species; and, 3) MPA and MPA Networks.	Indonesia, Malaysia, Philippines	Coastal/Marine	Upper Magat and Cagayan River Basin, Jalaur River Basin, Pampanga River Basin	GIZ/DENR	2012-2017

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
26	Partnership for Biodiverstiy Conservation (PBC)	"USAID Partnership for Biodiversity Conservation Program supports biodiversity conservation in the Philippines by increasing capacity of local and national environmental law enforcement bodies. The Program objective contributes to USAID's mission of strengthening the ability of Philippine national and local government units and communities to address critical threats to the country's globally significant coastal and upland resources and promoting good governance – transparency and accountability – in enforcing environmental laws."	National Government, LGUs, communities	Biodiversity	Nationwide	USAID	2006-present
27	Coral Triangle Support Partnership Project	The goal of CTSP is to improve the management of biologically and economically important coastal and marine resources and associated terrestrial ecosystems that support the livelihoods of peoples and economies in the Coral Triangle.	people and communities in the Coral Triangle	Biodiversity, Marine		USAID / WWF	2009-2013
28	Biodiversity Conservation through Management of Natural Resources (BCMNR)	The goal of this 2-year Project is to conserve 3 KBAs, namely: 1) Bukidnon; 2) Mt. Diwata and Mt. Hilong-Hilong area, and 3) southern Palawan by initiating an "emerging champions" program to link local-level best practices and lessons in biodiversity conservation. Emerging champions are defined as municipal and provincial level multi-stakeholder groups whose mission is to conserve KBAs while addressing socio-economic development and environmental security. Strategies that address the specific needs of emerging champions include: 1) building capacity to improve management of natural resources and delivery of environmental services; b) instituting better enforcement mechanisms at the KBA level to uphold environmental laws; and, c) broadening opportunities for environmental financing and sustainable enterprise development. These strategies build on past work of USAID and EnterpriseWorks/VITA (EWV) in Region 2 and Palawan with emerging champions working in KBAs.	LGUs. Communities	Forest, Coastal and Marine	KBAs of Bukidnon, Mt. Diwata and Hilong-hilong, and Southern Palawan	USAID/ RI/ En-terprise Works/ VITA	
29	From ridge to reef: an ecosystem-based approach to biodiversity conservation and development in the Philippines (EB-ABCD Philippines)	This Project aims to address key threats to biodiversity conservation in the Mt. Malindang Natural Park in Misamis Occidental, northern Mindanao, considered as one of high priority conservation areas in the country because of its rich flora and fauna. These resources are threatened by economic activities of people living inside and outside the park, who often source additional income from the park through illegal activities. USAID is supporting activities that: a) reverse degradation of coastal resources by addressing downstream effects of forestry and agriculture; b) enhance livelihoods of people; and, c) build capacity and manage information and database for decision-making.	LGUs, communities	Forestry, Freshwater, Marine	Mt. Malindang Natural Park, Misamis Occidental	USAID/ WorldFish Center/ SEARCA/ ICRAF	2011-2013

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
30	Danajon Bank Marine Park Project: collaborative effort to manage a large MPA	This is a 3-year project to be implemented from 2011-2013 as a collaborative effort of 17 municipalities and cities of 4 provinces and 2 administrative regions of the Danajon coral reef ecosystem, the only double barrier reef in the country and one of among six worldwide. The goal of the Project is to improve the quality of life of stakeholders through effective management of a large-scale MPA, and improved fisheries, habitats, and economic opportunities. Project activities inlude: a) collecting baseline biophysical, socio-economic, institutional, policy and governance information; b) formulating and adopting a Governance Framework Plan, MPA Management Plan; c) developing constituencies and support for the MPAestablishment and management; and, d) planning and catalyzing tourism enterprises and livelihoods.	LGUs and communities	Coastal and Marine	17 municipalities and cities of 4 provinces and 2 regions in the Danajon Coral Reef Ecosystem areas	USAID/ Coastal Conservation and Education Foundation, Inc.	2011-2013
31	Rehabilitation and conservation of Romblon Passage Marine Corridor through integrated community-based coastal resource management (CBCRM) approaches	This Program aims to rehabilitate and conserve the coastal and marine resources of Romblon Passage Marine Corridor through integrated CBCRM strategies involving the coastal communities of the Municipalities of Romblon, San Agustin, Sta. Maria and Calatrava. Strategies include: a) rehabilitating and enhancing marine habitats; b) protecting and managing threatened and endangered marine species sea turtles, marine mammals and giant clams; c) generating knowledge and managing information through the Coastal Resource Management Resource Center; d) strengthening community-based organizations to co-implement resource management plans with LGUs; and, e) formulating an integrated resource management plan for the 4 municipalities.	LGUs and communities	Coastal and Marine	Romblon Passage Marine Corridor (Municipalities of Romblon, San Agustin, Sta. Maria and Calatrava)	USAID/ SIKAT Inc.	2010-ongoing
32	Mainstreaming Climate Change in Biodiversity Planning and Conservation in the Philippines	This project aims to integrate climate change considerations in biodiversity planning and conservation in the Philippines. Strategies include 4 components: 1) Support National Action Planning and Mainstreaming of Climate Change Adaptation in Biodiversity will involve conduct of national action planning for climate change and biodiversity conservation; 2) Conduct Vulnerability Assessment and Adaptation Options of Terrestrial Ecosystems to Climate Change to determine how climate change will affect the terrestrial ecosystems through use of biogeography models; 3) Demonstrate Climate Change Adaptation (CCA) in Biodiversity Conservation Areas to pilot CCA measures in Mt Apo Natural Park in Davao, Mt Kitanglad Range National Park in Bukidnon, Northern Sierra Madre Natural Park in Isabela, and Ikalahan Ancestral Domain in Nueva Vizcaya; and, 4) Provide Capacity Building to focus on organizing trainings, workshops and seminars to enhance knowledge, skills, and soft learning of DENR (PAWB and FMB), members of the people's organizations (POs), LGUs and local NGOs who are actively working on biodiversity conservation in the Philippines.	National and local governments, communities	Forest, Biodiversity	Mt Apo Natural Park in Davao, Mt Kitanglad Range National Park in Bukidnon, Northern Sierra Madre Natural Park in Isabela, and Ikalahan Ancestral Domain in Nueva Vizcaya	USAID/ ICRAF	2011-2012

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
33	BALANCED (Building Actors and Leaders for Advancing Community Excellence in Development) Project	The BALANCED Project is an innovative 5-year initiative to improve access to health services, especially family planning, secure livelihoods and help conserve biodiversity and natural resources. It recognizes and addresses the interrelationships and interlinkages between people, health and environment. The BALANCED Project is being implemented by the Coastal Resources Center at the University of Rhode Island in collaboration with CI and PATH Foundation Philippines Inc (PFPI). The latter implements the Philippine component which focuses on integrating population, health and environment (PHE) approaches, including increasing access to health services (e.g. family planning and reproductive health) in marine biodiversity areas in collaboration with LGUs of 5 provinces, namely Leyte, Bohol, Oriental and Occidental Mindoro and Batangas.	marine biodiversity areas in collaboration with LGUs	Coastal and Marine Management	Leyte, Bohol, Oriental and Occidental Mindoro and Batangas.	USAID / CI / PFPI	2010-2013
34	Adaptation to Climate Change and Conservation of the Biodiversity in the Philippines	In response to the challenges of mitigating the effects of climate change, the Philippine Government established the Inter-Agency Committee for Climate Change (IACCC), which is supported by a Secretariat in the Environmental Management Bureau of the Department of Environment and natural Resources. The IACCC and the Secretariat are responsible to adopt the obligations of the UN Framework Convention on Climate Change (UNFCC) in the Philippines. As such, the body can take the lead role in formulating and mainstreaming climate change adaptation policies and strategies. The project will strengthen existing structures such as the IACCC through intensive consultation, capacity building and training. A Biodiversity Fund shall be established to finance approved project proposals which are rated based on the following funding criteria: expected contribution to the conservation of terrestrial and marine biodiversity; contribution to carbon sinks and increasing the resistance potential of ecosystems to climate change. Monitoring of the implementation of selected projects shall be also undertaken and lessons learned shall be effectively shared and disseminated.	Small scale farmers or fisherfolks in the buffer zone of the protected areas	Climate Change & Environment, Biodiversity	Nationwide	GTZ	Dec. 2008-Nov. 2011
35	Climate-relevant Modernization of Forest policy and piloting of REDD+ in the Philippines, Preparation of a National REDD+ Mechanism for Greenhouse Gas Reduction and Conservation of Biodiversity in the Philippines (National	The objective of the Project is Improved forestry policy applied by DENR, LGUs and local population for the reduction of greenhouse gas emissions. Project components: include: 1) Support to the National REDD-plus Strategy and Action Plan; 2) REDD-plus Piloting in / around protected areas; 3) Forest policy development; 4) Learning and innovation / knowledge management; and, 5) Capacity building	Philippine LGUs	Forestry	Nationwide	GiZ	November 2012 - April 2017

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
	REDD+ System Philippines)						
36	Disaster and Climate Risk Management	Supports the Philippine Government—with other donor agencies and local and international NGOs—in enhancing the capacity of national government agencies, local government units and communities, in disaster risk reduction and climate change adaptation. Assistance has included identifying and addressing disaster and climate hazards and risks and increasing the resiliency of vulnerable communities. Australia has provided $10.6 million since 2006 and committed an additional $9.16 million until 2013 to support the implementation of new policies and disaster and climate risk management activities, including responding to rehabilitation requirements of the Greater Metro Manila Area.	National Government, LGUs, communities	Climate Risk Management	Nationwide	AusAid	2006-2013
37	Philippine Sanitation Alliance Project (PSA)	"The USAID Philippine Sanitation Alliance (PSA) works with LGUs, water districts and private sector partners to develop affordable ways to protect biodiversity and reduce public health risks through improved sanitation. Cities, water districts and private companies are building treatment facilities using appropriate technology. Projects include low-cost, low-maintenance treatment facilities for public markets, slaughterhouses hospitals and low-cost housing; and city-wide programs to properly maintain septic tanks (septage management). Cities are developing effective promotion campaigns to increase willingness to pay for sanitation services and reduce the incidence of diarrhea through proper hygienic practices, particularly handwashing. Governance is also being strengthened to reduce threats to biodiversity as LGUs work to control wastewater discharges to coastal and freshwater ecosystems."	LGUs, general public	Biodiversity, Environmental Governance	10 Cities: Cagayan de Oro, Clabayog, Dumaguete, Iloilo, Malaybalay, Meycauayan, Muntinlupa, Naga, Sta. Rosa, Zamboanga; 4 water districts: Calamba, Cebu, Davao, and Laguna	USAID (and private sector companies)	2007-2011
38	Volunteers in Environmental Governance(VEG)-II	The VEG-II Project aims to build the capacity of local governments and their communitiesi in enhancing coastal environment protecteion and food security through the development and implemnetation of integrated coastal managemnet (ICM) plans and environmental education. It builds on successful activities from VEG-I, particularly on: a) project design and management (PDM) workshops; b) PCV special projects fund; c) environental trainings; and, d) environmental resources (e.g. equipment and information resources).	PCVs, LGUs, general public	Coastal, Marine	Regions 1,2,3,4A,4B, 5 (Sorsogon), 8 (Leyte, Biliran, Northern Samar and Eastern Samar)	USAID / PCV	October 2009 to September 2012
39	Philippine Water Revolving Fund Support (PWRF)	This Program aims to increase access to financing for creditworthy water service providers through a co-financing mechanism developed by USAID, JICA, Department of Finance and private financing institutions, where the Local Government Unit Guarantee Corporation and USAID's Development Credit Authority guarantee the loans. Additional programs components include technical assistance on water and sanitation project preparation, and strengthening of water and finance sector through strategic reforms.	National Government, LGUs, communities	Fshwater, Coastal and Marine, Water and sanitation	Nationwide	USAID/ JICA/ DOF	2006-2013
40	Biodiversity & Watersheds Improved for Stronger Economy	This Project aims to address the driving forces behind the rapid loss of biodiversity and the depletion of watersheds. Some of these drivers include: pressure for quick economic growth, stress caused by climate change, insecure property rights, and inadequate information for decision- making and management.	Mt. Kitanglad Range Natural Park, Mt. Apo Natural Park, Northern Sierra	Forestry, Biodiversity, Climate Change	Mt. Kitanglad Range Natural Park Mt. Apo Natural Park	USAID/DENR	2012-2017

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
	& Ecosystem Resilience (B+WISER)		Madre National Park, Kaliwa-Marikina Watershed, Quinali Watershed, Naujan Lake National Park Sub-Watershed, Bago River Forest Watershed Reserve		Northern Sierra Madre National Park Kaliwa-Marikina Watershed Quinali Watershed Naujan Lake National Park Sub-Watershed Bago River Forest Watershed Reserve		
41	Community-Based Forest and Mangrove Management Project in Panay and Negros	The CBFMMP is in line with Executive Order 263 declaring Community Based Forest Management (CBFM) as the national strategy to ensure sustainable development of the country's forest resources. CBFMMP is being implemented by the DENR in partnership with the Land Bank of the Philippines, and with the support from the German Government through the KfW and GTZ. Adopting the CBFM approach, the project shall pioneer an innovative financing mechanism that is designed to encourage sustainable resource management through investment packages that dovetail livelihood/infrastructure development measures with natural resource management initiatives. The Loan and Financing Contribution to be extended by KfW shall be used to fund loans ("sub-loans") to be granted by the LBP for financing livelihood and rural infrastructure activities in close cooperation with the DENR.	LGUs, poor farmers inlcuding inidigenous people (IP), POs	Forestry and Coastal	Region 6 – Aklan (Kalibo, Tangalan, Batan, Malinao, New Washigton), Antique (San Remegio, Sibalom, Tibiao, Patnongon, Sebaste), Capiz (Pilar, Dumarao, Sapian), Iloilo (Dingle, San Dionisio, Maasin, San Joaquin, Carles), Negros Occidental (Kabankalan, Ilog, Cauayan, Candoni) Region 7 - Negros Oriental (Bindoy, Bayawan, Sibulan)	KFW	2009-2015

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
42	Enhancing Natural Resources Management through Enterprise Development	The project involves the enhancement of environmental management and development of livelihood opportunities for forest dwelling communities through improved forest use. It has four main components, namely; (a) Capacity Building, (b) Enterprise Development, (c) Guidebook Development, and (d) Policy Review and Formulation.	POs and upland Communities in forested areas; LGUs, DENR & other agencies; NGO; & private sector	Forestry	Region 1 - Pangasinan; Region 2 - Cagayan; Region 3 - Bataan; Region 4B - Palawan; Region 6 - Iloilo; Region 8 - Leyte; Region 10 - Camiguin; & Region 11 - Davao Oriental.	NZAID	2008-2011
43	Climate-Relevant Modernization of Forest Policy and REDD Piloting in the Phils.	The project aims at the development of an improved forest policy and of specific incentives for avoided deforestation, for forest protection and rehabilitation and for conservation of biodiversity. It focuses on the elaboration of a REDD strategy with innovative elements of conservation and piloting of measures in and around selected protected areas of the Philippines. The project will enhance the capacities of Philippine partners for planning and implementation of climate relevant forest measures, conflict mitigation, securing land use rights, and improving local livelihoods. Beside avoided deforestation, rehabilitation and sustainable management of tropical forests, the project will contribute to improved adaptive capacities and protective functions of forests.	Upland watershed-based communities and policy makers	Climate Change/ Forestry	Nationwide	GTZ	Oct. 2009-Setp. 2012
44	Protected Area Management Enhancement in the Philippines (PAME)	Improved protection and management of KBAs in the Philippines	DENR-PAWB, 60 KBAs	Protected Areas, Biodiversity	nationwide	GIZ/DENR	2012-2017
45	Land Administration and Management Program II (LAMP II)	The LAMP2 is the initial phase of the long-term commitment by the government of the Philippines (15-20 years) to alleviate poverty by improving the security of land tenure and to sustain economic growth by fostering efficient land market in rural and urban areas. It is envisioned to lay the foundation for the improvement of interagency collaboration in the delivery of integrated land administration services which support tenure security and property valuation. LAMP2 shall be implemented by the DENR with the Department of Finance and Land Registration Authority as partner agencies.	General Public	Lands	Region VII - Bohol; Region VIII – Leyte; Region X - Bukidnon	WB/AusAID	Oct. 2005-March 2011

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
46	Project for Improvement of Flood Forecasting and Warning System in the Pampanga and Agno River Basins (Phase III)	"The project aims to improve the existing gauging stations and telecommunication facilities for fast data transmission of observed data to ensure the issuance of timely and reliable warnings to flood-threatened communities."	Pampanga and Agno River Basins	Wetlands	Region III - Pampanga	Japan-ODA	2011-ongoing
47	Forestland Management Project	This Project aims to improve forestland management through collaborative and holistic implementation of comprehensive and sustainable forestland management strategies in three critical river basins.	Selected river basins	Forestry, Biodiversity	Upper Magat and Cagayan River Basin Jalaur River Basin Pampanga River Basin	DENR/JICA	2012-2022
Business Sector							
48	Hamilo Coast Project	"The Hamilo Coast project is an innovative approach towards sustainable coastal development. Through a partnership with Costa Del Hamilo Inc., three major initiatives towards sustainability are currently being implemented, designed to minimize and manage coastal and terrestrial development impacts and to maintain the region" s overall ecological integrity"	Coves along Hamilo Coast, MPAs: Santelmo, Etayo, and Pico de Loro; barangay Papaya enforcement team	Coastal		WWF / Costa Del Hamilo Inc. / SM	Present
49	Project Connect	"With the development of education modules advocating energy efficiency and conservation plus renewable energy in selected elementary schools, high schools and universities, Project Connect aims to synergize technology with education to nurture and inspire a fresh generation of environmental stewards. Lessons deal mostly with climate change and energy efficiency."	selected elementary schools, highschools, and universities	climate change, energy efficiency	Nationwide	WWF / SMART communications	2010-Present
50	Bright Skies for Every Juan Program	"Every time someone books a Cebu Pacific flight online, they get the chance to offset their carbon footprints by donating a small amount (commensurate to the carbon their flight will release into the atmosphere) to WWF's Climate Adaptation Project in Sablayan, Mindoro. This project benefits the people and the nearby Apo Reef."	people and communities in Sablayan, Mindoro and the nearby Apo Reef; Cebu Pacific passengers	Climate Change Biodiversity	Nationwide	WWF/ Cebu Pacific Airlines	On going

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
51	Sta. Rosa Watershed Conservation Project	"Coca Cola Companyhas poured themselves into studying the Sta. Rosa watershed and revitalizing the Ilagan watershed."	Sta. Rosa watersheds and nearby communities; water consumers of the district	Climate Change, in-land water		WWF/ Coca-Cola Company	2008-2012
52	Ilagan Watershed Conservation Project	The Ilagan Watershed Conservation Project will build a platform to secure the watershed services provided by the Abuan watershed to benefit its water users including, but not limited to, industry, irrigation farmers, water districts, recreational users and ecotourists and future mini-hydro projects.	Abuan Watershed and nearby communities; water consumers of the district	Climate Change, in-land water	Ilagan, Isabela	WWF/Coca Cola Company	2008-2011, 2010-2015
53	Marikina-Sapinit watershed Conservation Project	The Marikina Watershed Conservation project includes: conservation, reforestation, and sustainability; livelihood; and engaging the participation of the community in the wider Marikina Watershed initiative. It has an estimated 1,500 direct and indirect beneficiaries.	Marikina-Sapinit Watershed and nearby communities; water consumers of the district	Climate Change, in-land water	Marikina Watershed	Coca Cola Company/ Philippine Disaster Recovery Foundation	2011-ongoing
54	Caliraya Watershed Conservation Project		Caliraya Watershed and nearby communities; water consumers of the district	Climate Change, in-land water	Lumban, Laguna	Coca Cola Company, Haribon	Ongoing
55	Butuanon Watershed Conservation Project		Butuanon Watershed and nearby communities; water consumers of the district	Climate Change, in-land water		Coca Cola Company / Soil & Water Conservation Foundation	ongoing
56	Talomo-Lipadas Watershed Conservation Project		Talomo-Lipadas Watershed and nearby communities; water consumers of the district	Climate Change, in-land water		Coca Cola Company	Ongoing
57	Ring of Fire Project	The Ring of Fire initiative aims to replicate the Philippines' global success in sustainable geothermal production for Indonesia's largely untapped geothermal energy resources.	General Public	climate change, energy efficiency	North Cotabato	EDC / WWF	ongoing
58	Project EcoKids	"project EcoKids – educating children about the environment, throughout various public schools in the metro."	public school children in the metro	Climate Change	NCR	WWF / HSBC	ongoing

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
60	Climate Change Adaptation Project in Apo Reef and Sablayan, Occidental Mindoro	To build the resilience of Apo Reef Natural Park (ARNP) and Sablayan's marine ecosystem and coastal communities so that in the long-term they may adapt to climate change To ensure food, fisheries production, and dive tourism are not threatened and economic development proceeds in a sustainable manner.	Local communities from 10 coastal and 12 upland barangays (villages).	Climate Change	Apo Reef Natural Park (ARNP) and Sablayan	WWF / Cebu Pacific	2008-2012
61	Environmental Education Program	HSBC and Philips has teamed up with the WWF Environmental Education unit on Project ECoKids, educating elementary school students throughout Metro Manila about the environment, climate change, and practical environmental solutions.	Metro Manila public schools kids	Climate Change, Environment	Metro Manila	WWF / Philips and HSBC	Until 2010
62	Risk Assessment and Management, Climate Change	The Bank of the Philippines Islands Foundation, Inc. is working with WWF to assess and manage business risks, and adapt to climate change via analyzing the socio-economic situation of key Philippine cities.	Business sector	Climate Change, Disaster Risk Reduction	Nationwide	WWF / Bank of the Philippine Islands	Until 2011
Civil Society Organizations							
63	Go Green Philippines	"The areas to be covered by Go Green as proposed by the DENR Region VII are as follows: > Forest Management - planting of pangantuon (white wood) trees, as well as other trees such as ipil (brownish wood) and sibucao (red wood) trees, buri propagation and bamboo planting. > Coastal Environmental Program - protecting of coral reefs and establishing sea shell sanctuaries. > Livelihood Projects - helping rural communities through livelihood programs and skills training and education that can also support the fashion jewelry industry.	communities in the island of Cebu; fashion industry	Forestry, Coastal	Region VII: Cebu	Cebu Fame Foundation	2007-2015
64	Corporate Greenhouse Gas Accounting Program	"Companies can avail of either an in-house seminar and/or a mentoring assistance program to develop their GHG emissions summary, which can subsequently serve as basis for their GHG management / reduction programs."	private companies	Climate Change	nationwide	PBE	Ongoing
65	Environmental Management Programme for Industry Competitiveness (EPIC)	EPIC seeks to enhance business competitiveness in the global market through environmental management. It aims to strengthen private sector initiatives to reduce the environmental footprint of industry.	businesses and industries	Climate Change	Nationwide	PBE	On going
66	La Mesa Watershed	As of October 2007, 1,381 of the 1,600 hectares needing rehabilitation have already been planted out." "With this rehabilitation project, La Mesa is now considered a "carbon sink" as it absorbs 3% of the total carbon emissions of Metro Manila.	La Mesa watershed; Metro Manila residents	forestry, in-land water	NCR: La Mesa, Quezon City	ABS-CBN Bantay Kalikasan	Ongoing

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
67	La Mesa EcoPark	"La Mesa Eco-Park envisions a better environment for our children. In pursuit of this vision, La Mesa Eco-Park's mission is to spread environmental awareness by serving as a living, outdoor classroom and laboratory for environmental education and by being a venue for healthy outdoor recreation. "	La Mesa watershed; communities nearby; general public	forestry, in-land water, biodiversity	NCR: La Mesa, Quezon City	ABS-CBN Bantay Kalikasan	Ongoing
68	Bantay Baterya	The Bantay Baterya Project aims to create a sustained public awareness on the health and environmental hazards posed by the indiscriminate handling of junk batteries, to recover and reprocess junk batteries in an environmentally safe manner.	general public	climate change	Nationwide	ABS-CBN Bantay Kalikasan	2000-ongoing
69	Bantay Langis	"The project aims to educate and inform the public on the dangers of improper handling and disposal of used industrial and engine oil; and to disseminate information on the environmentally-sound technology for the treatment and recycling of used oil. The project follows the Bantay Baterya Project procedure. The Bantay Langis Project requests companies for donations of used industrial and engine oil earmarked for disposal."	general public	Climate Change	Nationwide	ABS-CBN Bantay Kalikasan	2007-ongoing
70	Kapit Bisig sa Ilog Pasig	"On March 2008, Bantay Kalikasan, the environment arm of the foundation, signed a Memorandum of Agreement (MOA) with the Department of Environment and Natural Resources (DENR), making the former co-manager of the Pasig River Rehabilitation Project. The main goal is to revive the waters to Class C. Bantay Kalikasan, in partnership with concerned local government units, government agencies, the private sector, non-government organizations, and the general public, will be addressing the problem by mitigating pollution at source. This gave birth to Bantay Kalikasan's very own Kapit Bisig sa Ilog Pasig, a project for the rehabilitation of Pasig River."	Pasig River and nearby communities	Climate Change, in-land water	NCR: Pasig, Manila	ABS-CBN Bantay Kalikasan	2008-on going
71	The Climate Change Adaptation – Disaster Risk Management	This project is the Manila Observatory's pilot project for community-based, inter-program work which aims to integrate present disaster risk management concerns with long-term climate change response and overall sustainable development through capacity-building and technical assistance.	Mag-asawang Tubig watershed	in-land waters	Calapan City, Municipalities of Naujan, Victoria, Baco, San Teodoro, and Puerto Galera	Ateneo de Manila University, School of Science and Engineering, Manila Observatory	Ongoing
72	GREEN (Green Resources for Environmental Education and Networking) Program	The Ayala GREEN (Green Resources for Environmental Education and Networking) Program is an advocacy campaign promoting environmentally-sound practices along the areas of energy, water, air and solid waste through IEC (information, education and communication) campaign materials development, capacity building, monitoring and partnership building with various organizations	Ayala development projects; office, residential and commercial establishments; buildings and malls administrators and managers; general public	Energy, Water, Climate Change,	Makati City, Taguig City, Quezon City, Muntinlupa City	Ayala Foundation	2009-ongoing

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
73	Governance & Local Development for Endangered Forests	To reduce deforestation rate in 4 target rainforest sites in the Philippines		Forestry	4 sites	Haribon / European Commission	December 2005 – April 2011
74	Preventing Extinctions Programme: Cebu Flowerpecker	To identify and implement conservation actions for the Cebu Flowerpecker	Cebu flowerpecker	Biodiversity	Cebu	Haribon / BirdLife International	October 2009 – December 2012
75	Building on Success: Turning Policy Advantages into Conservation Gains for Internationally Important Conservation Areas across the Birdlife Partnership	To improve collaboration and implementation of Convention on Biological Diversity and Ramsar agreement	environmental policy-makers	Biodiversity	Nationwide	Haribon / BirdLife International	July 2009 – June 2011
76	Establishment of Nursery on Native Tree Species at the Caliraya Watershed	To establish a nursery of native tree species as a means of educating and getting the active participation of various sectors in the campaign for forest restoration	Caliraya Watershed and nearby communities	Forestry, Biodiversity	Caliraya	Haribon / Coca Cola Foundation	December 2009 – December 2011
77	Forest and Climate Protection Project in Panay	To provide local level support to community-based project implementation around the Panay Mountain Range	Panay Mountain range and communities nearby	Forestry, Biodiversity	Panay Island, Negros	Haribon / GIZ	November 2010 – December 2013
78	Forestory Project	To restore 3 hectares in the Manleluag Spring Protected Landscape	Manleluag Spring	Forestry	Malabobo, Pangasinan	Haribon / BirdLife International	September 2010 – August 2013

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
79	Chinese Crested (Sterna bernsteini) Tern Wintering Survey	To conduct a purposive search for the Chinese Crested Tern at key areas in Manila Bay. To assess current status of wetlands in Manila Bay. To review Philippine Important Bird Areas for other possible wintering sites	Chinese Crested Tern	Biodiversity	Manila Bay	Haribon / BirdLife International – Asia Division	January – March 2011
80	Toyota Foundation	To implement forest management including policy formulation. To conduct training on forest management. To raise awareness on forest management. To implement livelihood activities	environmental policy-makers, general public	Forestry, Biodiversity	Nationwide	Haribon / BirdLife International – Toyota Foundation	January 2011-December 2011
81	Climate Change Adaptation Strategies for Protected Areas and Island ecosystems, Climate Vulnerability Assessment		General Public	Climate Change	nationwide	WWF / European Commission	Ongoing / 2015
82	Live Reef Fish Trade			Biodiversity, marine		WWF / Danish International Development Agency	Until 2011
83	Climate Solutions for Asia: Visions for a low carbon future in key asia emerging economies	Regional work on policy advocacy and lobbying	Philippines	Climate Change	Nationwide	WWF-UK	Until 2011

	TITLE	DESCRIPTION/THEME	TARGET BENEFICIARIES	PROJECT ECOZONE FOCUS & MAJOR INTERVENTION	PROJECT LOCATION	FUNDING AGENCY	PROJECT DURATION
84	Implementing Climate Adaptation Strategies in the World's Most Outstanding Natural Places			Climate Change	Colombia (Pacific coastal region of the Choco Darién ecoregion); Madagascar (North-West region of Diana); Philippines (The Island Garden of Samal (IGACOS) in Davao del Norte region)	WWF / European Commission	Ongoing / 2015
85	Integrating Population, Reproductive Health and Coastal Resources Management Actions in Tawi-Tawi, Mindanao, Philippines			Climate Change, Coastal	Tawi Tawi	European Commission	On-going / 2014
86	Adaptation to Climate Change in Coastal Areas (ACCCoast): Protection and Rehabilitation of Coastal Ecosystems for Improved Adaptation to Climate Change as a Contribution to Coral Triangle Initiative	Improved governance of marine protected areas for increased climate change adaptation and conservation of biodiversity in the Philippines 1. Improved capacity of the DENR PAWB Coastal and Marine Management Office (CMMO) in support of comprehensive MPA governance in the Philippines and in the implementation of the Philippine National Plan of Action of the Coral Triangle Initiative 2. Improved MPA governance of selected MPAs 3. Improved community awareness and engagement in the management of MPAs through social marketing; 4. Strengthened MPA governance and development of adaptive management systems 5. Improved comprehensive monitoring of social, conservation & climate-related parameters 6. Improved information management and networking with research institutions within the region (CTI) and abroad (Europe, USA)	DENR PAWB CMMO, selected MPAs	Coastal and Marine	Nationwide	GiZ	2012-ongoing

ANNEX 4A

Matrix of Select Biodiversity Management Programs / Projects / Activities Mobilized by NGOs and Private Sector

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
Foundation for the Philippine Environment						
	An assessment of the 2004-2010 Medium Term Philippine Development Plan (MTPDP): Environment and Fisheries Sector	Caucus of Development NGO Networks	Research	National	PhP 290,000.00	2009-2010
	Capacity Building for NGO-PO Women Leaders and LGU Officials	Ang Kilusan ng Kababaihang Pilipina (PILIPINA), Inc.	Advocacy	National	PhP 70,000.00	2009-2010
	Kalikasan, Ngayon at Kinabukasan! Policy Forum on Environment	Galing Pook Foundation	Advocacy	National	PhP 100,000.00	2009-2010
	Movement Building for Climate Change and Redistributive Justice	Partnership for Agrarian Reform and Rural Development Services, Inc.	Advocacy	National	PhP 100,000.00	2009-2010
	Participation of Arakan Forest Carbon Project to the League of Corporate Foundations' Corporate Social Responsibility Expo 2009	FPE (Proactive Project)	Advocacy	National	PhP 81,000.00	2009-2010
	Participation of FPE Regional Advisory Committee Members and Project Partners to "Forum on Environmental Justice: Upholding the Right to a Balanced and Healthful Ecology"	FPE (Proactive Project)	Advocacy	National	PhP 57,200.00	2009-2010
	Red Listing of Marine Species as a Guide to Resource Management through the Global Marine Species Assessment for the Coral Triangle	First Philippine Conservation Inc.	Research	National	PhP 1,210,000.00	2009-2010
	Social Development Celebration 2009	Association of Foundations, Inc.	Advocacy	National	PhP 600,000.00	2009-2010
	Strengthening the Community's Coping Mechanisms to the Challenges of Climate Change-Induced and Human-Aggravated Natural Disasters	Philippine Federation for Environmental Concern	Advocacy	National	PhP 155,000.00	2009-2010
	The 6th Zero Waste International	Mother Earth Foundation, Inc.	Advocacy	National	PhP 376,200.00	2009-2010

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Conference					
	Undermining the Threat of Mining: A Policy Advocacy Campaign	Kaisahan tungo sa Kaunlaran ng Kanayunan at Repormang Pansakahan	Advocacy	National	PhP 1,677,400.00	2009-2010
	Upscaling of Reforestation Efforts by Civil Society Organizations	FPE (Proactive Project) through the Project Development Fund	Advocacy	National	PhP 150,000.00	2009-2010
	Delineation of Biological Fencing of the Puerto Princesa Subterranean National Park and Cleopatra's Needle	Haribon-Palawan	Site-Based	Luzon	PhP 851,000.00	2009-2010
	Direct Indigenous People Advocacy of the Batak Tribe in Roxas, Palawan	Samahang Kaunlaran ng Batak sa Palawan, Inc.	Site-Based	Luzon	PhP 200,000.00	2009-2010
	Ikalahan-Kalanguya Ancestral Domain Project	Kalahan Education Foundation	Site-Based	Luzon	PhP 1,980,000.00	2009-2010
	Integrating Permaculture for Sustainable Agriculture	Gelacio I. Yason Foundation – Family Farm School, Inc.	Advocacy	Luzon	PhP 200,000.00	2009-2010
	Legal Case Filing Against the Illegal Establishment of Globe Telecom Facility within their Ancestral Domain	Kalahan Education Foundation	Advocacy	Luzon	PhP 100,000.00	2009-2010
	Patrol Boats Repair	Samahan ng Maliliit na Mangingisda ng Nicanor Zabala, Inc.	Site-Based	Luzon	PhP 111,655.00	2009-2010
	Regional Advisory Committee Meeting 2009 - Luzon	FPE (Proactive Project)	Research	Luzon	PhP 180,000.00	2009-2010
	Sama-samang Aksyon at Gawain upang Isalba ang Parke (SAGIP)	Buklod Unlad ng Dalitang Umaasa sa Kalikasan, Inc.	Advocacy	Luzon	PhP 200,000.00	2009-2010
	Save Mount Bulanjao Initiative Phase 2	Environmental Legal Assistance Center, Inc.	Site-Based	Luzon	PhP 1,238,250.00	2009-2010
	Strengthening of Free Prior and Informed Consent (FPIC) Compliance and Consultation Process in Defense of Ancestral Domains and Ancestral Habitat in the Cordillera	Community Volunteer Missions	Site-Based	Luzon	PhP 1,990,000.00	2009-2010
	Community-Based Co-Management of Resources towards a Sustainable Ecosystem for Ilog Hilabangan Watershed Forest Reserve	Negros Economic Development Foundation, Inc.	Site-Based	Visayas	PhP 857,610.00	2009-2010
	Directory of Marine Reserves in the Visayas	Silliman University – Angelo King Center for Research and Environmental	Research	Visayas	PhP 472,000.00	2009-2010

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
		Management				
	Environmental Awareness Campaign against Human Ecological Aggression	Bohol Nature Conservation Society, Inc.	Advocacy	Visayas	PhP 106,000.00	2009-2010
	Global Legal Action on Climate Change	Batas Kalikasan Foundation, Inc.	Advocacy	Visayas	PhP 200,000.00	2009-2010
	Information, Education and Campaign on Climate Change	Environmental Legal Action Center - Cebu	Advocacy	Visayas	PhP 130,700.00	2009-2010
	Integrated Area Conservation and Resource Enhancement (ICARE) for North Negros Natural Park	Third District Alliance of Resource Managers, Inc.	Site-based	Visayas	PhP 1,221,600.00	2009-2010
	Natural Resource Inventory and Resource Management Assessment for the Islands of Sicogon and Gigantes, Muncipality of Carles, Iloilo	Panay Rural Organizing for Reform and Social Order, Inc.	Site-based	Visayas	PhP 1,004,000.00	2009-2010
	Participatory Research on the Conservation and Sustainable Use of Wild and Uncultivated Crops	Broad Initiatives for Negros Development	Research	Visayas	PhP 354,600.00	2009-2010
	Population, Health and Environment Forum – Visayas Chapter	FPE (Proactive Project)	Advocacy	Visayas	PhP 180,000.00	2009-2010
	Regional Advisory Committee Meeting 2009 - Visayas	FPE (Proactive Project)	Advocacy	Visayas	PhP 185,100.00	2009-2010
	Research Study on the Environmental Impacts of Coal Mining on Semirara Island	The Antique Outdoors, Inc.	Research	Visayas	PhP 146,900.00	2009-2010
	Save the Climate, Save Boracay Project-Phase II	Greenpeace- Southeast Asia/Philippines	Site-based	Visayas	PhP 315,500.00	2009-2010
	Young Minds Academy (Summer Edition)	Sacred Heart Institute for Transformative Education Foundation, Inc.	Advocacy	Visayas	PhP 1,200,000.00	2009-2010
	Advocacy for the Enactment of Provincial Fee Ordinance	Coalition for the Development of Sibuguey, Inc.	Advocacy	Mindanao	PhP 150,000.00	2009-2010
	Buklog: A Traditional Ritual Assembly of Subanen to Uphold Indigenous People's Rights and the Environment	Inter-People's Exchange, Inc.	Site-based	Mindanao	PhP 150,000.00	2009-2010
	FPE: Regional Advisory Committee Meeting 2009 - Mindanao	FPE (Proactive Project)	Advocacy	Mindanao	PhP 190,000.00	2009-2010
	Environmental Defense of Davao City's Upland Watersheds and Local Communities against Agribusiness	Interface Development Interventions, Inc.	Advocacy	Mindanao	PhP 925,000.00	2009-2010

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Plantation Practices					
	Integrated Biodiversity Conservation and Sustainable Development Project of Lake Mainit: Year 1 of 5-Year Strategic Plan	Green Mindanao Association, Inc.	Research	Mindanao	PhP 1,017,000.00	2009-2010
	Mindanao Forum on Climate Change	Philippine Partnership for the Development of Human Resources in the Rural Areas-Mindanao	Advocacy	Mindanao	PhP 150,000.00	2009-2010
	Strengthening Capacities of Indigenous People's Communities towards Sustainable Management of Watershed and Ancestral Domain	Paglilingkod Batas Pangkapatiran Foundation	Advocacy	Mindanao	PhP 400,000.00	2009-2010
	Diliman Science Research Foundation, Inc.: Round Table Discussion on Forest Restoration and Climate Change	FPE (Proactive Project)	Research	National	PhP 120,000.00	2010-2011
	Expanded Environmental Defense Program	Alternative Law Groups	Advocacy	National	PhP 2,000,000.00	2010-2011
	FPE: Regional Consultative Group / Regional Advisory Committee Meeting - Luzon	FPE (Proactive Project)	Advocacy	National	PhP 1,008,660.00	2010-2011
	FPE: Regional Consultative Group / Regional Advisory Committee Meeting - Visayas	FPE (Proactive Project)	Advocacy	National	PhP 510,000.00	2010-2011
	FPE: Regional Consultative Group / Regional Advisory Committee Meeting - Mindanao	FPE (Proactive Project)	Advocacy	National	PhP 981,340.00	2010-2011
	Manila Observatory: Philippine Renewable Energy Atlas Phase 1	FPE (Proactive Project)	Research	National	PhP 1,300,000.00	2010-2011
	Upscaling of Reforestation Efforts by Civil Society Organization FPE's Initiative in Marikina Watershed	FPE (Proactive Project)	Advocacy	National	PhP 2 ,000,000.00	2010-2011
	Audio-based Materials of Fisheries Management and Climate Change	Foundation for Information Technology Education and Development. Inc.	Research	Luzon	PhP 600,000.00	2010-2011
	First Palawan Conference on Biodiversity Conservation and Climate Change Mitigation and Adaptation	TagBalay Foundation, Inc.	Advocacy	Luzon	PhP 200,000.00	2010-2011
	Training in Silkalan Making	Llanera Rural Development Center and Tour Farm	Research	Luzon	PhP 200,000.00	2010-2011
	VUKIG: Climb High and Nurture Goodwill	Sierra Madre Outdoor Club, Inc.	Advocacy	Luzon	PhP 197,000.00	2010-2011

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Biodiversity Resource Development for High Schools	Soil and Water Conservation Foundation	Research	Visayas	PhP 1,328,500.00	2010-2011
	Carles Advocacy and Constituency Building	Carles Multi-purpose Cooperative	Advocacy	Visayas	PhP 200,000.00	2010-2011
	Empowering Community-Based Coastal Resource Management through Environmental Education	San Antonio Fishermen Association	Advocacy	Visayas	PhP 160,000.00	2010-2011
	Forum on the Impact of Global Warming on Water Quality	Cebu Uniting for Sustainable Water Foundation		Visayas	PhP 200,000.00	2010-2011
	Integrated Area Conservation and Resources Enhancement Project II	Third District Development Alliance of Resource Managers, Inc.	Research	Visayas	PhP 1,278,200.00	2010-2011
	Managing Iloilo River towards Biodiversity and Sustainability	St. Therese-MTC Colleges	Advocacy	Visayas	PhP 600,000.00	2010-2011
	Rapid Coastal Resource Assessment of Zumarraga, Samar	Samahan ng Mangingisga ng Zumarraga	Research	Visayas	PhP 104,250.00	2010-2011
	Watershed Rehabilitation in Important Biodiversity Areas in Cebu	Mag-uugmad Foundation, Inc.	Advocacy	Visayas	PhP 1,999,980.00	2010-2011
	Coastal Resource Profiling (for Multi- stakeholder Participation in Biodiversity Conservation) in the Municipality of Kolambugan, Lanao del Norte	Lanao Aquatic and Marine Fisheries Center for Community Development, Inc.	Research	Mindanao	PhP 371,888.00	2010-2011
	Enhancement of Local Capacities to Address Mining Activities in Environmentally-Critical Areas through Effective Governance	Kinaiyahan Foundation	Advocacies	Mindanao	PhP 200,000.00	2010-2011
	Harnessing Capacities and Partnerships for Indigenous Peoples' Empowerment and Sustainability: Conversations with Partners	Samdhana Institute	Advocacy	Mindanao	PhP 200,000.00	2010-2011
	Lake Lanao Coalition Strengthening	Kalimudan Foundation, Inc.	Advocacy	Mindanao	PhP 186,000.00	2010-2011
	Panglima Tahil Mangrove Reforestation and Fish Sanctuary Program	SAC (Social Action Center), Apostolic Vicariate of Jolo	Advocacy	Mindanao	PhP 199,000.00	2010-2011
	Indigenous Knowledge-Based Community Planning Activity with the Maporac Aeta Organization in Zambales	Koalisyon ng Katutubong Samahan ng Pilipinas, Inc. (KASAPI)	Sites Approved Grants	Luzon	165, 400	2010-2011
	Plant towards Reforestation and Eco-Enterprise in Sierra Madre	Mabuwaya Foundation, Inc.	Sites Approved Grants	Luzon	1,845,142	2010-2011

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Supplemental Budget for Star Trek – Palawan	Star Trek: FPE, PEF, FSSI	Sites Approved Grants	Luzon	500,000	2010-2011
	PO-Managed Community Based Coastal Resource Management(CB-CRM) Project for the coastal Communities of Eastern Samar (Year 2)	Southern Samar Peoples Organization Consortium, Inc.	Sites Approved Grants	Visayas	1,630,330	2010-2011
	Biodiversity Conservation & Sustainable Development (BCSD) Project for PO's in Maguindanao, Year 2	Maguindanao Development Foundation, Inc. (MDFI)	Sites Approved Grants	Mindanao	1,097,000	2010-2011
	Arakan Valley Forest Corridor Development, Year 2	Philippine Eagle Foundation, Inc. (PEFI)	Sites Approved Grants	Mindanao	1,513,842	2010-2011
	Community Based Forest Management : A Key to Protect and Conserve Mt. Tipolog	Mount Tipolog Bantay Kinaiyakan Association (MTBKA)	Sites Approved Grants	Mindanao	200,000	2010-2011
	Mt. Gurain Range Forest Rehabilitation and Biodiversity Conservation	Tapuan Farmers Multipurpose Cooperative (TFMC)	Sites Approved Grants	Mindanao	700,000	2010-2011
	Integrated BCSD Project in Lake Mainit	Green Mindanao Association, Inc.	Sites Approved Grants	Mindanao	1,017,000	2010-2011
	AF Social Development Celebrations-2010	Association of Foundations, Inc. (AF)	Constituency Building Grants	Philippines	100,000	2010-2011
	Mainstreaming Population, Health and the Environment (FPOP) in Governance	Family Planning Organization of the Philippines (FPOP)	Constituency Building Grants	Philippines	667,750	2010-2011
	Information Education Campaign (IEC): An Intervention to Reinforce Biodiversity Conservation vis-à-vis Environmental Protection Efforts at Mt. Mantalingahan Protected Landscape (MMPL)	Bangsa Palawan Philippines, Inc. (BPPI)	Constituency Building Grants	Luzon	213,500	2010-2011
	Tapat Kalikasan Environmental Law Enforcement Training	Luntiang Alyansa sa Bundok Banahaw (LABB)	Constituency Building Grants	Luzon	200,000	2010-2011
	International Conference on Rainwater Harvesting for the Watershed Sector	Philippine Watershed Management Coalition, Inc. (PWCI)	Constituency Building Grants	Visayas	95,730	2010-2011
	Integrated Diversified Organic Farming Systems Training	Pambansang Kilusan ng mga Samahang Magsa-saka (PAKISAMA)	Constituency Building Grants	Visayas	209,290	2010-2011

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Danjugan Island Education Program: Environmental Education for Southern Negros Occidental and Beyond	Philippine Reef & Rainforest Conservation Founda-tion, Inc. (PRRCFI)	Constituency Building Grants	Visayas	1,854,660	2010-2011
	Enhancing Local Communities in BC of Ilog Hilabangan Watershed Forest Reserve	Negros Economic Development Foundation, Inc. (NEDF)	Constituency Building Grants	Visayas	1,992,660	2010-2011
	Integrated Sustainable Agriculture: A Strategy in Minimizing Climate Change due to Global Warming	Pagduso sg Agrikultura sa Tingud nga Aksyon sg mga Organisasyon Mangunguma, Inc. (PATANOM)	Constituency Building Grants	Visayas	800,000	2010-2011
	International Long Term Ecological Research (IL-TER) Conference & Scientific Meeting in the Philippines	Kitanglad Integrated NGOs, Inc. (KIN)	Constituency Building Grants	Mindanao	100,000	2010-2011
	Capacity Building for Protected Areas and Watershed Management for the Pantaron-Tago-Kimangkil Mountain Ranges	Bukidnon Resources Management Foundation, Inc. (BRMFI)	Constituency Building Grants	Mindanao	750,000	2010-2011
	Bukidnon Watersheds and Riverbasin Forum	MILAMDEC Multipurpose Cooperative	Constituency Building Grants	Mindanao	100,000	2010-2011
	Bats Conservation-A Strategy for BDCD in Samal Island	Philippine Bat Conservation, Inc. (PBCI)	Constituency Building Grants	Mindanao	1,336,000	2010-2011
	Indigenous Peoples Support Fund, Year 2	Samdhana Institute	Advocacy Grants	Philippines	2,000,000	2010-2011
	Soft Launching of the International Year of the Forest in Silago	VISCA Foundation for Agricultural and Rural Devel-opment, Inc. (VIFARD)	Advocacy Grants	Philippines	50,000	2010-2011
	Citizens Consultation on Low Carbon Economy for the Philippines	Partido Kalikasan Institute, Inc. (PKI)	Advocacy Grants	Philippines	46,350	2010-2011
	2011 National Indigenous Peoples' Summit	Tanggapang Panlegal ng Katutubong Pilipino (PANLIPI) & Consultative Group for Indigenous Peoples (CGIP)	Advocacy Grants	Philippines	400,000	2010-2011
	Solar Generation Sustainable Campus Project	Greenpeace Southeast Asia	Advocacy Grants	Philippines	,217,200	2010-2011
	Governance and Local Development towards Sustainable Manage-ment of Forests, Conservation-Compatible Livelihoods and Poverty Reduction Conference	Haribon Foundation	Advocacy Grants	Philippines	194,900	2010-2011
	Gawad Bayani ng Kalikasan	Center for Environmental Concerns	Advocacy Grants	Philippines	148,000	2010-2011
	Support for Components of Bantay	Action for Economic Reforms, Inc.	Advocacy Grants	Philippines	500,000	2010-2011

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Kita Program	(AER)				
	Environmental Advocacy during the 1st Philippine International Eco-Show (PINES) 2010	Agro-Technical Assistance and Livelihood Opportu-nities in the North (AGTALON)	Advocacy Grants	Luzon	60,200	2010-2011
	Pagpapalakas ng Adbokasya Laban sa Mapanirang Gawain Tungo sa Pangmatagalang Pangangalaga ng Samot Saring Buhay	Palawan Community Based Fisherfolks Alliance, Inc. (PCBFAI)	Advocacy Grants	Luzon	938,615	2010-2011
	Educational Caravan and Forum for Anti-Mining and Eco-Cultural Defense Campaign	HAGIBBAT (Hanunuo, Alangan, Gubatnon, Iraya, Buhid Bangon, Tadyawan) Mangyan Mindoro Inc.	Advocacy Grants	Luzon	136,605	2010-2011
	Mam-eh (Sharing) Action Plan for the First Aeta Forest Foods Festival and Development Forum	Kabalikat sa Kaunlaran ng mga Ayta, Inc. (KAKAI)	Advocacy Grants	Luzon	177,375	2010-2011
	Development of Advocacies, Strategies and Communication Activi-ties through Participatory Video for a Residential Subdivision against Underground Petrochemical Seepage and Pollution	University of the Philippines Social Action & Re-search for Development Foundation	Advocacy Grants	Luzon	283,700	2010-2011
	Advocacy and Alliance Building towards Environmental Defense	Baguio Village Intercultural Association, Inc. (BICAS)	Advocacy Grants	Luzon	190,800	2010-2011
	Fostering Sustainable Ecology and Development through Organic Fertilizer Production	Gelacio I. Yason Foundation-Family Farm School, Inc.	Advocacy Grants	Luzon	700,175	2010-2011
	Publication and Dissemination of the Taal Volcano Protected Land-scape General Management Plan	PUSOD, Inc.	Advocacy Grants	Luzon	150,000	2010-2011
	Visayas Islands Consultation on the Climate Change Agenda for the Aquino Administration	Philippine Partners for the Development of Human Resources in Rural Areas (PHILDHRRA)	Advocacy Grants	Visayas	146,400	2010-2011
	Panay Island Watershed Summit – Ridge to Reef Project	Kahublagan Sang Panimay Foundation, Inc. (KSPF)	Advocacy Grants	Visayas	500,000	2010-2011
	Sustainable Watershed Management and Forest Biodiversity Conservation Summit	Save Ormoc Bay Aggrupation (SOBA	Advocacy Grants	Visayas	150,000	2010-2011
	Developing Market Options for Renewable Energy Project	Central Visayas Fisherfolks Development Center, Inc. (CVFDC)	Advocacy Grants	Visayas	250,000	2010-2011

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Ilo-ilo City Environmental Summit	University of the Philippines-Visayas Foundation, Inc. (UPVFI)	Advocacy Grants	Visayas	80,000	2010-2011
	Don't Mess with Our Talong Advocacy Campaign	The SIAD Initiatives in Mindanao Convergence for Asset Reform & Regional Development, Inc. (SIMCARRD)	Advocacy Grants	Mindanao	200,000	2010-2011
	Raising Environmental Awareness through Music and Theatre in Public Schools in Davao City	Kaliwat Theatre Collective/Mindanao Peoples Caucus	Advocacy Grants	Mindanao	800,000	2010-2011
	Strengthening People's Movement Against Dirty Energy	Mindanao Interfaith Services Foundation (MISF)	Advocacy Grants	Mindanao	100,000	2010-2011
	Justice for Leonard Co: Fact Finding Mission	Samahan ng Nagtataguyod ng Agham at Teknolo-hiya sa Sambayanan (AGHAM)	Environment Defense Grant	Philippines	199,744	2010-2011
	North Zabala Patrol Boats Repair	Samahan ng Maliliit na Mangingisda ng Nicanor Zabala, Inc. (SMMNZI)	Environment Defense Grant	Luzon	104,505	2010-2011
	Youth Eco-Convergence Program: Empower, Educate, Elevate	Youth for Sustainable Development Assembly (YSDA)	Constituency-Building Grants	National	200,000	2011-2012
	Nueva Ecija Development Exchange (NEDEX) for Human Economic and Socio-Cultural Uplift	Kababaihang Masigla ng Nueva Ecija (KMNE)	Constituency-Building Grants	Luzon	200,000	2011-2012 Completed
	Team Visit to Santa, Ilocos Sur-Magnetite Sand Issue	Association of Women in Theology (AWIT)	Constituency-Building Grants	Luzon	58,500	2011-2012 Completed
	Multi-stakeholders Consultation and Publication of the Revised Management Plan of Mt. Banahaw – San Cristobal Protected Landscape (MBSCPL)	Tanggol Kalikasan-Timog Katagalugan (TK-TK)	Constituency-Building Grants	Luzon	357,500	2011-2012
	Ikalahan Ancestral Domain Summit/Strategic Plan	Kalahan Education Foundation (KEF)	Constituency-Building Grants	Luzon	99,000	2011-2012 Completed
	Formation of Northern Luzon Network Against Large-Scale Mining Through the Northern Luzon Mining and Human Rights Summit	Katinnulong Daguiti Umili Iti Amianan, Inc. (KADUAMI)	Constituency-Building Grants	Luzon	200,000	2011-2012 Completed
	Capacitating Vulnerable Communities Towards Sustainable Natural Resource Production and Management Project	Institute of Social Order (ISO)-Ateneo De Manila University	Constituency-Building Grants	Luzon	1,961,400	2011-2012
	Revisiting A7 for ICZM (Alliance of Seven Municipalities for Integrated Coastal Zone Management)	Guiuan Development Foundation, Inc. (GDFI)	Constituency-Building Grants	Visayas	94,500	2011-2012 Completed

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Arakan Indigenous Manobo Kulamanon-Tinanon Summit: Towards furthering and strengthening Indigenous forest governance for climate change mitigation and adaptation within Arakan Valley, North Cotabato	Manobo Lumadnong Panaghiusa sa Arakan Valley, Inc. (MALUPA)	Constituency-Building Grants	Mindanao	72,500	2011-2012 Completed
	Capability Building on Marine and Mangrove Biodiversity in Davao del Sur	Davao Association of Colleges and Schools, Inc. (DACS)	Constituency-Building Grants	Mindanao	67,000	2011-2012 Completed
	Convergence of Conscience: A CARAGA-wide Multi-stakeholders Conference on the Social Cost of Mining and Networking of Environmental Organizations	Fr. Saturnino Urios University	Constituency-Building Grants	Mindanao	95,000	2011-2012
	Climate Change Adaptation and Disaster Risk Reduction Conference	Philippine Partnership for the Development of Human Resources in Rural Areas (PhilDHRRA)	Constituency-Building Grants	Mindanao	150,000	2011-2012
	State of Indigenous Peoples Address (SIPA) 2011	The Legal Rights & Natural Resources Center (LRC)-Kasama sa Kalikasan (KSK)/Friends of the Earth (FOE)	Advocacy Grants	National	200,000	2011-2012 Completed
	Advocating Green Urbanism as a Strategy for Climate Change	University of the Philippines-PLANADES	Advocacy Grants	National	456,415	2011-2012 Completed
	2011 Marine PA Awards and Recognition Event	Marine Environment and Resources Foundation (MERF)	Advocacy Grants	National	200,000	2011-2012
	Stakeholders Meeting on the National Greening Program	Earth Day Network of the Philippines, Inc. (EDNPI)	Advocacy Grants	National	97,860	2011-2012 Completed
	1st International Symposium on Philippine Native Plants	Philippine Native Plants Conservation Society, Inc. (PNPCSI	Advocacy Grants	National	10,000	2011-2012 For Discussion
	Philippines Civil Society Participation in Rio+20 & Revision of Philippine Agenda 21	Civil Society Counterpart Council for Sustainable Development (CSCCSD)	Advocacy Grants	National	460,000	2011-2012 Completed
	A Brochure of Native Tree Species for Reforestation	ViSCA Foundation for Agricultural and Rural Development, Inc. (ViFARD)	Advocacy Grants	National	25,000	2011-2012 Completed
	Philippine Native Trees 101 Up Close and Personal	Hortica Filipina Foundation, Inc.	Advocacy Grants	National	800,000	2011-2012 Completed
	Paid Ad on State of Nature Assessment	Partnership for Clean Air	Advocacy Grants	National	168,381	2011-2012 For Discussion
	ABKD 2011 (Apoy, Bagyo, Kalamidad, Dibuhong Pambata)	Citizens' Disaster Response Center (CDRC)	Advocacy Grants	Luzon	135,000	2011-2012 Completed
	Promotion of Eco-Friendly Stove	Institute for the Development of Education and Ecological Alternatives, Inc, (IDEAS)	Advocacy Grants	Luzon	185,000	2011-2012

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Protecting the Integrity of Communal Watersheds and Ancestral Forests in Bucloc and Boliney Municipalities in Abra Province	Indigenous Peoples' Apostolate – Diocesan Social Apostolate Commission (IPA-DSAC)	Advocacy Grants	Luzon	799,885	2011-2012
	Stakeholders' Forum/Planning Workshop on BCSD	Diocese of Virac Social Action Foundation, Inc. (DVSAFI)	Advocacy Grants	Luzon	84,625	2011-2012 Completed
	Regional Consultation on Mining in the Bicol Region	Institute for Environmental Conservation and Research (INECAR) of Ateneo de Naga University	Advocacy Grants	Luzon	200,000	2011-2012
	Luzon Indigenous Peoples' Inter-Tribal Exchange Program (LIP-ITEP)	Kalipunan ng Katutubong Mamamayan ng Pilipinas (KAMP)	Advocacy Grants	Luzon	175,500	2011-2012
	Establishment of an MRF and Demonstration Site for Composting and Eco Park Development	Santo Niño de Cebu Augustinian Social Development Foundation	Advocacy Grants	Visayas	80,000	2011-2012
	Empowering People, Environmental Protection and Preservation in the Diocese of Maasin, Leyte	Diocesan Social Action Center of Maasin, Inc. (DSAC)	Advocacy Grants	Visayas	800,000	2011-2012
	First Danajon Summit: Collaborating Efforts for our Shared Resources	Coastal Conservation and Education Foundation, Inc. (CCEF)	Advocacy Grants	Visayas	99,000	2011-2012 Completed
	Biodiversity Reserve Development for HS Pilot Expansion	Soil and Water Conservation Foundation, Inc. (SWCF	Advocacy Grants	Visayas	1,883,964	2011-2012
	Ridge to Reef New Directions and Opportunities	Regional Environmental Education Network Region 6, Inc. (REEN6)	Advocacy Grants	Visayas	90,000	2011-2012 Completed
	Cebu Green Economy Summit Communities in Convergence: Building Livable and Sustainable Cebu	Cebu Uniting for Sustainable Water (CUSW)	Advocacy Grants	Visayas	200,000	2011-2012
	Natural Resource Assessment of Mt. Sisipitan and Mt. Mugao Ancestral Domain	Tipon iti Umili Para iti Panangsaluad ti Nakaparsuan (TIPON)	Research Grants	Luzon	199,100	2011-2012
	Environmental Reality of Naga City	Bicol Consortium for Sustainable Society (BCCS)	Research Grants	Luzon	200,000	2011-2012
	Mangrove Cover and Coral Reef Assessment in Ilocos Sur	Cordillera Peoples Alliance (CPA)	Research Grants	Luzon	743,000	2011-2012
	Charcoal Making in the 3rd District of Negros Occidental	FOREST/Research, Development and Extension Office (RDEO) West Negros University	Research Grants	Visayas	200,000	2011-2012
	Restoring the Pagsangaan Watershed for Forest Biodiversity Conservation	Save Ormoc Bay Aggrupation, Inc. (SOBA)	Research Grants	Visayas	800,000	2011-2012

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	Physico-chemical, Hydrological, Biological, and Socio-economic Assessment of the Binalbagan River in Negros Island	Center for Tropical Conservation Studies (CENTROP)-Silliman University	Research Grants	Visayas	650,000	2011-2012
	Heavy Metal Contamination in Sarangani Bay Waters and Sediments and its Uptake on Fishes, Shellfishes and Seaweeds: Benchmark for Policy Formulation and Environmental Management	Association of Mindanao State University Alumni (AMSUA) Cooperative	Research Grants	Mindanao	200,000	2011-2012
	Pesticide Residues in Surface Waters and Groundwater Supplies in Large Scale Agricultural Areas in T'boli, South Cotabato: A Health Concern	OND HESED Foundation, Inc.	Research Grants	Mindanao	200,000	2011-2012
	Sustaining Mangyan Agri-Culture	Mangyan Mission	Environmental Defense Grants	Luzon	199,100	2011-2012
	Environmental Paralegal Action by People's Organization in North West Panay Peninsula (NWPP) Natural Park	BioResource Conservation Trust for the Philippines, Inc. (BIOCON)	Environmental Defense Grants	Visayas	200,000	2011-2012
	Protecting the Watershed Forest Reserves Through Legal Empowerment	Balay Alternative Legal Advocates for Development in Mindanaw, Inc. (BALAOD Mindanao)	Environmental Defense Grants	Mindanao	1,787,800	2011-2012
	Rainforestation Program for Aeta Upland Community	Philippine Disaster Risk Reduction Network (PDRRN)/(Kalipunan ng mga Liping Ayta ng Lupaing Ninuno, Inc. (KALIPI)	Site Grants	Luzon	800,000	2011-2012
	RSEA: Lake Buhi	Central Bicol State University Development Organization	Site Grants	Luzon	1,000,000	2011-2012
	RSEA: Kalbaryo Patapat	Site Grants	Luzon	1,000,000	2011-2012	
	Replanting of Endemic Tree Species in Critical Watershed	New Panggangan Fisherfolks Association (NPFA)	Site Grants	Luzon	15,000	2011-2012
	Framework Development and Strategic Planning for Sicogon/Gigantes	Iloilo Caucus of Development NGOs (ICODE)	Site Grants	Visayas	799,300	2011-2012
	Southern Negros Cauayan Forest Reservation Biodiversity Conservation Project	Eco-Agri	Site Grants	Visayas	617,300	2011-2012
	Promoting Biodiversity Conservation and Sustainable Agriculture	Federation of Multi-sectoral Alliance for Development – Negros(MUAD)	Site Grants	Visayas	2,000,000	2011-2012

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Integrated Area Conservation and Resource Enhancement: I-CARE Yr4	Third District Development Alliance of Resource Managers, Inc. (TDDARM	Site Grants	Visayas	2,000,000	2011-2012
	Establishment of Bio-fence at Mananga Watershed Yr 1	Cebu Biodiversity Conservation Foundation, Inc. (CBCF)	Site Grants	Visayas	2,000,000	2011-2012
	RSEA: Mt. Nacolod	Site Grants	Visayas	1,000,000	2011-2012	
	Reducing Pollution Through Alternative and Individual Rehabilitation of Silway River	Mahintana Foundation, Inc.	Site Grants	Mindanao	1,824,633	2011-2012
	Strengthening Management of the Bunawan Marine Protected Area (BMPA) in Davao Gulf Towards Biodiversity Conservation	Association of Fisherfolk of Davao City, Inc. (AFDCI)	Site Grants	Mindanao	1,580,695	2011-2012
	RSEA: Marilog District	Tropical Institute for Climate Studies - Ateneo de Davao University (TropICS-ADDU)	Site Grants	Mindanao	1,000,000	2011-2012
	RSEA: Agusan Marsh	Mindanao State University-Naawan Foundation for Science and Technology Development, Inc. (MSU-NFSTD)	Site Grants	Mindanao	1,000,000	2011-2012
	National Indigenous Peoples Women's Gathering 2012	P.D. Subanen Inc.	Advocacy	National	PhP 150,000.00	2012-2013
	People's Summit on the National Reclamation Planning	Center for Environmental Concerns (CEC)	Advocacy	National	PhP 200,00.00	2012-2013
	Campaign to Push for the Enactment of the Alternative Minerals Management Bill	Philippine Human Rights Information Center (PhilRights), Inc.	Advocacy	National	Php 2,000,000.00	2012-2013
	Securing and Enforcing Legal Remedies Against Mining in the Philippines	Philippine Earth Justice Center Inc. (PEJC)	Advocacy	National	Php 200,000.00	2012-2013
	Integrating Biodiversity Research, Education, Public Engagement, and Conservation	Foundation for Integrative and Development Studies, Inc. (FIDS)	Advocacy	National	Php 200,000.00	2012-2013
	New Philippine Endemic Species Launch	Protected Areas and Wildlife Bureau (PAWB)	Advocacy	National	Php 110,000.00	2012-2013
	CSO Learning and Planning Sessions on Responding to Climate Change and Risks Mitigation	Caucus of Development NGO Networks (CODE-NGO)	Advocacy	National	Php 200,000.00	2012-2013
	Organization of the 11th General Assembly of the Philippine Watershed Management Coalition	Kahublagan sang Panimalay Foundation, Inc. (KSPFI)	Advocacy	National	Php 157,000.00	2012-2013
	Building Towards Philippine Biochar National Agenda	St. Augustine Scholarship Fund, Inc. (SASFI)	Advocacy	National	Php 200,000.00	2012-2013

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	Summer Internship Program for Southern Luzon	SentrongAlternatibongPanligal (SALIGAN) Inc.	Advocacy	National	Php 81,550.00	2012-2013
	Summer Internship Program for Northern Mindadao	KaisahanTungosaKaunlaranngKanayunan at RepormangPansakahan, Inc.	Advocacy	National	Php 100,000.00	2012-2013
	Summer Internship Program for North Luzon	Tanggol Kalikasan	Advocacy	National	Php100,000.00	2012-2013
	Summer Internship Program for National Capital Region	Ateneo Human Rights Center (AHRC)	Advocacy	National	Php 100,000.00	2012-2013
	Summer Internship Program for Visayas Region	Environmental Legal Assistance Center (ELAC)	Advocacy	National	Php 100,000.00	2012-2013
	FPE's Action on Philex Mining	FPE-PDU Project Development Fund	Advocacy	National	Php 200,000.00	2012-2013
	Apoy, Bagyo, Kalamidad: DibuhongPambata (ABKD) 2012	Citizens' Disaster Response Center (CDRC), Inc.	Advocacy	Luzon	Php 180,000.00	2012-2013
	PagpupulongngmgaAeta	LubosnaAlyansangmgaKatutubongAytangSambales (LAKAS)	Advocacy	Luzon	Php 112,500.00	2012-2013
	Advocacy Campaign on the Philex Dam Failure	Philippine Task Force for Indigenous Peoples Rights (TFIP)	Advocacy	Luzon	Php 187,500.00	2012-2013
	Mobilization and Advocacy vs. Coal Mining in Rasa Island	Katala Foundation	Advocacy	Luzon	Php 100,000.00	2012-2013
	Bicol Regional Advocacy Forum on Biodiversity Issues and Local Government Responses for Resource Conservation and Management	Bicol Consortium for Development Initiatives, Inc. (BCDI)	Advocacy	Luzon	Php 200,000.00	2012-2013
	Publication of Common Land Water: An Island Perspective on Watersheds	Kahublagan sang Panimalay Foundation, Inc. (KSPFI)	Advocacy	Visayas	Php 180,000.00	2012-2013
	People's Summit on Impact of Reclamation	PADAYON Bohol Marine Triangle Management Council (BMTMCI)	Advocacy	Visayas	Php 27,500.00	2012-2013
	Climate Change Advocacy &Rainforestation Farming	Carles Multi-Purpose Cooperative	Advocacy	Visayas	Php 310,250.00	2012-2013
	Protecting Caluya's Biodiversity and Building Voices of Caluya;s Seaweed Farmers	PambansangKilusanngmgaSamahang Magsasaka (PAKISAMA)	Advocacy	Visayas	Php 2,000,000.00	2012-2013
	Lobby to the CENR for Passage of the SINP Bill	Eastern Samar Social Development Organization, Inc. (ESSDO)	Advocacy	Visayas	Php 87,000.00	2012-2013
	Advocating Science-based MPA Desigs thru IEC Advocacy	Coastal Conservation and Education Foundation (CCEF)	Advocacy	Visayas	Php 200,000.00	2012-2013
	Election Advocacy for Good Environmental Governance	Community Empowerment Resource Network (CERNET), Inc.	Advocacy	Visayas	Php 200,000.00	2012-2013
	Community Press and Climate Change, Reporting on Climate	International Fellowships Program-Philippines Alumni Association	Advocacy	Visayas	Php 200,000.00	2012-2013

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Change: A Seminar Workshop for Community Press in Western Visayas Philippines	(IFFPAA), Inc.				
	Southwestern Negros Watershed Summit	Commission on Social Action, Diocese of Kabankalan	Advocacy	Visayas	Php 458,600.00	2012-2013
	Support for 1st Central Visayas PA Management Summit	Ramon Aboitiz Foundation, Inc. – Eduardo Aboitiz Development Studies Center (RAFI-EADSC)	Advocacy	Visayas	Php 200,000.00	2012-2013
	Stakeholder's Forum on DRR and CCA in SOCSARGEN	Sarangani Province Empowerment and Community Transformation Forum, Inc. (SPECTRUM)	Advocacy	Mindanao	Php 150,000.00	2012-2013
	In Defense of Watersheds of Cantilan, Surigao del Sur	Diocesan Social Action Center (DSAC) of the Diocese of Tandag	Advocacy	Mindanao	Php 200,000.00	2012-2013
	CSO/IPO/LGU Meeting with DENR on Mining	Cantilan CSO	Advocacy	Mindanao	Php 70,000.00	2012-2013
	Mutli-Sectoral Investigation Team Mobilization Budget – Mining	Cantilan CSO	Advocacy	Mindanao	Php 75,000.00	2012-2013
	Ban Aerial Spray Support Project	SIMMCARD	Advocacy	Mindanao	Php 200,000.00	2012-2013
	Need to Quantify and Understand Reef Biodiversity in the Philippines for the Benefit of the Filipinos	Diliman Science Research Foundation (DSRF), Inc.	Research	National	Php 1,498,050.00	2012-2013
	Knowledge Product Development of Sustainable and Integrated Area Development (SAID) Initiatives for Rural Development	Philippine Partnership for the Development of Human Resources in Rural Areas-National (PhilDHRRA-National)	Research	National	Php 200,000.00	2012-2013
	Using Science-based Evidence to Prosecute Pangolin Poachers	Foundation for Integrative and Development Studies, Inc. (FIDS)	Research	National	Php 200,000.00	2012-2013
	Illustrated Guidebooks to the Philippines Amphibians and Reptiles (An Open Access Resource for Students, Scientists, and Conservation Biologists)	Dr. Arvin Diesmos	Research	National	Php 800,000.00	2012-2013
	Mt. Calavite Wildlife Sanctuary Rapid Site Assessment Project	Mindoro Biodiversity Conservation Foundation (MBCFI)	Research	Luzon	Php 1,022,100.00	2012-2013
	Mapping the Development Initiatives of CSOs in Conservation Areas as Models for Serendipitous Climate Change Adaptation	Philippine Partnership for the Development of Human Resources in Rural Areas-Luzon Secretariat (PhilDHRRA-Luzon)	Research	Luzon	Php 200,000.00	2012-2013
	Research Study on the Impact of Mining in Llorente, Homohon and Manicani Island in Eastern Samar	Conduits for Development, Inc. (CDI)	Research	Visayas	Php 2,000,000.00	2012-2013

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Capacity-Building for MFARMC on Coastal Resource Assessment, Monitoring, and Evaluation	South Pacific Integrated Area Development Foundation, Inc. (SPIADFI)	Research	Visayas	Php 200,000.00	2012-2013
	Re-assessment of Community-based Mangrove Forest Ecosystem in Maribojoc Bay	Participatory Research Organization of Communities and Education (PROCESS)-Bohol	Research	Visayas	Php 800,000.00	2012-2013
	Participatory Resource Appraisal-Resource and Social Assessment	Development Options and Social Entrepreneurship (DOSE), Inc.	Research	Mindanao	Php 600,000.00	2012-2013
	Environmental Defense Program Year 3	Alternative Law Group (ALG)	Environmental Defense	National	Php 2,000,000.00	2012-2013
	Enforestment: Enforcing Forest and Fishery Statutes Through Mentoring	Palawan NGO Network, Inc. (PNNI)	Environmental Defense	Luzon	Php 2,000,000.00	2012-2013
	Rehabilitation and Development of Watershed cum Nursery Establishment (Indigenous Species and Fruit Bearing Trees) as Income-Generating Project of Brgy. Pedlisan, Maddela, Quirino	St. Joseph Savings and Development Cooperative	Site-based	Luzon	Php 708,714.00	2012-2013
	Gabriela Multipurpose Cooperative Rehabilitation of Reforestation Site	Gabriela Multipurpose Cooperative	Site-based	Luzon	Php 128,000.00	2012-2013
	Mt. Bulusan Volcano Exploratory Partnership Project	FPE LRU	Site-based	Luzon	Php 200,000.00	2012-2013
	Biak-na-Bato Post Site-Focused Intervention	FPE LRU	Site-based	Luzon	Php 200,000.00	2012-2013
	Sta. Catalina Biodiversity Project	Sta. Catalina Bukidnon Tribe Association	Site-based	Visayas	Php 425,000.00	2012-2013
	Community-based Coastal Resource Management Project for the South Eastern Coastal Communities of the Province of Eastern Samar Year 3	Southeastern Samar Peoples' Organization Consortium, Inc. (SeaSPOC)	Site-based	Visayas	Php 1,650,000.00	2012-2013
	Study on the Outcomes of the Bohol Marine Triangle (BMT) Marine Conservation Project	FPE VRU	Site-based	Visayas	Php 400,000.00	2012-2013
	Impact Evaluation of Mt. Talinis/Twin Lakes Biodiversity Conservation Project	FPE VRU	Site-based	Visayas	Php 350,000.00	2012-2013
	Silway River Erosion and Flood Control Project	Tribal Leaders Development Foundation, Inc. (TLDFI)	Site-based	Mindanao	Php 723,675.00	2012-2013
	Arakan Forest Corridor Development Project – Year 3	Philippine Easge Foundation, Inc. (PEFI)	Site-based	Mindanao	Php 1,995,930.00	2012-2013
	Ligawasan Marsh Strategic Plan Review Workshop	Maguindanaon Development Foundation, Inc. (MDFI)	Site-based	Mindanao	Php 275,000.00	2012-2013

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Integrated Biodiversity Conservation and Sustainable Development Project of the Lake Mainit Year 3	Green Mindanao Association, Inc. (GMAI)	Site-based	Mindanao	Php 1,547,500.00	2012-2013
	Arakan Forest Corridor Development Stakeholders' Review of 5-Year Strategic Plan	PEFI	Site-based	Mindanao	Php 275,000.00	2012-2013
	Laglagaan Mountain and Watershed Source Rehabilitation and Protection	IPCDS	Site-based	Mindanao	Php 150,000.00	2012-2013
	Ipil Coastal Community Climate Change Mitigation Project	XAES/XSF	Site-based	Mindanao	Php 200,000.00	2012-2013
	Ligawasan Marsh Project Allocation	MDFI	Site-based	Mindanao	Php 800,000.00	2012-2013
	Impact Evaluation of MICADEV/Matutum Project	FPE	Site-based	Mindanao	Php 350,000.00	2012-2013
	Impact Evaluation of Dinagat Projects	FPE	Site-based	Mindanao	Php 350,000.00	2012-2013
	PHILIPPINE TROPICAL FOREST CONSERVATION FOUNDATION					
	Sustaining Sablayan Forest Restoration Project (Year 2)	Samahan ng Sablayenong Mapagkalinga sa Kalikasan, (SASAMAKA) Inc.	Site-based	Luzon	USD 29,424.00	Feb. 2, 2009 - Jan. 31, 2010
	Enhancement of Community-based Initiatives towards Rehabilitation and Protection of Community Watersheds in Marilog Uplands (Year 2)	Kainayahan Foundation Inc.	Site-based	Mindanao	USD 38,118.00	Feb. 9, 2009 – Feb. 8, 2010
	Protecting our People's Biodiversity Heritage in the Ancestral Forest of Marasugan, Compostella Valley (Phase 2)	Paglilingkod Batas Pangkapatiran Foundation, Inc.(PBPF)	Site-based	Mindanao	USD 33,243.00	Jan. 5 2009 – Dec. 31, 2009
	Palawan Para-Enforcers	Palawan NGO Network	Environmental Defense	Luzon	USD 2,157.00	March 15, 2009 – June 30, 2009
	IEC and Advocacy Campaign for Forest Protection and Conservation of the Northern Sierra Madre Nature Park	CAVAPPED	Advocacy	Luzon	USD 2,157.00	May, 4, 2009- May 3, 2010
	Community-based biodiversity Management and Adoption of Vermi-Composting and Natural Farming Technologies at WMSU's Forest Reservation	Kasanyangan Rural Development Foundation (KRDFI)	Site-based	Mindanao	USD 34,833.00	May 4, 2009 – May 3, 2010
	Multi-sectoral Assessment of Baguio City's Forest Conservation	University of the Philippines College of Baguio Educational Foundation, Inc.	Research	Luzon	USD 2,157.00	April 8, 2009 – May 31, 2009

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Status	(UBCB)				
	Forestry Law Enforcement Learning Exchange	Task Force Sierra Madre – NQ	Environmental Defense	Luzon	USD 431.00	April 20, 2009 – May 1, 2009
	Discussion Session on Rule of Procedure for Environmental Cases	Alternative Law Groups Inc. (ALG)	Environmental Defense	Luzon	USD 1,834.00	April 10, 2009 – June 10, 2009
	Pacasaday towards Economic and Environmental Development	Pacasaday Manobo Association (PAMAAS), Inc.	Site-based	Mindanao	USD 21,970.00	May 15, 2009 – May 14, 2010
	Continuation and Expansion of Community-based Conservation of Indigenous Trees	Landcare Foundation of the Philippines, Inc. (LFPI)	Site-based	Mindanao	USD 41,475.00	May 18, 2009 – May 17, 2010
	Oplan Sima II	Tanggol Kalikasan	Advocacy	Luzon	USD 37,735.00	Feb 1, 2009 – Jan. 31, 2009
	Nuestra Paragua	Palawan NGO Network Inc. (PNNI)	Advocacy	Luzon	USD 43,144.00	May 1, 2009 – April 30, 2010
	Establishing a locally Managed Wildlife Sanctuary in Calayan Island	Isla Biodiversity Conservation	Site-based	Luzon	USD 15,377.00	August 1, 2009 - July 31, 2010
	Watershed Management and Biodiversity Conservation in Sibuyan Island Philippines	WWF Philippines in Partnership Sibuyan Mangyan Tagabukid Tribal Association	Site-based	Luzon	USD 43,144.00	July 1, 2009 - June 30, 2010
	Conserving Mangrove Resources through Rehabilitation and Protection Project (Phase II)	Bangsa Palawan Philippines, Inc.	Advocacy	Luzon Palawan	USD 35,292.00	July 15, 2009 - July 14, 2010
	Strengthening Governance Capacities to Rehabilitate the MONO-ALAH Watershed	ISFI-ADDU	Advocacy	Mindanao Bagumbaya n	USD 15,101.00	August 1, 2009 - July 30, 2010
	Sustainable Tourism Enterprise Development in Bantayan	Omagieca	Site-based	Visayas Bantayan (Negros)	USD 2,157.00	August 1, 2009 - July 30, 2010
	Addressing Vulnerabilities of Malarayat Ecosystem and Dependent Communities to Climate Change	PUSOD, Incorporated	Site-based	Luzon Malrayat (Batangas)	USD 31,746.00	July 28, 2009 - June 30, 2010
	NAREK Conservation Planning Workshop	CAVAPPED	Advocacy	Luzon Cagayan Valley	USD 1,821.00	Sept. 15, 2009 - Oct. 31, 2009
	Continuity of the Mangrove Forest Development in the selected municipalities of Lanao del Norte	LAFCCOD	Research	Visayas Lanao del Norte	USD 2,157.00	July – Oct. 30, 2009
	Merging Socio-Economic development and Biodiversity Conservation in Mt. Palali	Friends of the Environment for Development and Sustainability, Inc (FRENDS)	Advocacy	Luzon Nueva	USD 43,067.00	Oct. 1, 2009 – Sept. 30, 2009

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	through Community-Based Management Approach			Vizcaya		
	Towards a Provincial Level Community-Based Mangrove Protection and Management in Northern Samar	Empowerment and Resource Development (CERD)	Site-based	Mindanao Northern Samar	USD 25,392.00	Oct. 1, 2009 – Sept 30, 2009
	Community-Based Mangrove Rehabilitation to Enhance Coastal Habitats in Seven Danajon Bank Sites - Yr2	Project Seahorse	Site-based	Visayas Leyte	USD 16, 665.00	Oct. 1, 2009 – Sept. 30, 2010
	National Conference on Strengthening Forestry Education in Addressing Climate Change and Water Security	Philippine Forestry Education Network (PFEN)	Advocacy	National	USD 2,175.00	Nov. 8, 2009 – Nov. 15, 2009
	A Sweet Exchange between Palawan and the South of France: Support for IP Participation	NTFP-EP	Advocacy	Luzon Palawan	USD 2,067.00	Nov. 3, 2009 – Feb. 28, 2009
	Identification of Forest Restoration Sites	First Philippine Conservation Incorporated	Research	National	USD 2,026.00	Nov. 16, 2009 – Dec. 16, 2009
	Calawis Community Rainforestation Training Workshop and Nursery Establishment	FPE3	Site-based	Luzon Antipolo	USD 2,157.00	Dec. 15, 2009 – Mar. 15, 2010
	Dipterocarp Tree Domestication and Use on Public and Private Lands in Selected Sites to Expand and Conserve Philippine Forests Yr III	Soil and Water Conservation Foundation (SWCF)	Research	National	USD 28,809.00	Dec. 8, 2009 – Nov. 30, 2010
	San Jose Community Rainforestation Training Workshop and Nursery Establishment	FPE3	Site-based	Luzon San Jose	USD 2,157.00	Dec. 15, 2009 – Mar. 15, 2010
	Bantay Kabuhatan	Caraga Conference for Peace and Development (CCPD)	Advocacy	Mindanao Caraga	USD 31,731.00	Jan. 19, 2010 – Jan. 19, 2011
	Save Sierra Madre Network Summit	Task Force Sierra Madre – NQ	Advocacy	Luzon	USD 1,079.00	Sept. 10, 2009 – Oct. 10, 2009
	Establishment of an Integrated Reforestation, Conservation, and Sustainable Livelihood Program for Kanawan Aytas in the Bataan National Park Yr.3	Center for Biomolecular Science Foundation	Site-based	Luzon Bataan	USD 40,269.00	Jan. 18, 2010- Jan. 17, 2011
	Aeta Leadership Formation Program for BCSD of their Ancestral Domain	Education for Life Foundation	Site-based	Luzon	USD 2,279.00	Jan. 15, 2010 – June 15, 2010

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Plant Biodiversity and Zonation of the Caimpugan Peat Swamp Forest on Mindanao Island, Philippines	Dr. Edwin Fernando	Research	Mindanao Caimpugan	USD 2,279.00	May 17, 2010 – May 16, 2011
	Tanap Forest Reserve Conservation and Protection Project Development Phase	Kalinga Mission for Indigenous Communities and Youth Development Inc.	Site-base	Luzon Ilocos Norte	USD 2,256.00	Mar. 18, 2010 – May 18, 2010
	Managing Common Resources, Sustaining the Livelihood of Coastal Communities through Mangrove Management Yr. 2	Institute of Social Order	Site-base	Luzon Quezon	USD 31,605.00	Jan. 1, 2010 – Dec. 30, 2010
	Sustaining the Mangrove Rehabilitation Initiatives and Livelihood Enhancement in (SMILE) - Sibugay Bay Project (Year 1)	Xavier Agriculture Extension Service	Site-base	Mindanao Zamboanga	USD 45,547.00	May 15, 2010 – May 14, 2011
	Mainstreaming Native Species - based Forest Restoration	Environmental Leadership and Training Initiative (ELTI)	Advocacy	Luzon (UP Diliman)	USD 2,279.00	June 1 – Jul 16, 2010
	PES National Conference - Workshop: PES for Climate Change Adaptation and Mitigation	IRRI – ICRAF Project	Advocacy	National	USD 2,279.00	Aug 12-13, 2010
	Nuestra Paragua Dos (Buffer Zoning and Management Plans for Community Conserved Areas	Palawan NGO Network, Inc. (PNNI)	Environmental Defence	Luzon Palawan	USD 45,579.00	May 1, 2010 – Apr. 30, 2011
	Sustaining Local Capacity Enhancement for Resource Management and Development in the Allah Valley Forest Reserve	Tribal Leaders Development Foundation, Inc.	Site-base	Mindanao South Cotabato	USD 45,547.00	July 1, 2010 – June 30, 2011
	Profile, Status, Needs Assessment and Project Development Proposal for Forest Restoration and Biodiversity Protection of Lowland Dipterocarp Forests in Silago, Southern Leyte	ViSCA Foundation for Agricultural and Rural Development (ViFARD), Inc.	Environmental Defence	Visayas Leyte	USD 2,279.00	July 1, 2010 – Sept. 1, 2010
	Consultative meetings and technical support for the Sustainable Forest Management Bill	Haribon Foundation	Environmental Defence	National	USD 2,232.00	May 1, 2010 – Sept. 30, 2010
	Legal Support for the Sustainable Forest Management Bill	Ana Rhia T. Muhi	Environmental Defence	National	USD 1,823.00	June 1, 2010 – Aug 1, 2010
	Expanded Environmental Defense Program	Alternative Law Group, Inc.	Environmental Defence	National	USD 45, 479.00	Jul 1, 2010 – June 1, 2011
	Coalition of Fisherfolk Association for the Restoration of Sibuguey Bay's Over-exploited Mangroves and Natural Resources in Siay,	Kapunungan sa Gagmay'ng Mangingisda sa Concepcion (KGMC)	Site-based	Mindanao	USD 41,568.00	Aug. 1, 2010 – July 31, 2011

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Naga and Kabasalan					
	Production of Indigenous Seedlings for Landscape restoration through Rainforestation (PILARR) Project	Can-ugnay Rainforestation Farmers' Association (CarFA)	Site-based	Visayas	USD 1,743.00	Sept 2010 – Aug. 2011
	Multisectoral Forum on the New Rules of Procedure for Environmental Cases in Bislig City, Surigao city	SALIGAN	Environmental Defence	Mindanao Surigao	USD 2,279.00	Oct. 18, 2010 – Nov. 2010
	Merging Socio-Economic Development and Biodiversity Conservation in Mt. Palali through Community-Based Management Approach (Year 2)	FRENDS	Site-based	Luzon Nueva Vizcaya	USD 45,533.00	Nov. 1, 2010 – Oct. 31, 2011
	Saving the Gulf by Saving the Uplands: Up-scaling Project	Save Davao Gulf	Advocacy	Mindanao Davao	USD 19,866.00	June 1, 2010 – May 31, 2011
	3rd Symposium on Long-Term Ecological and Biodiversity Research	Kitanglad Integrated NGOs (KIN) Inc.	Research	National	USD 2,279.00	Nov. 10 – Nov. 30, 2010
	Rainwater Harvesting in the River Basin for Climate Change Adaptation: 10th PWMC General Assembly	Philippine Watershed Management Coalition	Advocacy	National	USD 2,279.00	Oct. 1, 2010 – Jan. 2011
	Tanap Forest Reserve Conservation and Protection Project	Kalinga Mission for Indigenous Communities and Youth Development Inc.	Advocacy	Luzon Ilocos Norte	USD 38,710.00	Dec. 20, 2010 – Dec. 19, 2011
	Community-based Forest Restoration and Biodiversity Protection and Management of Lowland Dipterocarp Forests in Silago, Southern Leyte	VisCA Foundation for Agricultural and Rural Development (ViFARD), Inc.	Site-based	Visayas Leyte	USD 45,424.00	Dec. 20, 2010 – Dec. 19, 2011
	Establishment of a Rainforest Restoration Initiative (RFRI) Secretariat	RFRI - Hazel Consunji	Advocacy	National	USD 2,276.45	Feb. 1, 2011 – June 30, 2011
	Philippine Tropical Forest Conservation Learning Series 1	Knowledge Channel Foundation, Inc.	Advocacy	National	USD 45,529.05	Feb. 1, 2011 – Jan. 31, 2012
	Impacts of Co-Management in Forest Management	Forests and Natural Resources Research Society of the Philippines, Inc. (FORESPI)	Research	National	USD 2,276.45	Jan. 17, 2011 – May 31, 2011
	Addressing Vulnerabilities of Malarayat Ecosystem and Dependent Communities to Climate Change Year 2	Pusod, Incorporated, Inc.	Research	Luzon Batangas	USD 12,515.94	Mar. 1, 2011 – Aug. 31, 2011

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Enhancing the Capacity of Various Stakeholders of the San Teodoro Watershed in the Preparation of a Sustainable Watershed Management	Tamaraw Lodge # 65 of Free and Accepted Mason	Advocacy	Luzon Mindoro	USD 2,276.45	Mar. 2011 – June 2011
	Fostering Dialogue on the Impact of Mining in Palawan	Palawan NGO Network, Inc. (PNNI)	Advocacy	Luzon Palawan	USD 2,276.45	Mar. 17, 2011 – June 16, 2011
	Plant Towards Rain-forestation and Eco - Enterprise in sierra Madres (Plant TREES) - Year 1	Mabuwaya Foundation, Inc	Advocacy	Luzon	USD 38,940.63	Feb. 1, 2011 – Jan. 31, 2012
	Towards REDD-Plus Capacity Building and Development for the Philippine Tropical Forest Conservation Foundation and its Beneficiaries	Ateneo de Manila University – School of Government	Advocacy	National	USD 39,033.82	Apr. 1, 2011 – April 30, 2012
	North Luzon Consultation Workshop for The Philippines Environment Sector Assessment	Ateneo de Manila University – School of Government	Site-based	Luzon	USD 1,821.16	May 3, 2011
	Leonardo L. Co Trail (The Palanan - San Mariano Rapid Biodiversity Assessment Traverse)	Philippine Native Plant Conservation Society Inc.	Advocacy	Luzon Isabel	USD 2,276.45	
	Enhancing Awareness on Biodiversity Conservation towards Sustainable Development: A Multi-stakeholders Approach and Donors' Forum in Mindanao	Yamog Renewable Energy Development Group Inc.	Advocacy	Mindanao	USD 2,276.45	Apr. 27, 2011 – May 27, 2011
	Releasing a Philippine Eagle back to its Habitat within the NSMNP, Isabela	Philippine Eagle Foundation	Site-based	Luzon Isabela	USD 2,276.45	May 1, 2011 – April 30, 2012
	Native Forest Tree Species Production	Alliance of Young Professionals for Social and Environmental Development, Inc.	Research	National	USD 2,276.45	Jun. 15, 2011 – Feb. 20, 2012
	Baseline Data development and Community Preparation for the establishment of Science-based Sustainable Conservation and Rehabilitation Program for CALSANAG Watershed Forest Reserve	St. Vincent Ferrer Parish Multi-Purpose Cooperative (SVFPMPC)	Research	Luzon	USD 2,276.45	Jun. 1, 2011 – May 2, 2012
	Partnership for an Integrated Approach to the Restoration, protection and Conservation of Mt. Kitanglad Forest	Philippine Federation for Environmental Concern (PFEC)	Environmental Defence	Visayas Bukidnon	USD 19,661.33	Jun 1, 2011 – March 31, 2012

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Towards a Provincial Level Community-Based Mangrove Protection and Management in Northern Samar	Center For Empowerment and Resource Development (CERD)	Environmental Defence	Mindanao Samar	USD 35,664.80	May 30, 2011 – May 29, 2012
	Community Initiatives on Environmental Protection, Diversity Assessment, Habitat Restoration, Agroforestry Enhancement and Institutionalization of Farmer-to-Farmer On-site Training (CIENDA-RAINFO) Project	Cienda-San Vicente Farmers Association (CSVFA)	Site-based	Luzon Palawan	USD 34,715.90	Jun. 6, 2011 - Jun 5, 2012
	Community-based Forest Rehabilitation using Indigenous Tree Species	Calintian Himbangan Integrated Farmers Association (CHIFA), Inc.	Site-based	Visayas Leyte	USD 2,276.45	Jun. 1, 2011 – May 30, 2012
	Establishment and Maintenance of Native Forest Tree Nursery and Rainforest Demonstration Area in PFEN member SCU's Using Rainforest Technology (Year 1)	Philippine Forestry Education Network Inc. (PFEN)	Site-based	National	USD 43,792.11	Jun. 15, 2011 – June 14, 2012
	Nuestra Paragua Tres	Palawan NGO Network, Inc. (PNNI)	Advocacy	Luzon Palawan	USD 45,529.05	May 1, 2011 – Apr. 30, 2012
	Strengthening the Mt. Sinaka Bantay Kalikasan (BK) Council and Establishing BK in the KabiKu	Kinaiyahan Foundation, Inc.	Site-based	Mindanao Cotabato	USD 45,492.62	Jul 15, 2011 – Jul 14, 2012
	Enhancing Community Participation in the Gingoog City Watershed Management Plan and Process	PARFUND	Site-based	Mindanao Misamis Oriental	USD 1,821.16	Jul. 14, 2011 – Aug 13, 2011
	Palawan Para- Enforces in Island Municipalities Enforcing Forest through Mentoring	Palawan NGO Network, Inc. (PNNI)	Site-based	Luzon Palawan	USD 2,276.45	Jul. 1, 2011 – Sept. 30, 2011
	Forum on "State of Nature Address" of the Green Convergence of the Safe Food Healthy Environment and Sustainable Economy	Clean Air	Advocacy	National	USD 2,276.45	
	Enhancing Bantay Kalasan's Capacity and Facilitating Support System in Forest Conservation and Biodiversity Monitoring in Mt.Balatukan and Kimangkil Ranges	Landcare Foundation of the Philippines	Advocacy	Mindanao	USD 2,276.45	Aug 1, 2011 – Oct 30, 2011
	National Conference on Revitalizing Forestry Education in the Philippines: Promoting Climate	Philippine Forestry Education Network Inc. (PFEN)	Advocacy	National	USD 2,276.45	Aug 2, 2011 – Sept 2, 2011

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Change Adaptation, Biodiversity Conservation and Sustainable Forest Ecosystem Management					
	16th National Environmental Congress	FPEC	Advocacy	National	USD 2,276.45	Nov. 8 – 10, 2011
	Sustaining the Mangrove Rehabilitation Initiatives and Livelihood Enhancement in (SMILE)- Sibuguey Bay Project (Phase 2)	XAES	Advocacy	Mindanao	USD 45,497.18	
	Mangrove Nursery Proposed Project Development of Butuan Global Forum, Inc. (BGFm) Indigenous Tree Seedling Nursery	Kingfishers Association Butuan Global Forum, inc. (BGFm)	Site-based	Mindanao Butuan	USD 2,230.92	Oct. 3, 2011 – Dec 30, 2011
	First International Symposium of the Native Plants Conservation Society (PNPCSI): Philippine Treasures and the Legacy of Leonard Co	Philippine Native Plants Conservation Society	Advocacy	National	USD 2,276.45	Oct. 1, 2011 – Nov. 30, 2011
	National Greening Program	Environmental Legal Assistance Center, Inc.	Advocacy	National	USD 1,821.16	Nov. 2, 2011 – Nov. 11, 2011
	An annotated checklist, comparative study and compilation of references about native forest trees and exotic trees used for reforestation in the Philippines.	Ms. Metchie Gay Arnaiz	Research	National	USD 2,276.45	Dec. 12, 2011 – Mar. 30, 2012
	A Mountain for the Community	Palawan NGO Network, Inc. (PNNI)	Advocacy	Luzon Palawan	USD 2,276.45	Dec. 15, 2011 – Nov. 15, 2012
	Policy Forum on Co-Management in the Philippines	Philippine Forestry Education Network, Inc. (PFEN)	Advocacy	Luzon UP Los Banos		2012
	Training Workshops on Synthetic Aperture Radar Image Processing for Forest Cover Classification and Change Detection in Support of REDD+ MRV Development	Fauna & Flora International Philippines	Advocacy	Luzon UP Dilliman		2012
	Patag Gabas Guadalupe Farmer's Association	Development of Indigenous Trees Species Nursery of the Patag Gabas Guadalupe Farmer's Association	Site-based	Visayas Leyte		2012
	Non Timber Forest Products Exchange Program (NTFP-EP)	Promoting Rainforestation Through the RFRI Network	Advocacy	Nationwide		2012
	Municipal Government Of San Teodoro, Oriental Mindoro, Province of Oriental Mindoro	Linao-Cawayan Sub Watershed Management Project (LICASWAMP)	Environmental Defence	Luzon Mindoro		2012

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Philippine Agrarian Reform Foundation for National Development (PARFUND)	A Rehabilitation and Protection Program for Watershed and Coastal Resources of Gingoog City	Advocacy	Mindanao Misamis		2012
	A Self - Propagating Greening Program through the Establishment of a Gawad Kalinga Community Nursery	Gawad Kalinga Community Development Foundation, Inc.	Site-based	Luzon Nueva Vizcaya		2012
	Philippine Native Tree Seedlings Nursery Establishment at the Farm Business School of Jala-Jala	Meralco Foundation, Inc. Foundation, Inc.	Site-based	Luzon Rizal		2012
	Merging Socio-Economic Development and Bio- diversity Conservation in Mt. Palali through Community-Based Management Approach (Year3)	Friends of the Environment for Development and Sustainability, Inc. (FRENDS)	Site-based	Luzon Nueva Vizcaya		2012
	Coalition Of Fisherfolk Association for the Restoration of Sibuguey Bay's Over Exploited mangroves and Natural Resources in Siay, Naga and Kabasalan (CARBON - SINK Year 2)	Kapunungan sa Gagmay'ng ng Mangingisda sa Concepcion (KGMC)	Site-based	Mindanao Zamboanga		2012
	Expansion of the Rehabilitation of Arayat Watershed for the Protection of Candaba Wetlands (The Tree-prenuer project Phase 2)	Society for the Conservation on Philippine Wetlands, Inc.	Site-based	Luzon Pampanga		2012
	Palawan Mangroves Rescue	Palawan NGO Network, Inc.	Site-based	Luzon Palawan		2012
	Harvesting Eco-wisdom @ KAPWA3	Fauna & Flora International Philippines	Advocacy	Luzon Baguio		2012
	Research Education and Outreach for the IUCN "Critically Endangered" Philippine Eagle in Dinapigue and Disalag, Northern Sierra Madre	Philippine Eagle	Research	Luzon Dinapigue, Isabela Province and Dilasag, Quirino Province		2012
	Facilitation and Assistance to CSO partners on the DENR-PTFCF-FPE NGP Partnership Agreement Implementation 2012 in Region 5	Philippine Federation for Environmental Concern (PFEC)	Site-based	Luzon Region 5		2012
	Facilitation and Assistance to CSO partners on the DENR-PTFCF-FPE	Philippine Federation for Environmental Concern (PFEC)	Site-based	Luzon Region 10		2012

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	NGP Partnership Agreement Implementation 2012 in Region 10					
	Green Convergence Forum on "State of Nature Assessment:Voices from the Grassroots"	Green Convergence for Safe Food, Healthy Environment and Sustainable Economy	Site-based	Luzon Miriam Collage		2012
	Plant Towards Rainforest and Eco-enterprise in Sierra Madre (Plant Trees) Year 2	Mabuwaya Foundation, Inc.	Advocacy	Luzon		2012
	Sustaining Local Capacity Enhancement for Resource Management and Development in the Allah Valley Forest Reserve (Year 2 and Year 3)	Tribal Leaders Development Foundation,Inc. (TLDFI)	Advocacy	Visayas Leyte		2012
	Facilitation and Assistance to CSO Partners on DENR-PTFCF-FPE NGP Partnership Agreement Implementation 2012 in Region 6, Western Visayas	Broad Initiatives for Negros Development (BIND)	Site-based	Visayas Negros		2012
	English Subtitling of the Knowledge Channel's "Puno ng Buhay" (Season 1) Environmental Education Program	Knowledge Channel Foundation, Inc.	Advocacy	National		2012
	Watershed Restoration for Sustainable Water Supply	Sustainable Environment for Rural Development Association Inc	Site-based	Luzon Quirino		2012
	10th multi-Sectoral Forum on Sustainable Watershed Management	UPLB Foundation, Inc.	Advocacy	Luzon UP Los Banos		2012
	Critical Habitat Management on Dumaran Island, Palawan	Katala Foundation Incorporated	Site-based	Luzon Palawan		2012
	Visayas Regional Women's Forum/ Workshop on Natural Resources and Mining	Rural Development Institute-Leyte	Advocacy	Visayas Leyte		2012
	World Wide Views on Biodiversity	World Agroforestry Centre (ICRAF Philippines)	Advocacy	Luzon Makati		2012
	13th International Seminar and Workshop on Tropical Ecology	ViSCA Foundation for Agricultural And Rural Development (ViFARD)	Advocacy	Visayas Leyte		2012
	Towards a Peoples' Empowerment Fund: A Research Project	Pambansang Kilusan ng mga Samahang Magsasaka (PAKISAMA)	Advocacy	National		2012
	Luzon Regional Women's Forum/Workshop on Natural Resources and Mining	HARIBON Foundation	Advocacy	Luzon Quezon City		2012
	Forest Conservation Through Traditional System of Forest	Congregation of the Augustinian Missionaries of the Philippines and	Site-based	Luzon Palawan		2012

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Management of the Pala'oan, in Aribungos,Brooke's Pt.Palawan	Organization of Indigenous Peoples for Action in Palawan				
	Miarayon Lapok Lirongan Talaandig Tribal Association, Inc. (MILALITTRA)	Establishment of Nursery at Miarayon, Talakag, Bukidnon	Site-based	Mindanao Bukidnon		2012
	Facilitation Assistance to CSO Partners on DENR-PTFCF-FPE NGP Partnership Agreement Implementation 2012 in Province of Palawan	Palawan NGO Network, Inc.	Site-based	Luzon Palawan		2012
	Workshop-Consultation on Biodiversity and Forest Conservation for Social Resilience in the Sierra Madre Corridor	Community Forestry Foundation-Quirino, Incorporated	Advocacy	Luzon Region 2		2012
	Integrating Biodiversity Research Education, Public Engagement and Conservation	Foundation for Integrative and Development Studies	Advocacy	Luzon UP Dilliman		2012
	Forest Enrichment Project in Northern Palawan	Nagkakaisang Mga Tribu ng Palawan, Inc.	Site-based	Luzon Palawan		2012
	Conservation Awareness Data Survey (CADS)	Sibuyan Island Sentinels League for Environment Inc. (Sibuyan ISLE)	Advocacy	Visayas Romblon		2012
	Nuestra Paragua con la Gente (Preparations for PO Governance over Community Conservation Areas	Palawan NGO Network, Inc.	Site-based	Luzon Palawan		2012
	Support for seedling sorting, hardening-off and hauling	Patag Gabas Guadalupe Farmer's Association (PAGGFA)	Site-based	Visayas Leyta		2012
	Community – based biodiversity protection and management towards increase productivity and Income	Tordesillas, Igpanulong, Luna Upland Farmers Association (TILUFA Inc.,)	Site-based	Visayas Antique		2012
	Establishment and Maintenance of Native Forest Tree Nursery and Rainforest Demonstration Area in PFEN member SCU's Using Rainforest Technology	Philippine Forestry Education Network, Inc. (PFEN)	Advocacy	National	1,996,700 (requested)	January 30, 2013-January 30,2014
	Revisiting Threats in Mt. Mantalingahan Protected Landscape	Institute for Development of Educational and Ecological Alternatives, Inc. (IDEAS)	Advocacy	South of Palawan - Quezon,Rizal, S.Espa nola,Brooke's Point and Bataraza	100,000 (requested)	Feb.11,2013, May 11,2013

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	"Coastal Forest Reforestation and Protection of Mangrove Bio-Diversity"	MuCAARD-CoSEED, Inc	Advocacy	Barangay Balabawan, Liasan and Balong-Balong, Pitogo, Zamboanga del Sur	1,495,900 (requested)	March 31,2013,Feb.28, 2014
	Native Plants Conservation and Montane Forest Protection in Mount Tapulao	Philippine Native Plant Conservation Society	Advocacy	Mount Tapulao and Dampay Resettlement Area, Brgy. Salaza, Palauig Zambales	375,800 (requested)	March 8, 2013 - November 30, 2013
	Revegetation of Degraded Ultramafic Areas in Northern Zambales, Philippines using Indigenous Metallopytes	Dr. Marilyn O. Quimado	Site-based	Sitio Marangloy, Brgy.Taltal,Masinloc, Zambales	953,000 (requested)	March 12,2013, March 11,2014
	Environmental Defense Program (Year 3)	Alternative Law Groups,Inc.	Environmental Defence	National	2,000,000 (requested)	March 25,2013- March 24,2014
	Advancing Forestry Education For Biodiversity Conservation and Green Philippines	Philippine Forestry Education Network, Inc. (PFEN)	Advocacy	National		2013
	Legal Resource Build-up for Environmental Protection Through Summer Internship Program	Kaisahan Tungo sa Kaunlaran ng Kanayunan at Repormang Pansakahan, Inc	Environmental Defence	National		2013
	Legal Resource Build-up for Environmental Protection Through Summer Internship Program	Tanggol Kalikasan	Environmental Defence	National		2013
	Legal Resource Build-up for Environmental Protection Through Summer Internship Program	Environmental Legal Assistance Center, Inc.	Environmental Defence	National		2013
	Legal Resource Build-up for Environmental Protection Through Summer Internship Program	Saligan-Bicol	Environmental Defence	National		2013
	Legal Resource Build-up for Environmental Protection Through	Ateneo Human Rights Center	Environmental Defence	National		2013

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Summer Internship Program					
	Using Science-based evidence to Prosecute the Pangolin Poachers	Dr. Perry S. Ong	Environmental Defence	National		2013
	Support for seedling sorting, hardening-offand hauling	Patag Gabas Guadalupe Farmer's Association (PAGGFA)	Advocacy	National		2013
	Enhancing Ecosystem Services of Maulawin Spring Protected Landscape	International Institute of Rural Reconstrunction	Site-based	Luzon Quezon		2013
	Saving Mt. Purgatory	Jaime V. Ongpin Foundation, Inc. (JVOFI)	Advocacy	Luzon Benguet		2013
	Reassessment of 59,000 hectares CBMFA Area and updating of Community Resources Management Plans (CRMPs)	SAMILLIA Federation of Peoples' Forest Development Cooperative, Inc.	Site-Based			2013
	Puno ng Buhay (Season 2)	Knowledge Channel Foundation, Inc.	Advocacy	National		2013
	State of Nature Assessment (SONA) on theme of "Water"	Green Convergence	Advocacy	National		2013
	Incentivizing Community Conservation of Mangrove Forests in Busuanga	C3-Philippines, Inc	Site-based	Luzon Palawan		2013
	Stakeholders' Consultation, Survey and Mapping of Silway River Headwater Areas for Reforestation and Conservation	Mahintana Foundation, Inc.	Research	Mindanao		2013
	PTFCF Plant Science Scholarship Program Support for Practicum Work of UPLB-CFNR Undergraduate Students (Pilot)	UPLB College of Forestry and Natural resources Alumnai Assoc., Inc.	Advocacy	Luzon UP Los Banos		2013
	San Teodoro Ridge, River and Reef Institute, Inc. (ST3RIIInc.)	Linao-Cawayan Sub-watershed Management Project (LICASWAMP) Phase II	Site-based	Luzon Mindoro		2013
	Plant Science Conservation Program	Shane Bimeda	Research	National		2013
	Mangrove Reforestation	Brgy. Masao Fisherfolk Association	Site-based	Mindanao		2013
	The Fifth National Report to the Convention on Biological Diversity	Ateneo School of Government	Advocacy	National		2013
	Facilitation and Assistance to CSO Partners on DENR-PTFCF-FPE NGP Partnership Agreement Implementation 2014 in the Province of Camarines Sur	Alliance of Young Professionals for Social and Environmental Development, Inc.	Site-based	Luzon Camarines Sur		2013

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	Sustaining Local Capacity Enhancement for the Resource Management and Development in the Allah Valley Forest Reserve	Tribal Leaders Development Foundation, Inc.	Site-based	Mindanao Cotabato		2013
	Traditional Systems of Forest Management of the Palao'an in Aribungos, Brooke's Point, Palawan- Year 2	Congregation of the Augustinian Missionaries of the Philippines, Inc. (CAMP) (and Organization of Indigenous People's for Action in Palawan, Inc. (OIPAP)	Site-based	Luzon Palawan		2013
	Sustaining Forest Conservation and Rehabilitation Initiatives in Mt. Daguma Range	Tri-People Concern for Peace, Progress and Development of Mindanao, Inc.	Site-based	Mindanao Maguindanao		2013
	Dynamics of Benguet Pine (Pinus kesiya Royle ex Gordon) and Broadleaved Forests Conversion into Highland Vegetable Ecosystem in Bakun, Benguet, Philippines	Mr.Domelson F. Balangen	Research	Luzon Benguet		2013
	Nursery rehabilitation	Patag Gabas Guadalupe Farmer's Association (PAGGFA)	Site-based	Mindanao CDO		2013
	Nursery rehabilitation	Cienda-San Vicente Farmers Association (CSVFA)	Site-based	Mindanao CDO		2013
	Nursery rehabilitation	Patag Raiforest Association	Site-based	Mindanao CDO		2013
	Mangrove Forest Rahabilitation in Brgy. Concepcion, Busuanga project	Concepcion Fisherfolks Association	Site-based	Mindanao		2013
	Mangrove Forest Rahabilitation in Brgy. Bogtong, Busuanga project	Brgy. Bogtong Fisherfolk Association	Site-based	Mindanao		2013
	Mangrove Forest Rahabilitation in Brgy. Sagrada, Busuanga project	Brgy. Sagrada Farmers Association	Site-based	Mindanao		2013
	Mangrove Forest Rehabilitation in Brgy. Pedada, Ajuy Project	Brgy. Pedada Fisherfolks Association	Site-based	Mindanao		2013
	Coalition of Fisherfolk Association for the Restoration of Sibuguey Bay's Over-exploited Mangroves and Natural Resources in Siay,Naga, Alicia and Kabasalan (CARBON-SINK)- Year3	Kapunungan sa Gagmayng'ng Mangingisda sa Concepcion (KGMC)	Advocacy	Mindanao Zamboanga		2013
	Ilin and Ambulong Forest Conservation Project	Mindoro Biodiversity Conservation Foundation, Ic.	Site-based	Luzon Mindoro		2013
	Diversity of Figs and Fig wasps in selected sites in Luzon, Philippines	Lillian Jennifer V. Rodriguez	Research	Luzon		2013

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	PTFCF Plant Science Scholarship Program: Thesis Support for UPLB-CFNR Undergraduate Students (Pilot)	UPLB College of Forestry and Natural resources Alumnai Assoc., Inc.	Advocacy	Luzon UP Los Banos		2013
	HARIBON FOUNDATION					
	Governance & Local Development for Endangered Forests (Golden Forests)	European Commission	Advocacy, Site-based/ Research	Luzon, Visayas, Mindanao		2005-2010
	Golden Landscapes and Seascapes	ONGD CIVES MUNDI	Advocacy, Site-based/ Research	Luzon, Visayas, Mindanao		2007-2009
	Rainforestation Projects in Sitio Palbong in Brgy. Batong-buhay, Brgy. Ligaya and Brgy. Burgos, Sablayan, Occidental Mindoro	BirdLife International – Asia Division	Advocacy, Site-based/ Research	Luzon		2008-2009
	Preventing Extinction Initiative Mindoro Bleeding-heart Species Guardian Project	BirdLife International	Advocacy, Site-based/ Research	Luzon		2007-2009
	Strengthening Conservation of Mindoro Bleeding-Heart (Gallicolumba Platenae) at Siburan Forest, Barangays Batongbuhay and Malisbong, Sablayan, Occidental Mindoro	Jensen Foundation	Advocacy, Site-based/ Research	Luzon		2008-2009
	Enhancing Capabilities of Local Stakeholders to Conserve the Mindoro Bleeding Heart (*Gallicolumba platenae*)	Keidanren Nature Conservation Fund	Advocacy, Site-based/ Research	Luzon		2008-2010
	Asia CoRe Forests Project	BirdLife International – Asia Division				2009-2010
	Building on Success: turning policy advantages into conservation gains for internationally important conservation areas across the BirdLife Partnership	BirdLife International	Advocacy	National		2009-2011
	F/S study for REDD forest	BirdLife International – Asia Division				2009-2010

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	conservation project					
	Disney Friends for Change: forest conservation in the Philippines	BirdLife International		National		2009-2010
	Reprinting of a Policy Paper on Restoring Philippine Rain Forests	Philippine Tropical Forest Conservation Foundation (PTFCF)		National		2009
	Establishment of Nursery on Native Tree Species at the Caliraya Watershed	Coca-Cola Foundation	Advocacy, Site-based/ Research	Luzon		2009-2011
	Drafting of CSO version of the Sustainable Forest Management Bill	Philippine Tropical Forest Conservation Foundation (PTFCF)	Advocacy	National		2010
	Preventing Extinctions Programme: Cebu Flowerpecker	BirdLife International	Advocacy, Site-based/ Research	Visayas		2009-2012
	Expanding and Diversifying the National System of Protected Areas in the Philippines (EDNSTPAP) – M angatarem	PAWB – DENR	Advocacy, Site-based/ Research	Luzon		2010
	Expanding and Diversifying the National System of Protected Areas in the Philippines (EDNSTPAP) – Gen. Nakar	PAWB – DENR	Advocacy, Site-based/ Research	Luzon		2010
	Forest and Climate Protection Project Panay	GTZ	Advocacy, Site-based/ Research	Visayas		2010-2013
	Expanding and Diversifying the National System of Protected Areas in the Philippines	UNDP – GEF	Advocacy, Site-based/ Research	Luzon		2011
	Forestory Project	BirdLife International	Advocacy, Site-based/ Research	Luzon		2010-2013
	Forestory Project - Toyota	BirdLife International – Toyota Foundation	Advocacy, Site-based/ Research	Luzon		2011
	Resource and Socio-Economic Assessment of the Boso-Boso and Tayabasan Sub-watershed	Foundation for the Philippine Environment	Site-based/ Research	Luzon		2011
	Preventing Extinctions Programme – Philippine Eagle	BirdLife International - Swedish Ornithological Society	Advocacy, Site-based/ Research	Luzon		2011-20213
	Coral reef survey in Polillo Island	Mohammed Bin Zayed	Advocacy, Site-based/ Research	Luzon		2011

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
		Ocean Park Conservation Foundation				6 months
	Assessing the financial costs of effectively conserving Important Bird Areas in the Philippines (IBA)	Birdlife International	Research	National		2011-2012
	Chinese Crested Tern	Birdlife International	Research/ Advocacy	National		2012
	Conserving the Endangered corals of Plillo Island, Philippines (EDGE CORAL)	ZSL Edge Conservation Fellows	Advocacy, Site-based/ Research	Luzon		2011-2013
	Developing Eco-Leaders for Sustainable Communities (FedEx 2)	United Way Worldwide (UWW)	Advocacy	Luzon		2012
	Partnerships for Biodiversity Conservation: Mainstreaming in Local Agricultural Landscapes/ Biodiversity Partnership Project (BPP)	PAWB	Advocacy, Site-based/ Research	Luzon		2012-2013
	Pathways for Indigenous Knowledge Engagement on Marine Biodiversity Conservation (PEER)	The National Acadamies of Science	Research			2012-2015
	Responding to Fish Extirpations in the Global Marine Biodiversity Epicentre (DARWIN PROJECT)	Environment Food & Rural Affairs (DEFRA)	Site-based/ Research	Luzon, Visayas, Mindanao		2012-2013
	State of Philippine Birds	Birdlife International	Site-based/ Research	Luzon, Visayas, Mindanao		2012
	Strengthening the Marine Protected Areas Conserving Key Marine Biodiversity Areas Project	UNDP	Site-based/ Research			2013
	Community-Based Forest Restoration and Sustainable Livelihood Project in Mangatarem, Pangasinan (Keidanren-Mangatarem-2)	Keidanren Nature Conservation Fund	Advocacy, Site-based/ Research	Luzon		2012-2014
	National Greening Program – Region 1 Mangatarem, Pangasinan	DENR Region	Advocacy, Site-based/ Research	Luzon		2013
	Mainstreaming Gender in Integrated Costal Management	PACAP	Advocacy, Site-based/ Research	Luzon		2013-2014

	Title	Implementation Partner/s	Strategy	Scope	Amount	Duration
	TANGGOL KALIKASAN					
	Strengthening Capacity towards ecosystems---based management of critical ecosystems in Luzon, Philippines	IUCN-EA, TVPL PAMB, DENR LGUs of TVPL, LLDA, LGU of Buhi LGU of San Pablo City	Site-based capacity-building	Taal Volcano Protected Landscape, Luzon	6,561,437	2011-2014
	Revision of the Management Plan for MBSCPL	FPE, DENR IV-A	Site-based	MBSCPL	1,500,000 (combined)	2012-2013
	Capacity-building for PAMB members of Maulawain Spring Protected Landscape	PAMB	Site-based capacity-building	Maulawin		2013
	Reducing threats to Philippine Biodiversity and Ecosystems thru Environmental Law Enforcement Capacity Strengthening	USAID, ELAC, Fr. Saturnino Urios University Policy Center, Various universities and college as institutes of Environmental Governance, DENR, DA-BFAR, PNP/Coast, Guard/Phil, Navy/Phil, Army/Local law	Site-based	National (various sites)	20,500,000	Dec 2011-Feb 2014
	ENERGY DEVELOPMENT CORPORATION					
	Biodiversity Conservation and Monitoring Program	University of the Philippines Diliman – Institute of Biology; Central Mindanao University; Department of Environment and Natural Resources	National – Albay and Sorsogon (Bacon-Manito Geothermal Reservation); Negros Occidental (Mt. Kanlaon); Negros Oriental (Palinpinon Geothermal Reservation); Leyte (Tongonan Geothermal Reservation); North Cotabato (Mt Apo Geothermal Reservation)		Php 24,022,368.62 (2011-2013 only)	2008-present
	Almaciga Study at Kanlaon					Oct 2008 – Apr 2011
	Two Hectare Permanent Forest Dynamic Plots (PFDP) in the five EDC Geothermal Project sites					2009-present
	Forest Restoration Study in the five geothermal sites					2012-2014
	Forest Succession in Disturbed Areas					March 2011-March 2014
	Biodiversity Monitoring System-BMS					2009- present
	Flagship species					2012-present
	Faunal Assemblages in Reforestation Areas					2012-2014
	Impact assessment of selected streams using benthic macroinvertebrates in 5 EDC geothermal project sites					2008-2011
	Stream monitoring of all geothermal projects					2012-present

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2014